Minutes of 169th meeting of Expert Appraisal Committee held on 6-7 April, 2017 for projects related to Industrial Estate/Area, SEZ and Highways at Ministry of Environment, Forest and Climate Change, Indira Paryavaran Bhawan, Jor Bagh Road, New Delhi

Day 1st: 6th April, 2017

Time: 10:00 AM

1. Opening remarks of the Chairman

2. Confirmation of the minutes of the 166th meeting held on 22nd February, 2017 at New Delhi

The EAC, having taken note that no comments were offered on the minutes of its 166th meeting held on 22nd February, 2017 at New Delhi, confirmed the same.

3. Consideration of proposals

3.1	**Development of Industrial Estate of HSIIDC on Refinery Road, Panipat (Haryana) by Haryana State Industrial & Infrastructure Development Corporation (HSIIDC) Ltd - Further consideration for Environmental Clearance - [F.No.21-14/2013-IA-III]**
3.1.1	The project proponent made presentation before the EAC and made submissions as under: (i) The project involves development of industrial estate of HSIIDC on Refinery Road, Panipat, Haryana by Haryana State Industrial & Infrastructure Development Corporation (HSIIDC) Ltd. (ii) It is located near to Panipat refinery and is 5 km away from NH-1. Industries planned are Plastic packaging, polyester fiber, woven sacs and land is acquired from four villages, Bohli, Rajapur, Dadlana & Begampur. (iii) Total area of the proposed project is (373 ha, Net planned area is 361.32 ha) for the purpose of development of IE. (iv) ToR for the project was granted by the Ministry vide letter No.21-14/2013-IA-III dated 26th February, 2014. (v) The energy requirement would be 70 MVA (tentative peak load from UHBVN). (vi) Daily water demand is 25 MLD (16.7MLD fresh water from 28 nos of tubewells. The project is having the provision for the development of 10 MLD CETP. (vii) **Water bodies**: Major water bodies are Drain -2. (viii) Provision of 15 RWH wells. (ix) MSW generation would be 11.5 MT/day. (x) **Solid Waste Management**: CETP sludge will be disposed through authorized recycler/management company (GEPIL). (xi) **Waste water quantity, treatment capacity, detail**: 8.4 MLD, CETP capacity (5+5=10 MLD in two phases); based on ASP process, extended aeration, trickling filters, sludge thickners, chlorination, deep bed filters. (xii) **Recycling/reuse of treated water and disposal**: Recirculation scheme exists, CETP discharge 10 MLD (8.4 MLD recycled and reused & remaining 1.6 MLD to main drain-2). Out of 8.4 MLD 29% (2.9 MLD) recycled, 55% (5.5 MLD) horticulture use after conforming to standards.

	(xiii) **Investment/Cost**: The initial cost of project is Rs.410 crores (exclusive of the cost of the land viz. Rs.244.13 crore). 46.8 % is reserved for industrial plots, 11.74% under R&R, 5.11% for commercial purpose, and 33% for green belt. (xiv) **Energy conservation measures with estimated saving**: SPV and LED street lights will be installed in each industry. Solar power heating systems. Use of energy efficient building materials, use of flyash in construction, Energy efficient air-conditioning. **(xv) Parking requirement with provision made**: Adequate parking space for commercial vehicles, private cars and two wheelers in designated parking areas. Weighing balance will also be installed in the IE**.** (xvi) **Whether the project is in Critically Polluted area:** No- (Outside the municipal Limits of Panipat). (xvii) **Public Hearing**: Public Hearing was conducted at Panipat on 15th February, 2015 and Karnal on 29th April, 2015. (xviii) **Employment potential**: 4000-5000 (xix) **Benefits of the project**: Creation of downstream petrochemical industries. Local availability of raw materials, trained manpower.
3.1.2	The proposal was earlier considered by the EAC in its meeting held on 30 - 31 May, 2016 wherein the EAC noted that the proposed industrial estate involves an area less than 500 ha. Also, the industrial units already allotted and the proposed ones, are neither covered under category A nor B, and thus not requiring environmental clearance in terms of the EIA Notification, 2006. On a specific query by the EAC regarding location of the project site with respect to the identified *'Critically Polluted Area (CPA)*' near Panipat town, it was informed that the proposed site is more than 5 km from that area. Accordingly, at a later stage, even if any proposed project/activity is reported to be in category B, the industrial estate would be covered under category B, and shall require EC from the concerned SEAC/SEIAA. The Committee also noted the ToR was earlier granted in view of a proposed fertilizer unit covered under category B, and the general conditions applicable due to the location of the project site *about* 5 km from the CPA. However, the project proponent was asked to get a confirmation from the SPCB (or any other appropriate authority) on location of the project site vis-a-vis the CPA, and also the category of industrial units, to ascertain the concerned regulatory authority for further considering the proposal. The EAC, after deliberations, deferred the proposal for want of the desired clarifications/inputs on the above lines.
3.1.3	During deliberations, the EAC noted the following:- (i) Earlier, due to one fertilizer unit proposed in an area of 20250 sqm in the industrial estate, the ToR for the project 'Development of Industrial Estate' was issued on 26th February, 2014 considering the same under the Category A. (ii) At that stage, 25 % of the advertised plot were reserved for petro-chemical projects, primarily using petroleum derivatives like HDPE, LDPE, Butadiene, Styrene, Acrylonitrile, etc. in order to utilise the product streams from the Panipat refinery to

achieve significant value addition through conversion by downstream processing projects.

(iii) However, as of now, the project proponent has allotted industrial plots to 49 industrial units (450 sqm-4050 sqm), mainly engaged in PVC products. None of these units is covered under the EIA Notification, 2006. Even, the fertilizer unit has been exempted from the requirement of prior EC.

(iv) Now, one plastic park is proposed to be developed in the area of nearly 40 ha in the proposed industrial estate under the promotion scheme Ministry of Chemical and Fertilizers. The details in this regard are yet to be firmed up.

(v) Even if it has been confirmed by the project proponent that the location of the project site is 5.5 km away from the CPA near Panipat town, general condition shall be applicable. Accordingly, the proposal if covered under Category B, shall be appraised at the centre level.

3.1.4 *The EAC, after deliberation, still found no clarity on the categorization of industrial units/activities in terms of the EIA Notification, 2006. Given the discrepancies, the Committee desired that the Ministry may take a view on the proposal after receipt of more details in respect of now proposed plastic park.*

3.2 **Naidupeta Industrial Park at Menakuru & Konetirajupalem Villages, Naidupeta Mandal of District S.P.S.R. Nellore (AP) by Andhra Pradesh Industrial Infrastructure Corporation Limited - Further consideration for Environmental Clearance - [F.No.21-140/2015-IA-III]**

3.2.1 The project proponent made a presentation and provided the following information to the Committee:-

(i) The project involves development of Naidupeta Industrial Park (IP) at Konetirajupalem and Menakuru Villages, Naidupeta (M) in S.P.S.R.Nellore District, Andhra Pradesh.

(ii) Total land required for the proposed development of Naidupeta IP is 503.44 ha, with the land use details as under:-

S. No.	Land Use	Area (Acres)	Hectares (Ha)	Percentage (%)
1.	Plotted Area	933.81	377.90	75.07
2.	Road Area	103.56	41.91	8.32
3.	Open Space	124.88	50.54	10.03
4.	CFC Area	15.20	6.15	1.23
5.	Buffer + Green Belt	66.57	26.94	5.35
Total		**1244.02**	**503.44**	**100**

(iii) Total water requirement during the construction phase for the proposed IP is estimated to be 0.5-1.0 MLD, which would be supplied through road tankers/local municipal bodies. During operation phase, water requirement of 6.4 MLD of water will be met from Telugu Ganga Canal (TGC). APIIC has already obtained approval from the Irrigation and Command Area Development of the State Government to tap water from the TGC.

(iv) Naidupeta IP envisages to have mixed industrial use with the total waste water generation estimated as 4.5 MLD (sewage 0.7 MLD and industrial effluent of 3.8

MLD), when fully operational. Nearly 0.45 MLD (10%) of effluent will be generated from proposed IP during Initial stage of operation. 1.0 MLD capacity of CETP is proposed in the initial stage to treat the industrial effluents for the entire cluster. It is proposed that the CETP will be a Zero Liquid Discharge (ZLD) system. A part of the treated wastewater will be used for maintaining the greenbelt within the Cluster and the balance will be reused at the units as non-potable water for various applications.

(v) **Municipal solid waste generated disposal facility**: Biodegradable Waste will be 4.84 TPD, part converts will be disposed to bio compost and rest will be disposed to local municipal bins. Total Recyclable Waste will be 19.16 TPD, this will be sold to Authorized recycling vendors.

(vi) **Power requirement and source**: The power demand estimation for various uses in the Naidupeta IP is 48.67 MVA which will be sourced from APSPDCL 132KV/33 KV substation located in Naidupeta IP through a 33 KV Overhead double line circuit up to 33/11 KV substations in Naidupeta IP.

(vii) **Proposed energy saving measures**: Solar Power harnessing potential has been estimated for Naidupeta IP. Based available roof tap area it is estimated approximately 28 MW can be harnessed. Individual industries of IP will be installing the Solar PVs to extent possible. In addition, it is expected that individual units in the IP will be installing mechanical equipment's/process/ electrical appliances/ instrumentation systems etc., with inbuilt energy conservation measures.

(viii) **RWH**: The proposed harvesting and recharge structures in IP are Roof-top rainwater harvesting, Storage ponds/tanks of 15 number, Recharge pits of five number and Recharge shafts/wells of five number. Estimated RWH potential for Naidupeta IP is as follows:-

S. No.	Land Use Distribution in Naidupeta IP	Volume of run-off harvested (m^3 /day)
1.	Roof top Area	33294
2.	Roads Area	6462
3.	Open Space	3339
4.	CFC Area	203
5.	Buffer + Green Belt Area	1187
Total		**44485**

(ix) **Investment/Cost of the project**: The approximate cost for development of infrastructure is Rs. 94.77 Crores.

(x) **Car parking**: In Naidupeta IP, Parking area of 12.25 ha is provided with 573 parking bays.

(xi) **Benefits of the project:** This project is going to benefit the entire region. The overall development of the region could be manifold. In order to augment the growth, the state has planned multitude of development options in all sectors (tourism, Water resources, Agriculture, urban development, education, etc.) including industrial sector. The proposed IP is one such development to improve economy and employment generation.

(xii) **Employment potential**: During the three year construction phase a total of 350 employees will get employment. During the operation phase the Industrial Park is expected to bring a direct employment for 17,442 personnel with an indirect employment for 4500 personnel.

	(xiii) **Eco-Sensitive Zone in 10 km radius area**: No. (xiv) **Wildlife issues: No.** (xv) **Details of Forest land involved, if any**: No forest land is involved. (xvi) **ToR details**: ToR was granted to the project vide letter No.21-140/2015-IA.III dated 29th February, 2016. (xvii) **Public Hearing**: Public hearing was conducted on 20th September, 2016. (xviii) **Undertaking to the effect that no activity has since been taken up**: Eleven nos of industrial establishments are already in operation in Naidupeta IP. These industries were also covered under Naidupeta IP Master Plan and are having a valid EC, Consent to Establish and Consent to Operate from APPCB.
3.2.2	The proposal was earlier considered by the EAC in its meeting held on 16-17 January, 2017, wherein the EAC noted that the project site proposed in a total area of 503.44 ha, is not a contiguous plot, but in two parts separated by some industrial establishments already in operation having independent ECs. At the same time, the project proponent have given an undertaking that the said industries are in operation in the proposed Naidupeta Industrial Park, and also covered under the Master Plan for Naidupeta IP. As such, there seems to be a contradiction and needs to be clarified by the project proponent for further consideration of the proposal. The EAC was also not convinced with the proposed hazardous waste disposal arrangements from the CETP, and desired for a clarification and firm mechanism for compliance of the Hazardous Waste Management and Handling Rules, 2016. The proposal was deferred.
3.2.3	During deliberations, the EAC noted the following:- (i) Naidupeta Industrial Park proposed in an area of 503.43 ha, forms a part of Yerpedu-Srikalahasti node of proposed Vizag-Chennai industrial corridor. (ii) The proposed park in two parts on either side of the bulk land identified/allotted as undeveloped land in an area of 349.29 acres by APIIC, is on the newly designated State Highway. (iii) The industries located within the undeveloped land have already obtained EC and Consent to Establish/Operate under the Air Act, 1981 and the Water Act, 1974. (iv) The developing land is presently occupied by 11 industrial units, which are not covered under the EIA Notification, 2006. The infrastructure facilities need to be integrated for existing as well as proposed industries within the developing land seeking EC. (v) Industries/CETP proposed in the Industrial Park shall have their independent hazardous/non-hazardous waste collection and segregation system. Segregated wastes shall be further compacted for volume reduction. (vi) As per the *Hazardous and Other Wastes (Management and Trans-Boundary Movement) Rules, 2016,* industries shall have a temporary storage facility for 30 days detention. (vii) The project proponent has proposed new hazardous waste disposal site less than 35 km from the project location, which shall now be used to dispose of hazardous waste.

