

Minutes of the 258th meeting of Expert Appraisal Committee held on 17th -18th March, 2021 through Video Conferencing for the projects related to Infrastructure Development, all Ship breaking yards including ship breaking units 7(b); Industrial Estate/Parks/Complexes/Areas, Export Processing Zones, Special Economic Zones, Biotech Parks, Leather Complexes 7(c); Ports, harbours, break waters, dredging 7(e) and National Highways 7(f)

The 258th Meeting of Expert Appraisal Committee (EAC) of Infra-1 (IA-III) was held through Video Conferencing at the Ministry of Environment, Forest & Climate Change (MoEF&CC), Indira Paryavaran Bhavan, New Delhi on 17th – 18th March, 2021 under the Chairmanship of Dr. Deepak Arun Apte. A list of participants is annexed as **Annexure-A**.

1. OPENING REMARKS OF THE CHAIRMAN

At the outset, Dr. Deepak Arun Apte, Chairman, EAC welcomed the Members of the EAC and requested Shri Amardeep Raju, the Member Secretary of the EAC to initiate the proceedings of the meeting with a brief account of the activities undertaken by the Ministry under Infra-1 Division.

2. CONFIRMATION OF THE MINUTES OF THE LAST MEETING

The Committee confirmed the Minutes of 256th EAC meeting held on 3rd – 4th March, 2021.

3. AGENDA WISE CONSIDERATION OF PROPOSALS:

Agenda wise details of proposals discussed and decided in the meeting are as following:

Agenda No. 3.1

Development of Litibeda-Ranchi 4-lane access-controlled Greenfield Highway from Litibeda (Junction of SH-10 in Odisha) to Ranchi (Sithiyu) in the State of Jharkhand under Bharatmala Pariyojana (Ch 0+000) to Ch 147+500) [total length - 147.500 km) by M/s National Highways Authority of India - Further consideration for Terms of Reference (Proposal No IA/JH/NCP/186689/2020 File No 10-69/2020-IA.III)

“The EAC noted that the Project Proponent has given undertaking that the data and information given in the application and enclosures are true to the best of his knowledge and belief and no information has been suppressed in the EIA/EMP report. If any part of data/information submitted is found to be false/ misleading at any stage, the project will be rejected and Environmental Clearance given, if any, will be revoked at the risk and cost of the project proponent.”

3.1.1 The abovementioned proposal was earlier placed before the EAC during its 249th meeting on 14th December 2020. The proposal was deferred for the want of a) Details of the proposed alignment and its alternatives to be verified by the Project Elephant of the MoEF&CC to ascertain if the proposed alignment will be passing through the elephant corridor and if yes will it cause major fragmentation of the elephant corridor in the region,

and b) Details of the road alignment and existing and known elephant corridor to be provided to the Committee in KML file.

3.1.2 At this instance, the aforementioned proposal was further placed before the EAC during 258th meeting on 17th -18th March, 2021. The project proponent along with the EIA consultant M/s URS in Association with AECOM India Pvt. Ltd. & C. E. Testing Company Pvt. Ltd has made a presentation through Video Conferencing and provided the following information-

3.1.3 The proposed project is for Development of Litibeda-Ranchi 4-Lane access-controlled Greenfield Highway from Litibeda (Junction of SH-10 (Odisha)) to Ranchi (Sithiyo) in the State of Jharkhand under Bharatmala Pariyojana. The proposed alignment starts at Litibeda (Design Km 0+000) from Intersection of SH 10 and ends at Ch. 147+500 on Ranchi Ring Road. The proposed project includes 9 major bridges, 100 minor bridges, 136 culverts, 3 Interchanges, 51 VUP/LVUP/SVUP, 2 Vehicular Overpass, 2 Way side Amenities, 3 Toll Plaza, Truck Parking at four locations and 74.50 km length of embankment with average height of > 2.5 m.

3.1.4 Total Length of the Proposed Project is 147.500 Km. About 880.11 ha land (Govt./Pvt. Land 853.49 Ha + Forest Land 26.62 Ha) acquisition will be required for project implementation as per Land Acquisition Act, 1956. The width of proposed Right of way (PROW) is 60 m. At location of interchanges, highway amenities, toll plaza and truck parking, extra land has been proposed as per the actual design requirement.

3.1.5 The proposed project falls under 7(f), Category-A as per EIA notification 2006. Total investment/cost of the project is Rs 3015.06 Crore.

3.1.6 The terrain of the proposed alignment is plain (flat) land and is predominantly an agricultural land (91.2%) followed by built-up area (3.14%), Govt land (1.51%) and Forest/tree cover (4.15%).

3.1.7 The proposed Greenfield highway does not cross over Main Canal network at any locations. It is crossings over minor canals and natural drains. Construction of bridges and culverts has been proposed to prevent diversion of these minor canal and natural drains. Seven main water bodies will be impacted due to the proposed highway.