	(viii) The ecology and biodiversity part of the EIA is very weak having basic mistakes like a) *Rhacophorus bimaculatus* (Asiatic Tree Frog) endemic to Philippines and b) *Hyla arborea* (European tree frog). These species although not found in India, but reflected in the EIA report.
3.2.4	*The EAC, on being satisfied with the submissions of the project proponent in response to its earlier observations, recommended the project for grant of environmental clearance, subject to compliance of all generic conditions applicable for such projects, and the additional conditions as under:-* • *Consent to Establish/Operate for the project shall be obtained from the State Pollution Control Board as required under the Air (Prevention and Control of Pollution) Act, 1981 and the Water (Prevention and Control of Pollution) Act, 1974.* • *To achieve the Zero Liquid Discharge, waste water generated from different industrial operations are to be properly collected, treated to the prescribed standards and then recycled or discharged for the identified uses.* • *Necessary authorization required under the Hazardous and Other Wastes (Management and Trans-Boundary Movement) Rules, 2016, Solid Waste Management Rules, 2016 shall be obtained and the provisions contained in the Rules shall be strictly adhered to.* • *During construction phase, air pollution and the solid waste management aspects need to be properly addressed ensuring compliance of the Construction and Demolition Waste Management Rules, 2016.* • *As per the provisions of the Notification dated 9th December, 2016 amending the Principal EIA Notification, 2006, all the building and construction projects (built up area 5000 sqm - 150000 sqm) in the industrial area, shall require clearances for their building plans from the State/local bodies. In case of project sizes having built up areas more than 150000 sqm, environmental clearances shall continue to be required from the concerned regulatory authorities.* • *For all the individual units/infrastructure requirements, environmental clearances as applicable, shall be obtained from the respective regulatory authorities.* • *A site specific biodiversity conservation plan including mitigation measures for local biodiversity to be developed from a recognized institute of repute with appropriate financial allocation for its implementation.* • *Green belt shall be developed using local tree and shrub species. No exotic species to be used for green belt development.*
3.3	**Kundli-Manesar-Palwal Expressway in state of Haryana by M/s Haryana State Industrial and Infrastructure Development Corporation Ltd - Environmental Clearance - [F.No.10-8/2016-IA-III]**
3.3.1	The project proponent made a presentation and provided the following information to the Committee:- (i) The proposal involves Kundli-Manesar-Palwal Expressway (135.65 km) in state of Haryana promoted by Haryana State Industrial and Infrastructure Development Corporation Ltd. (ii) Kundli-Manesar-Palwal Expressway project in a total length of 135.65 km, was earlier accorded Environmental Clearance by the Ministry vide letter dated 22nd February 2007. Construction was initiated after procuring the environment clearance and approximately 68% ground work was completed within the EC validity period of 5 years.

(iii) Manesar - Palwal section (52.33 km) of the expressway has been completed and opened for the public transport in March 2016. All the required environment management measures proposed in the EC/EIA have been incorporated in the construction phase for the complete project and further in the operation phase for completed section of the road.

(iv) The EIA exercise is repeated for the remaining work, the Kundli-Manesar section (83.320 km) and impacts on the social and environmental features has been identified. The total length is divided into following three segments:

Segment Particulars			**Length**	**Status**
Segment -1	Between NH-1 & NH-10	Ch.0000 to Ch. 35000	35.00 km	Need EC for completion of leftover work
Segment -2	Between NH-10 & NH-8	Ch. 35000 to Ch. 82680	47.68 km	
Segment -3	Between NH-8 & NH-2	Ch.82680 to Ch. 135650	52.97 km	Operational
		Total Length	**135.65 km**	

(v) The alignment of the project passes through five districts, i.e. Sonipat, Jhajjar, Gurgaon, Mewat and Palwal. Road land width of 100m along the alignment of proposed expressway has already been acquired by HSIIDC. The alignment of the proposed road starts from NH-1 near Kundli, crosses NH-10 at Bahadurgarh, Crosses NH-8 near Manesar and finally joins NH-2 near Palwal. The proposed expressway is dual carriageway 6-lane (3+3) expressway and is divided highway intended for traffic with full control of access and provided with grade separators at intersections. No slow moving traffic will be allowed to ply on the expressway. Grade separation facilities of different lengths and configuration have been proposed for different classes of crossings along the route.

(vi) The proposed expressway crosses through various seasonal streams, irrigation canals, and nallahs, where major and minor bridges are proposed. About 132 km length out of 135.650 km of expressway has been designed in complete embankment. The roadway in embankment will generally be about 2m or more above the surrounding ground level. Around 125 km (95%) length of the expressway passes through plain terrain.

(vii) The development of expressway in the area will definitely bring substantial change in the land use pattern of the area. The land acquired for the purpose is predominantly agriculture. About 70% length of the proposed expressway passes through cultivated land and remaining 30% length traverse through forest, barren and inhabited area. About 3846.67 acres of land have already acquired for the project which also includes 35.63 ha (88.04 acre) of forest land for which clearance has already been taken from the MoEF.

(viii) Hence 3846.67 acres of land has been diverted from agriculture/forest or other landuse to road construction. Although, there is no habitation in the 300 m wide strip along the alignment of expressway, there are several villages and settlements located in the vicinity of the expressway. The impact caused due to change in landuse pattern will be direct and of long term and irreversible in nature.

(ix) Trees shall be planted in RoW of 100 m wide and either side of the expressway with staggered pitch as per IRC: SP-21. A spacing of 10-15m, c/c is recommended for spacing of trees parallel to the roads. Set back distance of

	trees needed in different situations shall be as per the IRC:SP-21 and IRC:66. Shrubs in medians shall be normally 1-1.5m heights as per IRC:SP-21. The landscaping is being carried out as per the policy of HSIDC as is being done on HSIDC's public funded projects. (x) The estimated total cost for the entire stretch of the project is 3340.81 Crores (including land acquisition) which also includes 1020 crores, already spent on road construction. The unit cost per km of Road has been assessed as Rs 24.64 crore per km. (xi) ToR Details: The ToR was granted by the Ministry vide letter No. .... dated... (xii) Public Hearing was conducted on 23.10.2006 in Sonepat, Jhajjar & Gurgaon Districts and 24.10.2006 in Mewat & Palwal Districts. (xiii) Forest Clearance was granted vide letter No. 9-HRC1261/2006-CHA/8042-50 dated 22nd August 2007. **(xiv)** About 74,193 trees are affected from forest area and about 1739 trees from area other than forest. Total loss of trees is 75932.
3.3.2	The EAC, while deliberations, noted the following:- (i) The project 'Kundli-Manesar-Palwal' in a total length of 135.65 km (Kundli-Manesar-83.32 km, Manesar-Palwar-52.33) km was accorded environmental clearance on 22nd February, 2007. (ii) On expiry of the validity of the EC, physical progress could be achieved only 68 %. However, neither any formal proposal was submitted in time to extend validity of EC, nor any request to consider the remaining project afresh. (iii) Meanwhile, the Manesar-Palwal section 52.33 km long has been made operational. Whereas statutory requirements are to be fulfilled to take up the works on Kundli-Manesar section (83.32 km). (iv) To complete the remaining works on Kundli-Manesar section (83.32 km), and after a formal proposal in this regard, fresh ToR was granted on 31st May, 2016 for preparation of EIA-EMP reports without public hearing. (v) The project is aimed at decongesting the NCT of Delhi and thus to minimise air pollution in the national capital. (vi) The required forest clearance for diversion 35.63 ha for forest land required for the project has been granted on 22nd August, 2007. (vii) The project is being regularly monitored by the Monitoring Committee appointed by the Hon'ble Supreme Court, and as per the commitments made before the Hon'ble Court, the project is to be completed by January, 2018.
3.3.3	*The Committee, after deliberations, took note of the project benefits in larger public interest, especially reducing air pollution in NCT of Delhi in true compliance of the orders of the Hon'ble Supreme Court and other courts from time to time.* *The Committee recommended for grant of environmental clearance to the remaining project for completion of the balance works, subject to the compliance of generic conditions.*

3.4	**'Industrial Park' in village Gollapuram, Mandai Hindupur of District Anantapur (Andhra Pradesh) by APIIC Limited – Environmental Clearance – [F.No.21-137/2015-IA-III]**
3.4.1	The project proponent made a presentation and provided the following information to the Committee:- (i) The project is for development of 'Industrial Park' in village Gollapuram, Mandai Hindupur of District Anantapur (Andhra Pradesh) by APIIC Limited. (ii) The proposed industrial park is adjacent to the Thumakunta industrial park. It is located at the Andhra Pradesh – Karnataka state border. Hindupur is the nearest city which is located at 10 km (N). The industrial park is well connected with roads, NH 234- 9 km (S) and SH 9 - 1 km (W) and the nearest railway station is Devarapalli railway station which is adjacent to the site. (iii) It will provide "Hassle free production environment" for Iron Ore, Granite Cutting, Polishing, Ferro Alloys, Red Oxide Units, Steel Plants, Textiles, Garmenting Mainly Silk, Yarn, Fiber, Fabric Processing, Garmenting, Hardware, Automobile Spare Parts, Electronic and Electrical Parts, Chemical Processing, Kraft Papers, Tyre Pyrolysis, Scrap Processing, Re-rolling, Oil & Solvent Extraction, Stone Crushing Units, Food Processing, etc., (iv) Total area required for the development is 942.28 Acres (381.25 Ha), major part of the area is a barren land, with scrub with a few operating/existing industries. The role of the APIIC for the proposed industrial park will consists of developing common infrastructural facilities - roads, water source, power, drainage, street lightening, greenbelt, CETP, TSDF and STP etc. (v) **Water requirement**: The total water requirement will be 7354 KLD which will be sourced through Neelakantapuram Srirami Reddy drinking water supply scheme, water allocation of 10 MLD from the Penna Ahobilam balancing reservoir. (vi) **Waste water generation**: 3160 KLD will be treated in CETP/CSTP for recycling & reusing. (vii) **Municipal solid waste**: Solid waste generated from the industrial, residential and commercial are the basic in nature like Plastics, broken glass, scrap metal, used cement bags etc. can be sold out authorized dealers. (viii) **Details of Water Bodies, Impact on Drainage:** Penner river - 2.5 km (W), Gowdasandra lake – 1.5 km (S), Gollapuram kere – 1 km (E), Ramachandrapura lake - 4.5 km (SSE), Manepalli kere – 5 km (E), Hindupur lake – 10 km (S) are the water bodies located near the site. Natural drainage pattern of the industrial park will not be altered due to the construction activities and natural drainage pattern is maintained throughout the facility. (ix) **Parking facility**: Parking area of about 10.13 ha is provided for the heavy industrial trucks and heavy vehicles. (x) **Investment/Cost:** Cost of the project (development of industrial area) is Rs. 465.51 Crores (xi) **Benefits of the project**: • Industrial parks support start-ups, new enterprise incubation, development of knowledge – based business, and offer an environment where local and international firms can interact with centers of knowledge creation. • They act as innovation club, promoting interactive learning and the commercialization of research outputs and can exploit local entrepreneurial potential. • Able to attract new business by providing an integrated infrastructure in one

	location. • To set aside industrial uses from urban areas to try to reduce the environmental and social impact of the industrial uses. • To provide for localized environmental controls those are specific to the needs of the industrial park. (xii) **Employment potential**: **Around** 20,000 jobs will be generated due to the proposed project. (xiii) **Court cases, if any**: No. (xiv) **ToR details**: The ToR was accorded to the project by the Ministry vide letter No. 21-137/2015-IA.III dated 12.01.2016. (xv) **Public Hearing**: Public hearing was conducted on 28th July 2016 at APIIC Common Facilities Area, Plot No. 24, Gollapuram Industrial Park, Gollapuram village, Hindupur Mandal, District Anantapur (Andhra Pradesh).
3.4.2	During deliberations, the EAC noted the following:- (i) The proposed industrial park in a total area 381.25 ha shall be housing industrial units/activities like iron-ore/granite cutting, polishing, ferro alloys, red oxide units, steel plants, textiles, chemical processing, scrap processing, re-rolling, oil and solvent extraction etc. Some of these activities would fall either under Category A or B depending upon the production capacity. (ii) To provide flexibility in industrial operations, it would be essentially required to consider the project under Category A of item 7 (c) of the schedule to the EIA Notification. (iii) Major issues raised during the public hearing included :- • Pollution problems due to the existing industries in the Industrial Park. • Basic infrastructure facilities in the nearby villages and land allocation to Ranganatha swamy temple. • Providing employment to the local villagers in the proposed industries and development of greenbelt in the industrial park • Disbursement of compensation to the villagers as per the new norms. (iv) Response/Action plan by project proponent:- • APIIC will instruct all member industries to follow the consent conditions given by PCB/MoEF&CC strictly to maintain ambient air quality within the stipulated standards of CPCB. • CSR funds will be allocated for vocations training programme and for development of infrastructure like construction of public toilets etc., APIIC will allot additional land for Lord 'Sri Ranganatha Swamy' temple as per the requirement. • Existing State/Central Government norms will be followed for providing employment, preference will be given to local educated and unemployed people based on their educational qualification. Vocational training will be conducted to improve the skills of local people so that they can get employment/self-employment. • Compensation will be paid as per the land acquisition act of State. (v) Committee also observed that the ecology and biodiversity part of the EIA is very weak having basic mistakes like a) *Chrysopelea taprobanica* (Tree Snake)