3.1.8 Total water demand for the project is 4532176 KL. No ground water will be extracted. If required, ground water extraction will be done after obtaining NoC from the CGWA/ State Ground Water Department.

3.1.9 Fly ash will be utilized for construction of embankment as per IRC Guidelines (IRC: SP: 58-2001). Quantity of fly ash to be utilized for the project is 2,340,000cum.

3.1.10 The Proposed project will involve diversion of about 26.62 ha of forest land. About 21498 trees are proposed to be felled in the forest and non-forest area. Prior permission would be taken from the concern authority before tree felling/cutting. There is no protected area within 10 km boundary of the PROW. The proposed project is 3.150 km away from the boundary of ESZ of Palkot Wildlife Sanctuary.

3.1.11 The socioeconomic survey will be undertaken on sample representative of the project influence area and population. The sample households would be selected from various socio-economic groups of the clusters/ settlements.

3.1.12 Benefits of the project: This Proposed Road will not only improve the mobility in between Jharkhand and Odisha, it will also improve the connectivity among other states like Chhattisgarh, Bihar, Uttar Pradesh and West Bengal. The mobility between industries in Jharkhand (Jamshedpur, Patratu, Bokaro, Dhanbad) and Odisha (Rourkela, Jharsuguda, Sambalpur, Angul) will increase. The proposed alignment will reduce travel length by 98 km (40%) and travel time by 4.5 hr. i.e. 70% (From 6.5 hr. to 2 hr.) from Ranchi (Jharkhand) to Litibeda (In Odisha) and thus will serve as life line between Jharkhand & Odisha. Besides above, about 1000 people during construction phase and about 100 people during operation phase at toll plaza and for road surveillance and maintenance work will be employed.

3.1.13 Details of Court cases: No court case is pending against the proposed project.

3.1.14 PP mentioned that a communication has been sent to Chief Wild Life Warden, Jharkhand for the information. Further, Member Secretary apprised the Committee that based on the Minutes of the Meeting, an internal communication has been sent to Project Elephant Division for vetting of proposed alignment. The Project Elephant Division will revert back with inputs/comments after seeking information from concerned CWLW, analysing the details and DSS analysis of road alignment vis-a-vis effect on elephant conservation issues.

3.1.15 The EAC, taking into account the submission made by the project proponent and the status provided by the Member Secretary for the aforementioned proposal had a detailed deliberation during its 258th meeting on 17th -18th March, 2021 and recommended the proposal for granting the Terms of Reference with the specific conditions, as mentioned below, in addition to all standard conditions applicable for such projects.

- i. Approval of road alignment for the purpose of TOR is subject to approval of alignment by State CWLW and PE divn of MoEFCC. Any modification in alignment or any alternate alignment suggested by CWLW and approved by the PE division of MoEFCC will be considered final for the purpose of EIA study.
- ii. Provisions in the EMP shall be made as per the wildlife conservation plan approved by the CWLW and also as per the conditions stipulated by CWLW in approval of the alignment / modified alignment/ alternate alignment. Patrolling team and watch tower for the movement of animals to avoid human animal conflict should be provided alongwith the financial allocation in the mitigation plan.

- iii. Provisions shall also be made in Wildlife conservation plan and EMP for erection of watch towers and engagement of patrolling team for patrolling along the road stretches passing through forest area for monitoring the crossing of animals through these roads, initially for first 5 years at the project cost.
- iv. Details of animal crossing points/Corridors identified across the road alignment in forest area and the animal crossing structures proposed therein shall be given in the EIA study
- v. The proponent shall carry out a detailed traffic flow study to assess inflow of traffic from adjoining areas like airport/habitation such as urban cities. The detailed traffic planning studies shall include complete design, drawings and traffic circulation plans (taking into consideration integration with proposed alignment and other state roads etc.). Wherever required adequate connectivity in terms of VUP (vehicle underpass)/PUP (Pedestrian underpass) needs to be included.
- vi. Cumulative impact assessment study to be carried out along the entire stretch including the other packages in the current stretch under consideration.
- vii. The alignment of road should be such that the cutting of trees is kept at bare minimum and for this the proponent shall obtain permission from the competent authorities. List of all tall and old trees made chainage wise and alignment be made in a way to avoid cutting such trees.
- viii. As per the Ministry's Office Memorandum F. No. 22-65/2017-IA.III dated 30th September, 2020, the project proponent, based on the commitments made during the public hearing, shall include all the activities required to be taken to fulfil these commitments in the Environment Management Plan along with cost estimates of these activities, in addition to the activities proposed as per recommendations of EIA Studies and the same shall be submitted to the Ministry as part of the EIA Report. The EMP shall be implemented at the project cost or any other funding source available with the project proponent.
- ix. In pursuance of Ministry's OM no stated above the project proponent shall add one annexure in the EIA Report indicating all the commitments made by the PP to the public during public hearing and submit it to the Ministry and the EAC.
- x. The proponent shall carry out a comprehensive socio-economic assessment and also impact on biodiversity with emphasis on impact of ongoing land acquisition on the local people living around the proposed alignment. The Social Impact Assessment should have social indicators which can reflect on impact of acquisition on fertile land. The Social Impact Assessment shall take into consideration of key parameters like people's dependency on fertile agricultural land, socio-economic spectrum, impact of the project at local and regional levels.
- xi. The Action Plan on the compliance of the recommendations of the CAG as per Ministry's Circular No. J-11013/71/2016-IA.I (M), dated 25th October, 2017 needs to be submitted at the time of appraisal of the project and included in the EIA/EMP Report.