	endemic to Sri Lanka, b) *Typhlops diardii* (Blind Snake) endemic to North East India c) *Typhlops porrectus* (Slender Blind Snake) distribution in North India, d) *Hyla arborea* (European Tree Frog) not found in India are reported from proposed project site.
3.4.3	*The EAC, on being satisfied with the submissions of the project proponent in response to its earlier observations, recommended the project for grant of environmental clearance, subject to compliance of all generic conditions applicable for such projects, and the additional conditions as under:-* • *Consent to Establish/Operate for the project shall be obtained from the State Pollution Control Board as required under the Air (Prevention and Control of Pollution) Act, 1981 and the Water (Prevention and Control of Pollution) Act, 1974.* • *To achieve the Zero Liquid Discharge, waste water generated from different industrial operations are to be properly collected, treated to the prescribed standards and then recycled or discharged for the identified uses.* • *Necessary authorization required under the Hazardous and Other Wastes (Management and Trans-Boundary Movement) Rules, 2016, Solid Waste Management Rules, 2016 shall be obtained and the provisions contained in the Rules shall be strictly adhered to.* • *During construction phase, air pollution and the solid waste management aspects need to be properly addressed ensuring compliance of the Construction and Demolition Waste Management Rules, 2016.* • *As per the provisions of the Notification dated 9th December, 2016 amending the Principal EIA Notification, 2006, all the building and construction projects (built up area 5000 sqm - 150000 sqm) in the industrial area, shall require clearances for their building plans from the State/local bodies. In case of project sizes having built up areas more than 150000 sqm, environmental clearances shall continue to be required from the concerned regulatory authorities.* • *For all the individual units/infrastructure requirements, environmental clearances as applicable, shall be obtained from the respective regulatory authorities.* • *A site specific biodiversity conservation plan including mitigation measures to be developed from competent nationally/internationally recognized institute with appropriate financial allocation for its implementation.* • *Green belt shall be developed using local tree and shrub species. No exotic species to be used for green belt development.*
3.5	**Development of New Industrial area at Salarpur, District Alwar (Rajasthan) by Rajasthan State Industrial Development & Investment Corporation Limited (RIICO) - Further consideration for Environmental Clearance - [F No. 21-1/2014-IA-III]**
3.5.1	The project proponent made a presentation and provided the following information to the Committee:- (i) The project involves development of an Industrial Area at Salarpur, District Alwar (Rajasthan) of Rajasthan State Industrial Development & Investment Corporation Ltd. The proposed industrial estate has been envisaged to have 291 nos. of industrial units, 262 nos. of residential and 188 nos. Commercial plots in a total area of 389.696 ha. (ii) The project is located at $28^0$8'17.77" N Latitude and $76^0$47'22.49" E longitude.

	(iii) Maximum area, i.e., 195.820 Ha of land is reserved for development of industrial plots followed by area under roads (80.005 Ha) and 47.23 Ha for H.T. Corridor. Area of 7.920 ha is left along the nallah as buffer and will be utilized for development of green cover. 4.568 ha is reserved for green belt plantation which will be done along the project site boundary (wherever possible) & along each road of the Industrial area. It will be mandatory for each industry to maintain green area within the plot. Area of 0.435 ha is reserved for hospital along with 0.484 ha, which is reserved for development of schools. (iv) RIICO will source water from ground during construction. It is estimated that water requirement for construction phases will be about 1000 KLD including 27 KLD domestic water requirements for workers (90 LPCD for 300 workers). (Basis: Water requirement per acres – 1000 gallons/day) respectively. Industrial zone: During operation phase, one time water requirement of Industrial zone of proposed project would be 3672 KLD and recurring water requirement is 1510 KLD. Water requirement of green area (1260 KLD) will be fulfilled by domestic water treated by STP. CETP having treatment capacity upto reuse level is also proposed in Industrial zone. 900 KLD CETP treated water shall also be re-circulated into the system to minimize requirement of fresh water. Separate distribution network shall be provided for recirculation of CETP/STP treated water. Residential zone: Water requirement of residential zone of proposed project is 2360 KLD. Water requirement of green area (110 KLD) will be fulfilled by treated Domestic waste water (treated by STP). Recurring water requirement is 2250 KLD only. Separate distribution network shall be provided for recirculation of STP treated water for use in green area. (v) Waste during construction activity relates to excess cement mix or concrete left after work is over, rejection caused due to change in design or wrong workmanship etc. These are normally re-used as filling at the same site after completion of excavation work. Demolition and/or construction waste will be utilized in road construction wherever possible. Excavated earth during the civil works including road construction, fencing, drainage, site levelling etc., shall be utilized within the project site. Topsoil shall be conserved and will be utilized in the areas earmarked for greenbelt development. Approximately 70 to 90 kg of municipal solid waste will be generated from the project site during the construction phase. This will be collected and disposed off in a fenced pit dugout at the site and covered properly after completion of construction activity. During the operation phase of the project, waste management would be the responsibility of individual industries. Individual industry will provide system for municipal solid waste collection, storage and disposal. Each industry shall have to comply with the Municipal Solid Waste Management Rules, 2000 and amendments thereof. Approximately 9,000 persons will be involved during the operation phase of the project. Taking into consideration approximately 0.15 kg/person/day of municipal solid waste generation, the total municipal waste generation in the proposed industrial area will be about 1,350 kg/day. In addition to that due to the floating population of about 20,000 people, taking into consideration approximately 0.025 kg/person/day of municipal waste generation, the MSW generation will be about 500 kg/day. Therefore, total municipal waste generation due to the project during operation phase will be about 1,850 kg/day. Individual industry will provide system for safe disposal of non-hazardous waste disposal as per the consent to be provided by SPCB. (vi) Total power requirement during cooperation phase is 10,000 KVA and will be met from Grid Sub-Station (GSS) by JVVNL. (vii) Rooftop rainwater of buildings will be collected in 22 RWH tanks of total 1474.43

	. KLD capacity for harvesting after filtration. (viii) Parking provision for commercial and personal vehicles will be the responsibility of individual occupant. (ix) Provision of solar lighting will also be made for street lighting for conservation of energy. A total 508 solar power street light are proposed to be installed along the roads so that 1/3 of street lights are solar energy based. Provision of these solar street lights will result in saving of energy worth approximately Rs 6.2 lacs per annum. (x) The total area has been divided into following zones: • Automobiles Industry Zone • Commercial & Residential (Khatedars only) zone • Areas for S.T.P., C.E.T.P., hospital, waste disposal, water harvesting , D.F.C. Corridor, roads, green area development & other services • 4.857 ha of land is reserved for future planning. • Roads proposed are of width 45 m, 30 m, 18 m, 12 m and 6 m ROW. • 80.05 ha (20.54 % of project area) has been kept as service area which includes parking facility. (xi) **Wildlife issues**: It is not located within 10 km of Eco Sensitive areas (xii) There is no court case pending against the project. (xiii) **Investment/Cost** of the project is Rs.1036.7629 crore. (xiv) **Employment potential**: 107163 No. (xv) **Benefits of the project**: The proposed project is for development of infrastructure for sitting the industrial area with residential and commercial facilities, which will provide a total of 291 industrial plots, with different plot sizes. This infrastructure development will provide a support for the upliftment of the overall area. Hence, due to the project the overall area will get better road connectivity and other supporting infrastructure. It is proposed to develop the Salarpur Industrial Area as a, Automobile, General Engineering and Other Miscellaneous industries which are less polluting industries. (xvi) **ToR Details:** The ToR for the project was granted vide letter No.21-1/2014-IA-III dated 26th May, 2014. (xvii) **Public Hearing**: Public Hearing was conducted on 15th July, 2015 at the Collectorate office, Tehsil Tapukara, Tijara. Major issues raised during the public hearing include compensation and employment. These were addressed by the project proponent. (xviii) As per CGWA guidelines, the area falls under over exploited zone for ground water withdrawal. The project proponent has applied for obtaining permission from CGWA for the same. It was also informed they have undertaken hydrological assessment of the area planned for ground water withdrawal and rain water harvesting.
3.5.2	(a) The project was first considered by the EAC in its meeting held on 28-29 March, 2016, wherein the EAC asked the project proponent to clarify/furnish the following:- • whether the proposed project/activity is in conformity with the land use notified in the NCR zoning plan. • whether the nearest National Highways and connecting roads have been accounted for/upgraded for taking up this extra load. • Proper demarcation of adequate green belt between industrial area and the residential area. • Ground water availability duly cleared by CGWA.

	(b) The proposal was again considered by the EAC in its meeting held on 16-17 January, 2016. During deliberations, the EAC noted that the required approval from the CGWA for ground water availability is yet to be obtained, although recommended by the Regional Office of the CGWB at Jaipur. The Committee further observed that more than 70% of the industrial plots (covering 195.820 ha area) would be allotted to automobile industries. Whereas, for rest of the industrial plots it might not be possible for the project proponent to provide the details/categorization of industrial units proposed to come up in the near future. However, the Committee insisted for providing categorization of the proposed industrial units to arrive at its jurisdiction to consider the proposal anymore. The proposal was, therefore, deferred.
3.5.3	The EAC, while deliberations on the proposal especially in response to its earlier observations, noted the following:- (i) Regarding zoning/categorization of industries, the total area of 389.696 ha has been planned in three dedicated zones as under:- • Auto Zone (248.015 ha) • General Zone (87.889 ha) • Land to be given in liew of cash compensation (53.792 ha) Based on the industrial potential, industries already come up in nearby/contiguous industrial areas (Tapukara, Khushkhera and Karoli), proximity to NCT of Delhi, the industrial units/activities likely to come up in the proposed industrial area would include automobile sector support industries, secondary metallurgy processing industry, paint, paper manufacturing industry without pulp manufacturing. These industries would fall under Category A or B listed under item 7 (c) of the Schedule of the EIA Notification, 2006. (ii) The approval for ground water withdrawal from the CGWA is still under process. Presentations were made before the CGWA on 22nd October, 2016 (for industrial category) and 11th February, 2017 (for infrastructure category).
3.5.4	*The EAC, on being satisfied with the submissions of the project proponent in response to its earlier observations, recommended the project for grant of environmental clearance, subject to compliance of all generic conditions applicable for such projects, and the additional conditions as under:-* • *Consent to Establish/Operate for the project shall be obtained from the State Pollution Control Board as required under the Air (Prevention and Control of Pollution) Act, 1981 and the Water (Prevention and Control of Pollution) Act, 1974.* • *To achieve the Zero Liquid Discharge, waste water generated from different industrial operations are to be properly collected, treated to the prescribed standards and then recycled or discharged for the identified uses.* • *Necessary authorization required under the Hazardous and Other Wastes (Management and Trans-Boundary Movement) Rules, 2016, Solid Waste Management Rules, 2016 shall be obtained and the provisions contained in the Rules shall be strictly adhered to.* • *During construction phase, air pollution and the solid waste management aspects need to be properly addressed ensuring compliance of the Construction and Demolition Waste Management Rules, 2016.* • *As per the provisions of the Notification dated 9th December, 2016 amending the Principal EIA Notification, 2006, all the building and construction projects (built up*

	area 5000 sqm - 150000 sqm) in the industrial area, shall require clearances for their building plans from the State/local bodies. In case of project sizes having built up areas more than 150000 sqm, environmental clearances shall continue to be required from the concerned regulatory authorities. • *For all the individual units/infrastructure requirements, environmental clearances as applicable, shall be obtained from the respective regulatory authorities.* • *There are three major forests found in the buffer zone of present study area namely, Khori Kalan PF (East), Banvan PF (East) and Gondhan PF (NE). All these protected forests come under the open scrub land category. A site specific biodiversity conservation plan to be developed including mitigation measures from recognized institute of repute with appropriate financial allocation for its implementation.*
3.6	**Development of SEZ for pharmaceutical and chemical manufacturing units, intake and outfall and for desalination plant at Sy.No. 215,28611, 28612, 28311, in Ch.Lakshmi Puram, 31211 to 31215, 312110 to 312112, 31311 to 31317 of Rajaiahpet, 19 (qart) in Pedda Teernala, 11711 to 11713, 11911, 11912, 12011, 12012, 125, 126, 12911 to 12919, 138, 142, 150, 215, N.Narasapuram village, Nakkapalli Mandal, Visakhapatnam District, Andhra Pradesh by M/s Hetero Infrastructure SEZ Limited - For amendment in Environmental and CRZ Clearance - [F.No.21-641/2007-IA-III]**
3.6.1	The project proponent made a presentation and provided the following information to the Committee:- (i) Earlier, the Environmental and CRZ Clearance was granted on 25th October, 2010 to the project 'Development of SEZ for Pharmaceutical and Chemical manufacturing units intake and outfall and for desalination plant' at Sy. No. 215, 286/1, 286/2, 283/1, in Ch. Lakshmi Puram, 312/1 to 312/5, 312/10 to 312/12, 313/1 to 313/7 of Rajaiahpet, 19(part) in Pedda Teernala, 117/1 to 117/3, 119/1, 119/2, 120/1, 120/2, 125, 126, 129/1 to 129/9, 138, 142, 150, 512 at Narasapuram village, Nakkapalli Mandal in Visakhapatnam District (Andhra Pradesh) promoted by M/s Hetero Infrastructure SEZ Ltd. (ii) The project site is located at 18^0 08' 21'' N Latitude and 83^0 39' 25" E Longitude. (iii) Now, the proposal is for amendment in the Environmental/CRZ Clearance dated 25th October, 2010 due to installation of turbine to generate 6.1 MW power utilizing steam from existing 45 TPH coal fired boiler in existing SEZ. (iv) Total land area is 138.51 ha. No additional land required for proposed installation of turbine in existing SEZ. (v) The details regarding present water requirement and waste water generation are as under:-

Description	As per EC	Utilized	Balance
Water Consumption (KLD)	1674	546.15	1127.85
Wastewater Generated (KLD)	1132	264.15	867.85

As such, there shall be no additional usage of water and wastewater generation on account of installation of turbine in existing SEZ, and could be adequately met with the existing arrangement.

	(vi) No solid waste would be generated due to installation of turbine to generate 6.1 MW power. (vii) The proposed installation of turbine will generate 6.1 MW and same will be utilized for API Units located in Hetero Infrastructure SEZ limited. (viii) **Wildlife issues**: There are no ecologically sensitive areas like national parks, sanctuaries within 10 km radius of the site. (ix) **Cost/Investment**: Rs.11.45 crores for installation of turbine and other accessories for transfer of power. (x) **Employment potential:** No additional employment. (xi) **Benefits of the project:** The project is a net gain, as power is generated with the envisaged utilities only. (xii) There is no court case pending against the project.
3.6.2	The proposal was earlier considered by the EAC in its meeting held on 16-17 January, 2017, wherein the EAC noted that the proposal is for amendment in the Environmental/CRZ Clearance dated 25th October, 2010 due to installation of turbine to generate 6.1 MW power utilizing steam from existing 45 TPH coal fired boiler in existing SEZ. To take forward such proposals, compliance status of earlier EC/CRZ Clearance conditions is essentially required.
3.6.3	The Committee was informed that monitoring of the project was carried out by the Regional Office, Chennai on 6th February, 2017 to ascertain compliance status of environmental/CRZ conditions. Their observations communicated to the project proponent vide letter dated 14th March, 2017 are reported to be as under:- (i) Monitoring of soil samples quality needs to be undertaken by the PP in consultation with APPCB (Specific condition No. xv) (ii) Action plan shall be submitted to the Regional Office of the MoEF&CC to comply with the recommendations suggested by the third party regarding the performance evaluation of the ETP. Approach road to ETP and desalination plant shall be made pucca to reduce dust pollution (Specific condition No. i) (iii) Treated effluent from the ETP is being sent for marine disposal and not being recycled/reused to the maximum extent possible (Specific condition No. i) (iv) Monitoring of ground water level has not been undertaken in consultation with the CGWA (Specific condition No. viii). (v) No paper advertisement has been given regarding the accord of environmental clearance by the Ministry (Para No.11) (vi) Project proponent has not uploaded the environment clearance letter on the company's website (Para No.14) (vii) Six monthly compliance reports along with the monitored environment data (AAQ/stack/noise) have not been uploaded on the company's website (Para no.15) (viii) Environmental statement has not been uploaded on the company's website as stipulated in the EC condition and also not submitted to the Regional Office of the MoEF&CC (Para No.16) The Committee further observed that the Regional Office has asked the project proponent to take necessary corrective action to comply with the above observations and send action taken report on implementation within a month. The Committee also desired to know the proposed location of turbine, whether in CRZ area or not.

3.6.4 *Pending any satisfactory report from the Regional Office, Chennai on compliance status of EC conditions, the EAC was not inclined to recommend the proposal for amendment in the Environmental and CRZ clearance dated 25th October,2010. The proposal was, therefore, deferred.*

Day 2nd: 7th April, 2017

3.7 **Industrial Estate (Phase-II) at Barwala, Haryana by Haryana State Industrial & Infrastructure Development Co. Ltd – Environmental Clearance – [F.No.21-36/2015-IA-III]**

3.7.1 The project proponent made a presentation and provided the following information to the Committee:-

(i) The project involves Industrial Estate (Phase-II) at Barwala, Haryana promoted by Haryana State Industrial & Infrastructure Development Co. Ltd.
(ii) The project is categorized as 7(c) project as per the schedule under the EIA Notification, 2006. This is a project going to develop on plot area of 557.75 acres or 225.71 ha.
(iii) The area statement is as follows:

Area Statement for phase –II

S. No.	Description	Area in sqm	Area in acres
1.	Total Area	2257117	557.75
2.	Area to be Planned Later	11250	2.78
3.	Net Planned Area	2245867	554.97
	Land Use		318.54
4.	Area Under Industrial Plots	982731	242.84
5.	Area Reserved for Institutional Purpose	96881	23.94
6.	Area Reserved for Commercial Purpose	23310	5.76
7.	Area Reserved for RR Policy	186154	46.00
	Utilities		
8.	Area Under Electric Substation	12140	3.00
9.	Area Under OHSR	18494	4.57
10.	Area Under Fire Station	8053	1.99
11.	Area Under ESI Dispensary	5544	1.37
12.	Area Under CETP	6030	1.49
13.	Area Reserved for Multilevel Parking	14771	3.65
14.	Area Under Solid Waste Disposal Site	6273	1.55
15.	Area Under Roads & Open Spaces	697530	112.45
16.	Open Area	135090	33.38
17.	Green Area	27429	6.78
18.	Green Belt	25437	6.29

19.	Green Avenue	2,42,447	59.91

(iv) About 43.76% of the net plot area will be under industrial plot, 5.35% under institute and commercial use, 8.29% will be under R & R residential plots, 42.6% under electric substation, OHSR, fire station, ESI dispensary, CETP, multilevel parking, solid waste disposal site, under roads and open space, open area, green area, green belt, green avenue.

(v) **Types of Industries:** Different types of industries will be developed in Industrial Estate. Some of them are:

- Manufacturing Industries.
- Automobiles industries.
- Mechanical Industries.
- Rubber industry.
- Readymade garments industry

(vi) Cost of the Proposed Scheme: As to date HSIIDC have acquired 557.75 acres of land has been allocated for Industrial Estate Phase-II at Barwala. The project cost that HSIIDC allocated to 557.75 acre:

Land cost: 277.59 crores

Development cost: 238.23 crores

(vii) **Power Requirement:** For power requirement a 66 kV sub-station is proposed to supply power in the area.

(viii) **Water Requirement:** Total water requirement is 10.80 MLD in phase-II. Total fresh water requirement of the project phase-II is estimated as 6.14 MLD. The fresh water requirement will be fulfilled by ground water.

(ix) **Estimation of Waste Generation and Disposal Methodology:** The total fresh water requirement is estimated as 6.14 MLD. Of this, a total of 4.65 MLD will be used for flushing, horticulture & DG cooling, HVAC cooling etc. Total waste water generation will be 6.31 MLD. A CETP of 6.5 MLD capacity will be provided for treating the effluent which will be treated till tertiary level & used within the project premises for various purposes.

(x) **Rain Water Harvesting:** Storm Water Drainage scheme is designed as per Guidelines laid in Manual of Sewerage issued by Ministry of Works & Housing, Govt. of India. As per proposal for Storm Water Drainage the storm runoff from the area will be drained off in the master storm drain and adjoining river. Master storm drain is proposed on the northern side as open channel with a capacity of 90 cumecs. This drain shall cater to the storm water/ rain water passing through bridge no 1. The existing creak passing through bridge no 1 will be abandoned and diverted in to the proposed lined open drain which would ultimately discharge in to the main river. The internal storm water would be laid in the shape of RCC NP3 pipes along the internal roads.

(xi) The wastes generated from an Industrial Estate will be varied comprising industrial, domestic, institutional, Bio-medical and landscape wastes. Total quantity of solid waste generation will be 40 MT/day.

(xii) ToR Details: ToR was granted vide letter dated 18th June, 2015.

(xiii) Public Hearing: Public Hearing was conducted on 7th October, 2016 at Berhampur University playground under Konisi Tehsil, Ganjam District of Odisha.

3.7.2 The EAC, while deliberations, noted the following:-

(i) The categorization of industries to be housed in the proposed industrial estate is yet to be firmed up which would decide the jurisdiction for project appraisal at the

	State or Central level. (ii) To meet the water requirement of 6.14 MLD, Haryana Irrigation and Water Resources Department has expressed its inability due to their no canal network/system. As such, there is no other option but to resort to the ground water availability which was not allowed while granting the ToR. (iii) The project site has been categorized into 'critical' category as per the latest ground water assessment done by the CGWB. For ground water withdrawal to meet the requirements for infrastructure projects, a formal request is yet to be made by the project proponent to the Ground Water Cell/Department in the State Government for recommending to the CGWA. (iv) The details contained in the EIA/EMP reports are deficient in respect of the ecological aspects. There is no distribution of *Ratufa indica* (Indian Giant Squirrel) in North India. Himalayan Black Bear is shown in the list of mammals in the project site, which is not found in this area. Similarly, three-striped Palm squirrel as mentioned in the mammals list actually occurs south of Narmada River whereas Five-striped Palm Squirrel are found in this area.
3.7.3	*The proposal was deferred for want of inputs as stated in para 3.7.2 above.*
3.8	**Multi-Product SEZ/Industrial Park at Gopalpur Village, Ganjam District in Odisha by M/s TATA Steel Special Economic Zone Limited, Gopalpur – Environmental Clearance – [F.No.21-136/2015-IA-III]**
3.8.1	The project proponent made a presentation and provided the following information to the Committee:- (i) The proposal involves Multi-Product SEZ/Industrial Park at Gopalpur Village, Ganjam District in Odisha promoted by M/s TATA Steel Special Economic Zone Limited. (ii) The project is located at 19° 19' 35" N Latitude and 84° 55' 10" E longitude. (iii) The project activity is scheduled in 7 (c), Category A - Industrial Estates / Parks / Complexes/Areas, Export Processing Zones, Special Economic Zones, Biotech Parks, Leather complexes. (iv) During construction phase, total water requirement is expected about 15 KLD which will be met by rainwater harvesting, ground water sources/tankers. During the construction phase, soak pits and septic tanks will be provided for disposal of waste water. Temporary sanitary toilets will be provided during peak labor force. (v) During operational phase, total water demand of the project is expected to be 33.5 MLD and the same will be met from (Source: Desalination plant - 15 MLD, other sources (rain water harvesting, ground & surface water) - 7 MLD & recycled water-11.5 MLD (22 MLD fresh water + 11.5 MLD treated water). Wastewater generated (15 MLD) will be treated in CETP & STP. 14.5 MLD of treated waste water will be recycled (11.5 MLD for Industrial use/flushing, 7 MLD for landscape/Greenbelt and excess treated water shall be discharged to the sea along with brine. (vi) About 14.6 TPD solid wastes will be generated in the project. The biodegradable waste (7.8 TPD) will be processed in Organic Waste Converters into manure and the non-biodegradable waste generated (6.8 TPD) will be handed over to