Agenda No. 3.2

Development of 6 Lane National Highway from the Junction of Eastern Peripheral Expressway at Khekra to Saharanpur bypass at Latifpur Village from Km 0.000 to Km 119.790 of Delhi to Dehradun Economic Corridor under Bharatmala Pariyojana by M/s National Highways Authority of India - Environmental Clearance (Proposal No. IA/UP/NCP/162955/2020 and File No. 10-44/2020-IA.III)

“The EAC noted that the Project Proponent has given undertaking that the data and information given in the application and enclosures are true to the best of his knowledge and belief and no information has been suppressed in the EIA/EMP report. If any part of data/information submitted is found to be false/ misleading at any stage, the project will be rejected and Environmental Clearance given, if any, will be revoked at the risk and cost of the project proponent.”

3.2.1 The project proponent along with EIA Consultant M/s PDCOR Limited Jaipur, has made a presentation through Video Conferencing and provided the following information:

3.2.2 The proposed project is a Greenfield Alignment project under the Bharatmala Pariyojna, which starts from the junction of Eastern Peripheral Expressway at Khekra village at Ch. 0+000 (28°53'4.09"N 77°14'45.19"E) passing through major districts such as Baghpat, Muzaffarnagar, shamli and terminated at Saharanpur bypass at Latifpur Village at Ch. 119+790 (29°53'13.67"N 77°35'15.08"E in the state of Uttar Pradesh. The proposed project includes 1 RoB, 7 Interchanges, 2 Major Bridges, 20 Minor Bridges, 5 Minor Bride cum LVUP, 13 nos. VUP, 49 nos. LVUP, 271 nos. Culvert (Box -184, Pipe – 87) along the project stretch for free passage to villagers & domesticated animals and to avoid any impact on local hydrology.

3.2.3 The proposed project falls under 7 (f) Category A, Highways. Terms of Reference (ToR) was issued vide File No. 10-44/2020-IA.III dated 24th August 2020. Total Investment/Cost of the project is Rs. 5524.46 crores (including R&R, LA and utility).

3.2.4 Total length of proposed alignment is 119.790 Km with proposed Right of Way (ROW) 70 m having 6 lane carriageway all through the project road other than the area of Toll Plaza, and way side amenities.

3.2.5 About 959.36 ha of land shall be acquired for the project as per NH Act, 1956 and RFCTLARR, 2013. About 4.328 ha forest land is proposed for diversion. The joint survey is under progress with Forest Department. The terrain of the proposed alignment is plain (flat) land and is predominantly an agricultural land.

3.2.6 Public hearing was conducted on the following date and place.

S. No	Date	Venue	Districts	State
1.	18.02.2021	Zilla Panchayat, Sabhagar, Muzaffarnagar, U.P.	Muzaffarnagar	Uttar Pradesh
2.	22.02.2021	Collectorate Sabhagar, Shamli, U.P.	Shamli	Uttar Pradesh
3.	23.02.2021	Public Forum Auditorium, Saharanpur, U.P.	Saharanpur	Uttar Pradesh
4.	03.03.2021	Magistrate Office, Baghpat, U.P.	Baghpat	Uttar Pradesh

3.2.7 The proposed project alignment is crossing 4 small private ponds, 1 major canal (Eastern Yamuna Canal) intersecting the alignment at few locations and 2 rivers (namely Hindon and Dhamola) intersecting the proposed alignment at 4 locations. Appropriate numbers of bridges and culverts have been proposed to maintain the natural flow of water bodies.

3.2.8 Total water requirement for the proposed project is approx. 8,79,302 KL (2409 KLD) during construction stage, which will be sourced from existing surface as well as from ground water. NOC for the same will be obtained from the concerned authority by the Concessionaire/ Contractor prior to start of construction work under supervision of Proponent/ supervision consultant.

3.2.9 Rainwater harvesting structures will be provided at the locations where the first aquifer of ground water table is more than 8-10 m. The provision of rain water harvesting will be executed as per IR: -SP:50-2013 guidelines. In general at 500 meter interval, rain water recharge pits are provisioned depending on site suitability.