	authorized local recyclers/re-processors. (vii) The total power requirement during construction phase is 255 MW and will be met from state grid. In Phase-I, 55 MVA & Phase-II 200 MVA power supply is proposed to be tapped from the existing Narendrapur 220kV substation. (viii) Rooftop rainwater of buildings, roads & greenbelt will be collected in Rain water harvesting tanks and the collected water will be utilized after filtration. A Storm water retention pond/reservoir (6 lakh cu.m. capacity) is proposed. (ix) Utilities, rail & road corridors, Heavy vehicle parking etc. are proposed in 283 acres of industrial park. (x) **Diversion of forest land –** Yes, Stage-I approval for diversion of forest land (3.792 ha) has been obtained from MoEFCC, Eastern Regional Office, Bhubaneswar (Letter no: 5-ORB295/2016-BHU dated 19th December, 2016. (xi) Energy saving measures would be adopted and solar lighting is proposed for street lights & common areas etc. (xii) It is not located within 10 km of any Eco Sensitive areas. (xiii) There is no court case pending against the project. (xiv) **Investment/Cost** of the project is estimated to be Rs.1920 crores. (xv) **Employment Potential** – Around 15000 direct and indirect job opportunities will be generated by the proposed project development by 2027. Preference would be given to the local people for engagement opportunities and the govt. guidelines would be followed in this regard. (xvi) **Benefits of the project** – a) SEZ/Industrial parks support start ups, new enterprise incubation, development of knowledge – based business, and offers an environment where local and international firms can interact with centers of knowledge creation. b) They act as innovation club, promoting interactive learning and the commercialization of research outputs and can exploit local entrepreneurial skills c) Able to attract new business by providing an integrated infrastructure at single location and will attract the International & national markets with Exports & Imports d) Improvement in communication, transport, education, community development and medical facilities. e) Overall change in employment and income opportunity. f) The State Government will also benefit directly from the proposed SEZ/Industrial Park through increased revenue from royalties, excise duty and stowing duty. g) Additional housing demand for rental/Permanent accommodation will increase. (xvii) **ToR details**: ToR was granted vide letter No.21-136/2015- IA.III dated 12th November, 2015. (xviii) **Public Hearing:** The Public Hearing was conducted on 02.12.2016 at Berhampur University playground under Konisi Tehsil, District Ganjam (Odisha). (xix) **If project is in CRZ Area** – As the project is going to utilise desalinated water to meet its water requirement from Bay of Bengal – 2.2 km (SE). Tata Steel has been granted CRZ Clearance from OCZMA and MoEF on 16th June 2012 and 18th March 2013 respectively for 1.2 MGD (5.5 MLD) desalination plant in phase –I. (F.No: 11-62/2012-IA.III:18th March, 2013). This clearance is for the intake volume of 568 m3/hr (initial Phase), 28406 m3/hr (Final Phase) and brine discharge of 341 m3/hr (Initial Phase), 20831 m3/hr (Final Phase).

3.8.2	During deliberations, the EAC noted that the proposal is development of multi-product SEZ/industrial park in a total area of 1009 ha with a total water requirement of 33.5 MLD. Out of it, 15 MLD is proposed to be met through desalination plant which would essentially require sea water intake and outfall facility in CRZ area. As such, the proposal first requires recommendations of the State Coastal Zone Management Authority in this regard. The project proponent informed that the CRZ clearance was granted by the Ministry on 18th March, 2013 for 'Sea water intake and brine discharge from 1.2 MGD desalination plant for 400000 TPA for Rebar Mill & 55 TPA Ferro Chrome plant' at Gopalpur village, District Ganjam (Odisha). The said desalination plant shall be partly meeting the water requirement for the proposed SEZ. The Committee took cognizance of the same, and clarified that the SEZ project would require enhancement of existing intake and outfall facilities, and thus requires fresh concurrence from the Odisha CZMA in the name of M/s Tata Steel SEZ Ltd (a subsidiary of M/s Tata Steel Ltd).
3.8.3	The EIA report has serious deficiencies on ecological and biodiversity aspects, as listed below:- **Methodology** 1. The dominance index is never multiplied by 100 which is done in the report. The dominance index is always expressed from 0 to 1. The formula given in the report seems to denote 'Relative abundance' and not dominance index. 'Relative abundance' can be expressed in percentage. 2. 'Cencex Index' which has been mentioned in report seems to be a case of spelling mistake. If the author wants to do a 'census' of bird species found, then the calculation will be different. According to the formula given of the 'Cencex Index' calculates 'Density'. In that case, the formula has to be modified according to the method (point count or transect) used for counting birds. 3. 'Species Richness Index': It cannot be expressed as total number of species found in an area. If author is mentioning the word 'Index' then they have to use appropriate formula to calculate the species richness of each site. 4. 'Species Diversity Index': The formula for Margalef diversity index is [d= (S-1)/ln N], Where S is the number of species, and N is the total number of individuals in the sample. The formula given in the report is not very clear. After mentioning these many indexes in the report only one index has been calculated which is mentioned in the report as diversity index. **Birds** 1. There are gross mistakes in common and scientific name of birds. For example, Large Cuckoo-shrike *Coracina macei* is mentioned as 'Indian large cuckoo shrink'. This is a resident species with distribution range covering the whole of India. It is not 'migratory in habit' as mentioned in the report. The whole table in Annexure V for birds have to be reworked as most of the species names are incorrect in terms of spelling mistakes and way of writing. '*Tyto capensis*' mentioned in the report is 'African Grass Owl' which is not found in Indian subcontinent. *Larius ridibundu* is correctly written as '*Larus ridibundus*'. According to the current classification it has been updated to '*Chroicocephalus ridibundus*'

	which is 'Black-headed Gull'. In the same row the common name of the species is mentioned as 'Wook Peaker Black' which in not only incorrect species but has also been spelled incorrectly. **Butterflies and Insects** i) Overall no proper; rather wrong information is produced about insect's biology. There are mistakes in insect classification also. Most of the members of Family Nymphalidae are included in Family Hesperiidae while there is no mention of any member of latter one. Pupal stage of the butterfly is metamorphic phase and do not feed voraciously as stated in the report. ii) Common names and scientific names of almost half of the species do not match. Hence it is difficult to know their occurrence status. Following species are mainly restricted to Northernmost and north-east part of India but still they have been included in the report. Common batwing *Atrophaneura varuna* is found only in northern part of India (Kumaon to Sikkim, Assam). Common Raven *Papilio caster* is found in Sikkim, Assam Burma only. Blue Peacock *Papilio arcturus* is found only in west Kashmir to Sikkim, Assam and Burma. **Amphibians and Reptiles** i) Rattle snakes are found only in North America and Mexico and not in India. ii) *Mabuya* is a genus of long-tailed skinks restricted to species from the America. iii) *Chameleon calcaratus* is a reptile and not a mammal species. Moreover, this Chameleon species is only found in Saudi Arabia. **Fishes** The checklist is outdated and is far away from current trends in freshwater fish taxonomy. i) *Oxygaster argentea* (Day 1867) – its described from Bhavani River, tributary of Kaveri River. Nothing is known about this species except first description. Very unlikely to occur in Ganges plain. ii) *Ailla coha*: There is no such species or genus exists.
3.8.4	*The proposal was not taken forward due to the observations of the EAC as at para 3.8.2 and 3.8.3 above. It is thus advised to get a fresh concurrence from the Odisha CZMA in the name of M/s Tata Steel SEZ Ltd (a subsidiary of M/s Tata Steel Ltd). It is also advised to get one season rapid survey for biodiversity including its conservation plan from recognised institute of repute. The proposal can then be placed to the Committee for consideration of EC.*
3.9	**Development of Baggad Industrial Area near Village Baggad, Tehsil Bhim, District Rajsamand (Rajasthan) by M/s RIICO Limited - Environmental Clearance - [F.No.21-103/2015-IA-III]**
3.9.1	The project proponent made a presentation and provided the following information to the Committee:- (i) The project involves Industrial Area Development (Baggad Industrial Area) near Village Baggad, Tehsil Bhim, District Rajsamand (Rajasthan) by M/s RIICO Limited. The project is located at 25°35'59.77"N Latitude and 73°53'53.74"E longitude. (ii) The total Area of the proposed project site is 98.754 ha as per revenue records. Industrial as well as Commercial plot are planned to be developed 266

		nos. of plots will be developed. Area under industrial plots 61.586 ha., area under commercial plots are 3.254 ha. 21.852 ha. is reserved for roads while 2.991 ha. is reserved for services. Area under green buffer is 3.672 ha. while area reserved for future planning3.420 ha. (iii) During construction phase, total water requirement is expected to be 15 KLD which will be met by Groundwater. During the construction phase, soak pits and septic tanks will be provided for disposal of waste water. Temporary sanitary toilets will be provided during peak labor force. (iv) Baggad Industrial area has a total area of 107.05 Ha and a total of 266 industrial plots which will be developed along with the commercial. (v) Due to presence of Todgarh Roali Wildlife sanctuary located at 3.37 km from the proposed industrial area, Project Falls under Category "A" Schedule No. 7 (c) Industrial estates /Parks/ Complex/ areas, export processing Zone, Special Economic Zones (SEZs), Biotic Parks, Leather complex as per MoEFCC"s EIA Notification 2006 and further Amendment (2009). (vi) The industries which are proposed, Mineral Grinding, Marble Processing, Engineering works, Mineral-based Industries will come-up in the proposed Industrial Area also, in addition to promoting the drug formulation unit. No Category A type of industries as per EIA Notification, 14th September, 2006 as amended on 1st December, 2009 is anticipated. (vii) **Water requirement: Industrial zone**: During operation phase, the total water requirement of Industrial zone of proposed project would be 1203 KLD excluding 530 KLD treated water. The water requirement during operation phase will be met by RIICO through ground water. Any extra requirement of water other than the quantity stated above will be arranged by the industries themselves. Expected industries to be proposed at project area viz. (Marble, granite, minerals, & engineering) which are of zero discharge, so CETP will not be proposed at site. Residential zone: Water requirement of residential zone of proposed project is 1206 KLD. Water requirement of green area (350 KLD) will be fulfilled by treated Domestic waste water (treated by STP). Separate distribution network shall be provided for recirculation of STP treated water for use in green area. (viii) About 300 kg/day solid waste will be generated in the project. The biodegradable waste will be processed in OWC and the non-biodegradable waste generated will be handed over to authorized local vendor. (ix) Approximately 10 to 15-kg of municipal solid waste will be generated from the construction camp and construction site. This will be collected and disposed off in a fenced pit dugout at the site and covered properly after completion of construction activity. Waste management would be the responsibility of individual industries. Individual industry will provide system for municipal solid waste collection, storage and disposal. Each industry shall have to comply with the Municipal Solid Waste Management Rules, 2000 and amendments therefore. Approximately 2000 persons will be involved during the operation phase of the project. Taking into consideration approximately 0.15-kg/person/day of municipal solid waste generation, the total municipal waste generation in the proposed industrial area will be about 300-kg/day (x) No Waste water will be discharge outside the RIICO premises. All units will follow the ZLD policy. (xi) The power requirement during construction phase shall be met through DG set and total power requirement during operation phase is around 2 MVA. The power requirement during operation phase will be met from 2 MVA Grid Sub-Station (GSS) by Ajmer Vidyut Vitaran Nigam Limited.

	(xii) Rooftop rainwater of buildings will be collected in 5 RWH tanks and sub surface barrier to recharge total 320 KLD water after filtration. (xiii) Parking provision for commercial and personal vehicles will be the responsibility of individual occupant. (xiv) **Cost of the project**: Aprox Rs.3937-Lakhs. (xv) **ToR details**: ToR was granted vide letter No.21-103/2015-IA.III dated 18th June, 2015. (xvi) **Public Hearing**: The public hearing was conducted on 17th January, 2017, Gram Panchyat Building Village Baggad, Teshil-Bhim. (xvii) **Employment potential**: During construction phase the requirement of labour will be 75 persons per day. Local labours will be employed from the surrounding villages. During Operational phase, there will be both Direct and Indirect employment generation. About 2000 persons will be directly employed by RIICO itself for maintenance of the industrial area, among which 500 persons will be skilled labour. Besides, it is expected that the individual industries may generate employment opportunity for approximately 10,000 persons in total. (xviii) **Benefits of the project**: The proposed project will help in the development of infrastructure for sitting the industrial estate with commercial facilities, which will provide a total of 266 industrial plots, with different plot sizes. This infrastructure development will provide a support for the upliftment of the overall area. Hence, due to the project the overall area will get better road connectivity and other supporting infrastructure.
3.9.2	During deliberations, the EAC noted the following:- (i) The proposed industrial area in a total area of 103 ha, would house mineral/marble based industries with the raw material obtained from Udaipur and nearby areas. (ii) Proposed industrial area is at a distance of 3.3 km from the boundary of Todgarh Raoli Wildlife Sanctuary, for which the necessary recommendations from the Standing Committee of NBWL and subsequent permission from the State Chief Wildlife Warden has been obtained. (iii) During the public hearing conducted on 17th January, 2017, issues were raised regarding pollution problems, land acquisition, employment opportunities, loss of agricultural land, drying of wells etc. None of the participants has supported the proposal. (iii) The project area is 6.44 km away from Kumbhalgarh Wildlife Sanctuary as well as Kumbhalgarh IBA. It is also one of the best protected forests remaining in the Aravalli mountains. Moreover, the project site is also 3.67 km away from Todgarh Raoli Wildlife Sanctuary. Also species listing is erroneous. *Agama tuberculata* or Kashmir Rock Agama is found in North Pakistan, India (West Himalaya, Kashmir, Punjab), Nepal (Kathmandu), Afghanistan, and China (Tibetan Plateau). None of the *Scincilla* spp. of Skink is found in India.
3.9.3	*The proposal was not taken forward, especially in view of the outcome of the public hearing, and desired that the Ministry may also suggest the course of action in such matters. Further to have correct assessment of the site specific issues, a sub-committee of the EAC shall inspect the project site, verify the relevant*

	document/reports and furnish its report to MoEF&CC, which would be placed before the EAC for further consideration of the proposal.
3.10	**Widening and upgradation of km 0.000 to km 130.000 of SH-68 Section from Dangiyawas to Balotra in the state of Rajasthan by M/s PWD Rajasthan - Terms of Reference - [F.No.10-7/2017-IA-III]**
3.10.1	The project proponent made a presentation and provided the following information to the Committee:- (i) The project involves widening/upgradation of 2 laning of km 0.000 to km 130.000 of **SH-68** of the Section from Dangiyawas to Balotra in the state of Rajasthan. (ii) Linear Project located in Jodhpur and Barmer District of Rajasthan State (Border State). The project road starts at 26^{o}15'55"N Latitude & at 73^{o}17'16"E longitude at its junction with NH-25 near Dangiyawas and ends at 25^{o}49'41"N Latitude & at 72^{o}16'08"E at its junction with SH-28 in Balotara town in Barmer district. (iii) About 40 to 41% of the project road passes through the agricultural land, followed by built-up areas about 51% and barren land about 8%. The following Table summarizes the Land use along the project. (iv) The widening / upgradation will be undertaken along the existing alignment of SH-68. The major difficulties with following an entirely new alignment or major realignments are the magnitude of land acquisition and social disruption likely. Therefore, as an alternative, the project has adopted the policy of widening within existing alignment in order to minimise new land requirements and negative environmental and social impacts. Major benefits of the project are: • To provide easy access to commuters from Dangiyawas to Balotara via Pithawas, Kakelao, Khejarli, Gudha Bishnoi, Barna, Kakani, Shikarpura, Luni, Satlas, Doodiya, Dhundara, Miyan ka Bara, Ajit, Bharalon ka Bara, Bhanawas, Samdari, Rani Desipura, Jethantari, Parloo, Karana & Janiana. • The project road links NH 25, NH 62, SH 66 and SH-28 hence will provides easy access to traffic between Jodhpur & Barmer Districts. (v) The project is an expansion project which includes widening & upgradation of existing Dangiyawas Balotara (SH-68). The total Length of the project road is 130km. Existing right of way available for the project road varies from 15 to 30m which has been proposed to widened to 30m. The project envisages construction of 8 bypasses to avoid traffic congestion in the built up areas enroute. (vi) The project road is approximately130 km long. The project road lies in Jodhpur & Barmer districts of Rajasthan. Dangiyawas to Godon ka Bara i.e. from km 0.000 to 78.5 falls under Jodhpur district and Godon kan bara to Balotra from km 78.5 to 130.000 is under Barmer district. The project road traverses through the settlements like Dangiyawas, Pithawas, Kakelao, Khejarli, Gudha Bishnoi, Barna, Kakani, Shikarpura, Luni, Satlas, Doodiya, Dhundara, Miyan ka Bara, Ajit, Bharalon ka Bara, Bhanawas, Samdari, Rani Desipura, Jethantari, Parloo, Karana & Janiana. (vii) The project districts are Jodhpur & Barmer in Rajasthan State. The neighbouring districts are Jaisalmer in the West, Nagaur & Sikar in the East, Bikaner in the North and Ajmer, Pali & Jalor in the South. (viii) The existing carriageway configuration of the project road varies from single lane to two lanes. About 66.2 km is having single lane carriageway, 9.2 Km intermediate lane, 54.3 Km two lane and 0.3 km four near Balotara. To cater the future traffic, the project proposes to:

	• Widening to two lanes with granular shoulders except in settlement where two lanes with paved shoulders and closed drains are proposed; • Development of 15 major & 44 minor Junctions & intersections; • Construction of 12 minor bridges, 85 Box Culverts & 13 Pipe Culverts, • Construction of 2 Road Over Bridges; • Construction of 8 Bypasses to Pithawas, Luni, Satlana, Bachrana, Dhundhara, Bhanawas, Samdari & Parloo habitat areas to avoid impact on structures in built-up areas & • Realignment at 20 locations to improve highway geometrics; • 6.180 Km of Lined drain & 126.613 Km of Unlined Drain have been proposed along the entire length of road • Proposed project road Section shall be having the 3 Toll Plazas; • Provision of 12 bus bays & Bus Shelters and other amenities. (ix) **Cost of the project**: The estimated Total Project Cost is INR 30729 Lakhs at 2016-17 price level (x) **Whether the project is in Critically Polluted area**: No (xi) If **the project involves diversion of forest land, extend of the forest land**: Yes Application of forest clearance is yet to be submitted (xii) **If the project falls within 10 km of eco- sensitive area, Name of eco-sensitive area and distance from the project site:** The project roads is a SH expansion project in ecologically sensitive area. The project crosses Gudha Vishnoiyan Conservation Reserve, a Protected Area notified under the Wildlife (Protection) Act, 1972. (xiii) **Employment potential**: 223000 man days during construction period of 2 years and 323300 man days during Operation period of 10 years shall be generated (xiv) **Benefits of the project**: The project will improve connectivity, enhance traffic efficiency, reduce vehicle operation cost and will provide socio-economic benefits besides employment generation and better connectivity in a large area of Jodhpur and Barmer districts in Rajasthan.
3.10.2	*The EAC, after detailed deliberations, recommended the proposal for grant of ToR to the expansion/upgradation project of the State Highway, and for preparation of EIA/EMP reports with public consultations subject to compliance of all conditions as specified and notified in the standard ToR applicable for highways. It was also advised to include studies in line with the recent guidelines prepared by Wildlife Institute of India for linear infrastructure with strong emphasis on animal movement and identifying crossing areas and mitigation measures to avoid wildlife mortality.*
3.11	**Combined Development of Harohalli Phase II & III Industrial Area' at Kanakapura Taluk of District Ramanagara (Karnataka) by KIADB – Environmental Clearance – [F.No.21-142/2015-IA-III]**
3.11.1	During the meeting, the project proponent made a presentation and provided following information to the Committee:- (i) The project is for combined development of Harohalli Phase II & III Industrial Area at Harohalli village, Kanakapura taluk, District Ramnagara (Karnataka). (ii) It will provide hassle free production environment for industries like machine

	components & fabrication, plastic bags & packaging accessories, textiles & readymade garments, granite cutting & polishing, corrugated boxes & allied products, electronics/ telecommunication, general engineering, automotive, aerospace, agro and food processing/chemicals, media & entertainment, rubber & plastic units, handicrafts etc. (iii) Total area earmarked for the proposed combined industrial area is about 904.86 ha (Phase II - 371.92 ha and Phase III - 532.94 ha). Presently most of the Phase II is under operation for which EC has been obtained from Karnataka SEAC in 2013 and Phase III is covered with Mango gardens, plantations of Teak, Coconut, Malabar Neem, Mahogany and Eucalyptus. The role of the KIADB for the proposed industrial area will consists of developing common infrastructural facilities - roads, water source, power, drainage, street lightening, greenbelt, CETP and CSTP etc. Social Infrastructure - banks, post office, canteen, primary health center etc. (iv) **Water requirement**: The total water requirement will be 11360 KLD which will be sourced through Vrishabhavati treatment plant and Cauvery River water from BWSSB. (v) **Waste water generation**: 5282 KLD will be treated in CETP/CSTP for recycling & reusing. (vi) **Municipal solid waste**: About 5000 kg/day will be disposed to nearest municipal bins. (vii) **Power requirement**: Total power required is 8000 kW and source is BESCOM. (viii) **RWH**: Individual industries will develop their own rain water harvesting structures in their respective plots and storm water drains will be developed all along the road. (ix) **Parking facility**: Common parking area of 7.84 Ha (Phase II) and 39.24 Ha (Phase III) is provided for the heavy industrial trucks and heavy vehicles. (x) **Investment/Cost:** Cost of the project (development of industrial area) is Rs.1561 Crores. (xi) **Benefits of the project**: • Industrial areas support startups, new enterprise incubation, development of knowledge – based business and offer an environment where local and international firms can interact with centers of knowledge creation. • They act as innovation club, promoting interactive learning and the commercialization of research outputs and can exploit local entrepreneurial potential. • Able to attract new business by providing an integrated infrastructure in one location. • To set aside industrial uses from urban areas to try to reduce the environmental and social impact of the industrial uses. • To provide for localized environmental controls those are specific to the needs of the industrial area. (xii) **Trees cutting**: There will be tree cutting of around 7700 species in the proposed site and transplantation will be carried out wherever possible. For every tree cutting plantation will be carried out in 1:3 ratio in the greenbelt areas. (xiii) **Employment potential**: About 23,500 people will get employment. (xiv) **Court cases, if any**: No. (xv) **ToR details**: The ToR was accorded to the project by the Ministry vide letter No. 21-142/2015-IA.III dated 1st February, 2016. (xvi) **Public Hearing**: Public hearing was conducted on 23rd December 2016 at the

	project site near Kavitha Farm, Jakkasandra-Cheelur Road Harohalli hobli, Kanakapura taluk, District Ramnagara (Karnataka). Major issues raised were:- • Pollution problems illegal disposal of the effluents into the water bodies by the existing industries in the industrial area. • Providing employment to the local villagers in the proposed industries. • Maintenance of existing greenery in addition to the proposed afforestation • Disparity in land compensation • Maintaining buffer area between industries and village limits.
3.11.2	During deliberations, the EAC noted that given the details in respect of industrial units/activities proposed in the industrial area, none of them seems to be covered either under category A or B in terms of the schedule to the EIA Notification, 2006. The Committee further observed that even if the area involved is more than 500 ha, and the project site is within 5 km of the inter-state boundary, proper categorization of industries is essentially required to arrive at the justification and efficacy of the proposed CETP, CSTP and other infrastructural requirements, and to ensure the environmental safeguards accordingly. The Committee was also not convinced with the response/action plan of the project proponent on the issues raised during public hearing, especially regarding pollution problems due to the existing industries in the industrial area, employment, land acquisition and the disparity in compensation thereof. The project proponent was asked to submit the proper action plan on the suggestions given by the chairman, public hearing panel.
3.11.3	*The proposal was deferred for want of inputs and more clarity on the EAC's observations as above.*
3.12	**Chamarajanagara Industrial Area at Badanakuppe and Kallambelli villages, Chamarajanagara Taluk & District (Karnataka) by M/s Karnataka Industrial Areas Development Board (KIADB) - Further consideration for Environmental Clearance - [F.No.21-58/2015-IA-III]**
3.12.1	During the meeting, the project proponent made a presentation and provided the following information to the Committee:- (i) The project involves setting up of Chamarajanagara Industrial Area at Badanakuppe & Kallambelli villages, Chamarajanagara Taluk & District (Karnataka) promoted by Karnataka Industrial Areas Development Board (KIADB). The project is located at 11° 58' 55.70" N Latitude and 76° 52' 59.35" E longitude. (ii) The project is covered under category A of item 7 (c) 'Industrial Estates/Parks/Complexes/Areas, Export Processing Zones, Special Economic Zones, Biotech Parks, Leather complexes in the schedule to the EIA Notification, 2006. (iii) Total area required for the development is 591.04 ha. (1460.47 Acre). (iv) During construction phase, total projected water requirement of 20 KLD is proposed to be met through ground water sources/tankers. During the construction phase, soak pits and septic tanks will be provided for disposal of waste water. Temporary sanitary toilets will be provided during peak labor force. (v) During operational phase, total water demand of the project is expected to be

	10068 KLD and the same will be met by the 6117 KLD fresh water & 3951 KLD recycled water. Wastewater generated (4158 KLD) uses will be treated in 2 STPs (2*0.6=1.2MLD capacity) & 1 CETP of 5 MLD capacity. 3951 KLD of treated waste water will be recycled (395 KLD for Industrial use/flushing & 3556 KLD for gardening). After usage remaining treated water (if any) will be disposed in to municipal drain. (vi) It is proposed that the industrial park will stick to the Zero Liquid Discharge policy to avoid contamination of the nearby areas and the groundwater. A systematic CETP and STP are operational 24 Hours to treat the wastewater generation from different systems. Wastewater treated from these facilities will be used as a secondary purpose in the industries and also for the landscape development. (vii) About 9 TPD solid wastes will be generated in the project. The biodegradable waste (6 TPD) will be processed in OWC and the non-biodegradable waste generated (2.8 TPD) will be handed over to authorized local vendor. (viii) Total power requirement during construction phase is 100 KVA and will be met from KPTCL/other sources and total power requirement during operation phase is 6 MW and will be met from KPTCL. (ix) An area of 33% will be left for development of greenbelt from the total project area (including 20% of Individual Industries). 15 m wide along the boundary, 2 m along the internal roads and along the internal boundary of individual industries, and in open areas. Plantation will be taken up immediately after obtaining necessary statutory clearances. Local species of 2 to 3 years old will be used for plantation. (x) Over all RHH from Rooftop rainwater of buildings, roads & greenbelt will be collected in RWH tanks of total with a flow of 65957 m^3/hr capacity for harvesting after filtration. (xi) Truck Parking facility is proposed in 73 acres of industrial area. (xii) Proposed energy saving measures would save power as per the procedure. (xiii) **Wildlife issues:** It is not located within 10 km of any Eco Sensitive areas. (xiv) There is no court case pending against the project. (xv) **Investment/Cost**: The total cost of the project is Rs.91 Crores, cost towards environmental mitigation measure is about Rs.26.56 Crores and for CSR activities Rs.1.96 Crores. (xvi) **Employment potential:** Around 17,000 jobs will be generated due to the proposed project. Employment will be given based on the qualifications and minimum prerequisite conditions will be placed before the selection of candidate based on the nature of the job. (xvii) **Benefits of the project**: To development Industrial development in the region, Local employment improvement & Infrastructure & amenities will be developed. (xviii) **ToR Details:** ToR was granted by the MoEF&CC vide letter No.21-58/2015-IA-III dated 19th June, 2015. (xix) **Public Hearing**: Public Hearing was conducted on 20th July, 2016 at the project site i.e. Chamarajanagara Industrial Area, Badanakuppe & Kallambelli Village, Chamarajanagara Taluk & District (Karnataka).
3.12.2	The proposal was earlier considered by the EAC in its meeting held on 16-17 January, 2017, wherein the EAC observed that no details were available regarding industrial units/activities including their categorization (whether A or B), to be housed in the proposed industrial area, and as such, there was partial compliance of the terms of reference issued for the project on 19th June, 2015. The Committee further noted that details are essentially required to justify the efficacy of the proposed CETP, disposal of hazardous waste and also to stipulate the conditions accordingly. The

	proposal was deferred for want of the desired inputs from the project proponent.
3.12.3	While deliberations, the EAC noted the following:- (i) The proposed industrial area envisages to house industrial units/activities engaged in secondary metal processing, which may be considered to be covered under category B. As such, in view of the area more than 500 ha, the proposed industrial area would be covered under category A of item 7(c) of the schedule to the EIA Notification, 2006, and thus requiring appraisal at the Central level. (ii) Total water demand for the project is estimated as 10068 kl per day, proposed to be met through fresh water of 6117 kl and 3951 kl of ground water. Fresh water source has been identified as Kabini river, for which the required permission from the Cauveri Neeravari Nigam Ltd has been obtained. (iii) Total waste water generation would be 4158 kl per day from various stages of industrial operations, which shall be treated in the proposed CETP of 5 mld and the CSTP of 1.2 mld to ensure Zero Liquid Discharge from the industrial area. (iv) An amount of Rs.26.56 crore allocated for the EMP seems to be adequate to take all environmental safeguards, and thus to ensure compliance of the all the statutory provisions. That would greatly address the public concerns also raised during the public hearing.
3.12.4	*The EAC, on being satisfied with the submissions of the project proponent in response to its earlier observations, recommended the project for grant of environmental clearance, subject to compliance of all the generic conditions applicable for such projects, and the additional conditions as under:-* • *Consent to Establish/Operate for the project shall be obtained from the State Pollution Control Board as required under the Air (Prevention and Control of Pollution) Act, 1981 and the Water (Prevention and Control of Pollution) Act, 1974.* • *To achieve the Zero Liquid Discharge, waste water generated from different industrial operations are to be properly collected, treated to the prescribed standards and then recycled or discharged for the identified uses.* • *Necessary authorization required under the Hazardous and Other Wastes (Management and Trans-Boundary Movement) Rules, 2016, Solid Waste Management Rules, 2016 shall be obtained and the provisions contained in the Rules shall be strictly adhered to.* • *During construction phase, air pollution and the solid waste management aspects need to be properly addressed ensuring compliance of the Construction and Demolition Waste Management Rules, 2016.* • *As per the provisions of the Notification dated 9th December, 2016 amending the Principal EIA Notification, 2006, all the building and construction projects (built up area 5000 sqm – 150000 sqm) in the industrial area, shall require clearances for their building plans from the State/local bodies. In case of project sizes having built up areas more than 150000 sqm, environmental clearances shall continue to be required from the concerned regulatory authorities.* • *For all the individual units/infrastructure requirements, environmental clearances as applicable, shall be obtained from the respective regulatory authorities.*

3.13	**Setting up of an industrial area at Village Kundiya, District Banswara (Rajasthan) by Rajasthan State Industrial Development and Investment Corporation Limited - Further consideration for finalization of ToR - [F.No.21-2/2016-IA-III]**
3.13.1	The project proponent made a presentation and provided the following information to the Committee:- (i) The proposal is for development of an industrial area at Kundiya Village, in District Banswara (Rajasthan) by Rajasthan State Industrial Development & Investment Corporation Limited in a total area of 115.80 acres. The project involves components namely, roads, drainage system, electrical Lines, Truck Parking, Admin Building, Staff Canteen, Ancillary Units, and Solar Street Lightning. (ii) The site is well connected to Ratlam Railway Station 47.2 km E, the main connecting route is through NH-113, and shares the boundary of 10 km study area with Madhya Pradesh. (iii) The categorization of industries are made based on the market survey and demand potential and classification of industries based on pollution loads approved by the State Pollution Control Board. (iv) **Justification of Selection of the site**: No alternate sites are considered for the development of Industrial area in Kundiya. The proposed site based in Kundiya is selected based on the environmental factors and also the Economic consideration, as the location is located close to National highway 113 and share the boundary with Madhya Pradesh state which supplements the economic growth for Rajasthan and India. (v) The main reasons for establishing Industrial area at Kundiya are: • To improve the Industrial Infrastructural facilities in Banswara district, Rajasthan. • Availability of skilled manpower at short distance less than 75 km. • Government's positive attitude towards the industrialization (vi) **Investment/Cost:** The total cost of the project including infrastructure setup is Rs.30 Crores. (vii) **Whether project is in critically polluted area**: No, the project and area doesn't classify under CEPI and it's not applicable to the proposed project. (viii) **Forest land:** No forest land and diversion is involved for the proposed Industrial Area. (ix) **Court cases if any**: Not Applicable. (x) **Employment Potential**: The project is going to create some employment. Due to this project activity, some persons in the project area will be recruited as skilled and semi-skilled workers by the company as per its policy. Therefore, some employment and income are likely to be generated for the local people. So, the project will contribute in a positive manner towards direct employment in the project area. (xi) **Benefits of the project**: The Company will supply its product to the domestic market which is likely to improve the regional economy. (xii) **Peripheral Developments**: RIICO intends to take up developmental work in the periphery area. Different such works include the following: • Support existing schools for development of education in the area.

	• Help in imparting vocational training to local eligible youth. • Provide health facilities by way of medical check-up, by holding medical camps etc. in the neighbourhood. • Thus, the proposed project shall usher in the social and economic upliftment of the persons living in the vicinity of the Project i.e. of society at large.
3.13.2	The project was earlier considered by the EAC in its meeting held on 28-29 June, 2016 wherein the Committee noted the discrepancies in the Form-I. The proposal was deferred that time for rectification therein and re-submitting for consideration of the proposal. The project was further considered by the EAC in its meeting held on 16-17 January, 2017. During deliberations, the project proponent was unable to clarify the details of industrial units/activities to be housed in the proposed industrial area. It was noted that the area falls under Semi Critical Ground Water Areas, and thus permission from Central Ground Water Authority would also be required. The EAC noted that categorisation of industries remains an essential criteria/parameter to arrive at its jurisdiction for considering the proposal. The revised Form-I submitted by the project proponent was again found deficient, and differing from the presentation during the meeting. In view of the above, consideration of the proposal was not taken forward.
3.13.3	During deliberations, it was informed by the project proponent that the different industrial units/activities proposed in the industrial area would include marble and granite cutting/polishing, forging, auto parts, pipe fitting, conveyor components, bulk drugs and intermediates (excluding drug formulation) etc, and thus at least one category B unit/activity. Further, due to applicability of general conditions, the proposal requires appraisal at the Central level.
3.13.4	*The EAC, after deliberations and taking note of the compliance of its earlier observations, recommended the proposal for grant of ToR, and for preparation of EIA/EMP reports with public consultation subject to compliance of all conditions as specified and notified in the standard ToR applicable for such projects.*
3.14	**Development of Petroleum, Chemical and Petro-chemical Investment Region (PCPIR) at Dahej, Vagra, District Bharuch (Gujarat) by M/s Gujarat Industrial Development Corporation - Further consideration for Environmental and CRZ Clearance - [F.No.21-49/2010-IA-III]**
3.14.1	The project proponent made a presentation and provided the following information to the Committee:- (i) The proposal involves development of Petroleum, Chemical and Petro-chemical Investment Region (PCPIR) at Dahej, Vagra, District Bharuch (Gujarat) by M/s Gujarat Industrial Development Corporation (GIDC). (ii) The proposed PCPIR spread over 33 villages of Taluka Vagra and 11 villages of Taluka: Bharuch District Bharuch an area of 453 sq km. The total area under development will be 45298.59 ha. (iii) More than 60% of land is under cultivation with crops like millet, wheat, jowar, bajra and paddy etc. Other crops such as sugarcane, groundnut, pulses and cotton are also grown in the study area. The study area is covered with 7% irrigated land whereas forest land is only about 1% of the total land area. (iv) Out of 45298 ha area of PCPIR, 50.79% area i.e. 23005.97 ha area of land

	shall be developed as processing area which includes GIDC estates, medium and large scale PCP industries, engineering industries, port/ship building, salt pans, warehousing, oil terminals, logistics etc. Further 49.21 % area i.e. 22292.05 ha area of land shall be developed as a non-processing area which includes residential, commercial, institutional, recreational, specific mix zone, Eco-park, Eco-zone, Forest, agriculture, gamtal including gamtal buffer, Roads (30-150 m Row), proposed Kalpasar canal and water bodies like (pond, lake, developing pond, bhukhi khadi, bhukhi khadi nala). (v) **Forest land**: Total of 853.41 ha area is reserved forest in PCPIR. (vi) **Water requirement**: Major source of raw water is Intake well at Narmada River and Narmada canal. Present utilization of water in GIDC estates of PCPIR is approximately 28 MGD for which the approval has been taken from State Irrigation department. The said PCPIR will be developed phase wise up to 2040 and a total of 175 MGD water demand has been forecast and will be met by River Narmada and Bhadbhut barrage. (vii) **Waste water generation**: At present generation of waste water is approximately 24 MLD from different large scale industries in PCPIR. The same is treated by individual industries and is being disposed into the deep sea in the Gulf of Cambay in keeping with the GPCB standards into the effluent disposal conveyance laid by GIDC in 2005. The future wastewater generation is forecast at 300 MLD up to 2040 out of which approximately 100 MLD shall be treated in Proposed CETPs in PCPIR from small and medium scale industries and remaining 200 MLD treated effluent (from large scale individual industries) shall be disposed-off by effluent disposal conveyance. (viii) **Municipal solid waste**: As per the report of final development plan 378 TPD solid waste (neglecting the inert and recyclable waste) has been forecast in PCPIR area which shall be composted and disposed to the nearby Landfill site. (ix) **Power requirement**: In the industrial utility projection, a total power requirement of around 1800 MW for industrial and around 200 MW for residential set up has been envisaged for all phases. The power supply will be made available from Gujarat UrjaVikas Nigam and a 1500 MW gas based power station and a 2640 MW coal based power station are under construction. (x) Concept of energy efficient system using energy saver panel/ (APFC-automatic power factor correction) envisaged in proposed street light and pumping machinery. (xi) **Rain water harvesting**: Rain water harvesting has been provided in GDCR of PCPIR for non-processing area in PCPIR. (xii) **Parking facility**: Parking regulations have been provided in GDCR of PCPIR. (xiii) **Investment/Cost**: The cost of the project is Rs.15,297.02 crores. (xiv) **Benefits of the project**: The major benefits of the project are: • It is expected that additional people will get employment and hence job opportunities for the local people as well as migrants from nearby areas would increase • Employment in tertiary sector is expected to be improved in the region • There would be increase in the commercial, business and shopping centers due to influx of population in the region to cater to the needs of existing population as well as the migrants • There will be development of infrastructural facilities in the region. It would also result in the appreciation of land values around these areas • It will fulfil demands for additional manufacture and production, essential for the progress of the nation.

	• Indirect benefit to the local people by providing opportunities for starting small/medium scale business in trade and commerce • More opportunity in the field of education • Augmentation in the areas of medical facilities • Improvement in banking and postal services • Overall improvement of the peripheral human habitat • Most of the environmental pollution problems will be mitigated through implementation of recommendations given in EMP • Increase in infrastructural activities with respect to the development of the region will definitely increase the livelihood of people of the region (xv) **Justification for selection of the site**: The State Government has identified Dahej region as the focal point for the development of India's pilot global investment region. The choice for Dahej came naturally due to its numerous locational advantages and its potential for competing at Global levels in infrastructure and industrial production. (xvi) **Employment potential**: Actual direct employment is 30,000 and indirect employment is 90,000 as on May, 2016. The Final Development Plan of GPCPSIR envisages 6,08,751 employment up to 2040. (xvii) The proposal falls under 7 (c) category: "Industrial estates of area> 500 ha. and not housing any industry belonging to Category A or B." (xviii) **Water bodies**: Bhukhi khadi, Lakes/ponds near villages under PCPIR. No impact on drainage is envisaged. (xix) **ToR details**: The project was accorded ToR vide letter No.21-49/2010-IA-III dated 03.12.2013. (xx) **Public Hearing**: Public Hearing was held on 30th July, 2014 in District Bharuch, Gujarat. (xxi) The said PCPIR is having around 3477 ha area under CRZ out of total 45298 ha. (xxii) The Gujarat Coastal Zone Management Authority has recommended the project vide their letter No.ENV-10-2015-271-E dated 7th June, 2016. (xxiii) Remote sensing study was conducted by Bhaskaracharya Institute for Space Applications and Geo-Informatics (BISAG), Dept. of Science and Technology, Govt. of Gujarat, Gandhinagar. (xxiv) M/s. Anna University, Chennai has done HTL, LTL and CRZ mapping (1:4000 scale) in the coastal area of PCPIR. (xxv) **Details of Marine disposal**: 90 MLD effluent disposal line has been laid from Vilayat Industrial Estate to the Village Luvara into the deep sea for disposal of treated effluent from different Industries in the PCPIR, and EC for the same was obtained in 2005 and NOC is valid up to 2018. (xxvi) The rapid marine EIA due to release of GIDC treated effluent in coastal water off Dahej had conducted by NIO, GOA in August 2000 to finalize the location of diffuser to achieve dilution of 100 to 200 times. (xxvii) **Location of intake/outfall**: 90 MLD capacity pumping station is located at Dahej Industrial estate for treated effluent disposal (from Dahej and Vilayat Industrial estate) through which the treated effluent is being disposed-off in to the deep sea, Gulf of Cambay at village Luwara in Dahej PCPIR.
3.14.2	(a) The proposal was first considered by the EAC in its meeting held on 28 - 29 June, 2016, wherein the EAC noted that the brief circulated to the members was lacking basic information, especially in respect of the statutory powers of GIDC in developing the proposed PCPIR. The same could not be explained by them during the meeting also. Further, the Committee expressed its concern in respect of water

availability/allocation to meet the total projected demand of 175 MGD water for the project, and asked for the necessary authorization in this regard from the designated authority/Department in the State Government. The project proponent was also asked to clarify whether any part of the project area proposed to be allocated for industries or residential purpose is within the flood plain of any river or within the bounds of any water body.

In response to the observations of EAC, the clarifications and other inputs provided by the project proponent were:-

(i) The Gujarat Petroleum, Chemicals & Petrochemicals Special Investment Regional Development Authority (GPCPSIRDA) has been constituted by the Industries and Mines Department, Government of Gujarat, under the GSIR Act, 2009 in pursuance of the PCPIR policy of the Ministry of Chemicals and Fertilizers, Government of India. The said Authority has resolved to designate Gujarat Industrial Development Corporation (GIDC) as the project development agency, and to avail the environmental clearance from this Ministry and implementation of the same for the development of infrastructure and amenities.

(ii) To meet the projected water demand of 175 MGD, GIDC has requested the concerned State agencies (SNNL and Narmada Water Resources, Water Supply and Kalpsar Department of the State Government) for necessary authorization to draw 127 mld of water from Miyagam Branch Canal to Dahej through gravity main, and from river Narmada through intake wells and Angreshwar and Nand (already commissioned respectively).

(b) During the EAC meeting held on 1st December, 2016, the Committee asked about conservation of mud flats (eco-sensitive areas) at the project site and recycling of water to minimise the fresh water requirements.

The EAC although agreed in principle for grant of Environmental/CRZ clearance to the project, but desired to seek clarifications/inputs in respect of the following:-

- The proposal involves development of PCPIR which also includes the industrial estates/projects/activities already in existence and operational. As such, the requirement of prior EC for the PCPIR in terms of the EIA Notification, 2006 needs to be revisited.
- Compliance status of EC conditions for the industrial project/activities already covered under the EIA Notification, 2006.
- Land acquisition for a total area 45298 ha of PCPIR to be examined vis-a-vis the provisions of the Land Acquisition, rehabilitation and Resettlement Act, 2013.
- Proposed activities in different CRZ areas namely, CRZ-I(A), I(B), III & IV, and whether in conformity with the approved CZMP for the State of Gujarat.
- Whether the complete set of documents were submitted by the project proponent to GCZMA as per the provisions of the CRZ Notification, 2011.

The EAC decided for reconsideration of the proposal after clarifications on the above lines from the project proponent/GIDC.

(c) The project was last considered in the by the EAC in its meeting held on 22nd February, 2017 wherein the Committee noted the following:-

	(i) There are a total of 31 industrial units operating in the proposed PCPIR as per the details submitted. These units have already obtained separate environmental and CRZ clearances. (ii) MoEF has granted EC for 90 MLD effluent disposal pipe line, the compliance is being regularly submitted. (iii) The land acquisition is only for about 11812 ha. Whereas, the area under TP scheme is 12364 ha, and the remaining area of 21122 ha will be developed by the individuals. There is no rehabilitation involved. (iv) The proposed activities in different CRZ areas are as per the Coastal Zone Management Plan, and GCZMA has already recommended the proposal vide letter dated 7th June, 2016. Also the complete set of documents was submitted to GCZMA as per the requirements contained in the CRZ Notification, 2011. The EAC desired that the Ministry may take a view on the proposal in respect of the observations at (i), (ii) & (iii) of (c) above.
3.14.3	At the outset of the meeting, the EAC was informed that as per their recommendations during the last meeting, the proposal was discussed in the Ministry on 30th March, 2017 with the representatives from the State Government/GIDC. During the meeting, the details provided by the project proponent were as under:- (a) Presently, there are 5 GIDC industrial estates namely, Dahej-I, Dahej-II, Dahej-III, Vilayat and Saykha in the proposed PCPIR. The role of GIDC is limited to providing the necessary infrastructure in these industrial estates, and the individual industrial units are responsible to comply with the statutory requirements. (b) There are a total of 94 no. of industrial units/activities having obtained environmental and/or CRZ clearance from the concerned regulatory authority (66 from SEIAA and 28 from MoEF&CC), as per the details provided. In addition, this Ministry has granted EC for the Dahej SEZ in Dahej-I industrial estate on 17th March, 2010 in the name of M/s Dahej SEZ Ltd (SPV of GIDC & ONGC). These units/SPV are individually responsible for compliance with the EC/CRZ clearance conditions. (c) The instant project for development of PCPIR, comprising GIDC industrial estates and the Atali Housing scheme, has been promoted under the policy framework of the Ministry of Chemicals & Fertilizers, Government of India. The same was taken note earlier also, and the ToR for the project was issued accordingly on 3rd December, 2013. The proposal for grant of EC to the PCPIR is based on the scope of work already identified and approved by this Ministry only. (d) The State Government of Gujarat (Industries and Mines Department) vide Notification dated 9th June, 2009, has already declared and determined the areas within the boundaries of revenue villages (33 villages of Taluka Vagra and 11 villages of Taluka Bharuch in District Bharuch) to be the geographical area of the said Special Investment Region, measuring 45298.59 ha in total. The same could be considered as the initial/preliminary proceedings for land acquisition for the project. It was decided that for considering the proposal, there could be no requirement of compliance status of EC/CRZ clearances already issued, and the same may be taken

	forward with the details so provided by the project proponent. They were also asked to explore for minimizing the involvement of coast line.
3.14.4	While further deliberations on the proposal, the EAC noted the following:- (i) The proposal was earlier considered by the EAC in its meetings held in June, 2016, 1st December, 2016 and then on 22nd February, 2017. (ii) During the meeting held on 1st December, 2016, the Committee agreed in-principle for grant of Environmental/CRZ clearance to the project, subject to satisfactory clarifications/inputs especially in respect of the issues relating to EC/CRZ clearances already granted to the existing industrial units, their compliance status, land acquisition, etc. The same has since been resolved during the meeting held in the Ministry on 30th March, 2017. Record of discussions is at para 3.14.3 above. (iii) The proposal has been appraised and recommended by the Gujarat CZMA vide their letter dated 7th June, 2016 subject to compliance of certain terms and conditions. (iv) Narmada river has been identified as the sole surface water resource to meet the projected water demand of 175 MGD for the project, and the necessary authorization to draw 127 mld. Given the river ecology and its dependency on sustenance of fishery in coastal areas (near Gulf of Khambhat), alternate sources need to be explored to meet the water demand for the project, in addition to the best recycling practices for the industrial requirements. (v) Presently, one 90 mld effluent disposal line is catering to many of the industrial units in Dahej-I and Vilayat industrial estates, for discharge of treated effluents into the deep sea and the same is meeting the discharge standards as prescribed by the GPCB. (vi) The project involves considerable area (3477 ha) attracting provisions of the CRZ Notification, 2011, which also include areas covered under mudflats and mangroves and thus identified as CRZ -I. A firm action plan needs to be put in place for conservation of such eco-sensitive areas as a critical component of the EMP with adequate funds earmarked for the same. (vii) The coastal line involved in the project has been identified as highly erosion prone. Detailed scientific studies in this regard need to be carried by an expert institution, and Coastal Management Plan to be formulated for its implementation by all the stakeholders. (viii) The state of Gujarat is one of the most important states for migratory bird species. Coastal wetlands of Gujarat, particularly coastal mudflats, harbour very large population of waders. As such, the activities proposed within the mudflats and adjoining areas are expected to have large scale adverse impacts on migratory shorebirds.
3.14.5	*The EAC, on being satisfied with the submissions of the project proponent in response to its earlier observations, recommended the project for grant of Environmental and CRZ clearance, subject to compliance of all the generic conditions applicable for such projects, and the additional conditions as under:-*

	• *As per the provisions of the Forest (Conservation) Act, 1980, forest clearance shall be obtained for diversion of 853.41 ha of forest land for non-forestry purposes.* • *Consent to Establish/Operate for the project shall be obtained from the State Pollution Control Board as required under the Air (Prevention and Control of Pollution) Act, 1981 and the Water (Prevention and Control of Pollution) Act, 1974.* • *The project proponent shall report to the State Pollution Control Board about the compliance of the prescribed standards for all discharges from the PCPIR into the sea, including the present system through 90 mld disposal line.* • *All the terms and conditions stipulated by the Gujarat Coastal Zone Management Authority vide their letter dated 7th June, 2016 shall be complied with in letter and spirit.* • *All the provisions of the CRZ Notification, 2011 shall be strictly complied with, and in case of any change in scope of work, necessary recommendations from the GCZMA shall be obtained for further consideration by the concerned regulatory authority.* • *A firm and time bound action plan for conservation of mangroves and mudflats in CRZ area, as a critical component of the EMP, shall be prepared through an identified institute of repute. For its implementation, including conservation of non-vegetated mudflats, adequate funds are to be earmarked. A committee comprising representatives of project proponents, Gujarat State Forest Department and the Gujarat Maritime Board to be formed to oversee implementation of the conservation plan.* • *No plantation of mangroves to be undertaken on non-vegetated mudflats, which need to be maintained as it is. Non vegetated mudflats must be clearly demarcated on the map.* • *Detailed scientific studies for Coastal Management Plan to be prepared by an expert institution of repute, and implemented by all the stakeholders.* • *In view of the river ecology and its dependency on sustenance of fishery in coastal areas, alternate water resources shall be explored to meet the huge water demand for the project, in addition to the best recycling practices for the industrial requirements. Natural flow of River Narmada shall not be altered or tampered with.* • *Necessary authorization required under the Hazardous and Other Wastes (Management and Trans-Boundary Movement) Rules, 2016, Solid Waste Management Rules, 2016 shall be obtained and the provisions contained in the Rules shall be strictly adhered to.* • *During construction phase, air pollution and the solid waste management aspects need to be properly addressed ensuring compliance of the Construction and Demolition Waste Management Rules, 2016.* • *As per the provisions of the Notification dated 9th December, 2016 amending the Principal EIA Notification, 2006, all the building and construction projects (built up area 5000 sqm - 150000 sqm) in the PCPIR, shall require clearances for their building plans from the State/local bodies. In case of project sizes having built up areas more than 150000 sqm, environmental clearances shall continue to be required from the concerned regulatory authorities.* • *For all the industrial estates/individual units/infrastructure requirements proposed in the PCPIR, environmental clearances as applicable, shall be obtained from the respective regulatory authorities.*

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