3.2.10 Minimum debris/waste material will be generated and it will be re-utilized in project work, like in raising of embankment, making approach/haul road and will as in construction yard. Approx. 300 Kg/day domestic waste will be generated during construction phase of road, which will be disposed off in nearby approved landfill or with the construction yard in disposal pit. Mobile toilet will be provided at major construction site. Toilet with septic tank will be provided in worker camp/ construction yard.

3.2.11 Cross roadside and canal side trees to be felled for contraction of road, which are notified as protected forest. Other than this, majority of trees are private trees located in the agricultural field and commercial garden. Total 11,840 nos. of trees are proposed to be felled. Approx. 50,000 nos. of avenue trees are proposed to plant on available RoW in both side of project as per IRC:SP:21-2009.

3.2.12 During the socio-economic survey, it has been found that total 309 nos. of structures (includes tubewells, borewells, brick kiln, boundary wall, temples, House etc.), 1438 nos. of families (PAFs) are getting affected. The R&R plan has been prepared based on Right to Fair Compensation and Transparency in Land Acquisition, Rehabilitation and Resettlement Act, 2013 and National Highway Act, 1956. The R&R cost is INR 2182.6 Cr.

3.2.13 Safety measures will be provided as per NHA Safety Manual and IRC: SP 88 and Expressway Manual IRC: SP 99. Safety Measures, as provided in NHA Safety Manual i.e. Unit-3 (pertaining to Traffic Safety, such as traffic control zone, advance warning zones, traffic control devices, regulatory & warning signs cylindrical cones, drums, flagman, Barricades, Pedestrian Safety, Speed control, etc.) and other safety guidelines and measures suggested in Unit-4 (Construction Zone Safety), Unit-5 (Temporary Structures Safety), Unit-6 (Workers & Work Zone Safety), Unit-7

(Electrical & Mechanical Safety) will be strictly implemented. All required illustrative plans for safety at construction sites keeping in view all situations highlighted in IRC:SP 55 and NHA Safety Manual will be prepared and strictly implemented.

3.2.14 Benefits of the Project: The entire region will be benefitted from the proposed project, as it provides connectivity to important districts of Uttar Pradesh such as Baghpat, Shamli, and Saharanpur further given connectivity to Meerut and Muzaffarnagar and at the end point of Saharanpur bypass and provides spur connectivity to Dehradun. It also gives connectivity to important tourist place/places of Uttarakhand through Dehradun. Project corridor is a shorter route for freight from Delhi to Saharanpur bypass and also to Dehradun. Approx. 1000 people during construction and approx. 100 people will be employed during the operation phase.

3.2.15 Details of Court cases: No court case is pending against the proposed project.

3.2.16 The EAC, taking into account the submission made by the project proponent had a detailed deliberation during its 258th meeting on 17th -18th March, 2021 and **recommended the proposal for grant of Environment Clearance** with the specific conditions, as mentioned below, in addition to all standard conditions applicable for such projects:

- i. Project alignment should be managed in such a way to save the Heritage/old trees supposed to be affected by the proposed alignment.
- ii. Faunal bio-diversity study has to be conducted and a report shall be submitted along with 6 monthly compliance report.
- iii. The proponent shall obtain Forest Clearance for diversion of forest land as per Forest (Conservation) Act, 1980. Proponent shall submit an undertaking that work on non-forestry land may only be executed upto such point (to be selected by the user agency) on either side of forest land if it is explicitly certified by the user agency that in case approval under the Forest (Conservation) Act, 1980, for diversion of forest land is declined, it is technically feasible to execute the project along an alternate alignment without involving diversion of forest land. Details of all such stretches along with alternate alignment identified to bypass the forest land should be explicitly provided in the proposal seeking approval under the Forest (Conservation) Act, 1980 and the EIA Notification, 2006.
- iv. EMP be revised to the extent that provisions are made in EMP for erection of watch towers (at intervals suggested by concern DFO) and engagement of patrolling team for patrolling along the road stretches passing through forest area for monitoring the crossing of animals through these roads, initially for first 5 years at the project cost.
- v. Commencement of work in non-forest land will not confer any right to NHA for granting approval under the Forest (Conservation) Act, 1980.
- vi. In borrow pits, the depth of the pit shall be regulated such that the sides of the excavation will have a slope not steeper than 1:2, from the edge of the final section of bank. Soil erosion checking measures shall be carried out. A general guideline for Borrow area operation and rehabilitation given in Annexure 5.3 of the EIA report shall be followed.

- vii. Quarry areas shall be barricaded during mining operations. The abandoned quarry shall be developed as water reservoirs with proper fencing around quarry area. Guidelines for Quarry area operation and rehabilitation given in Annexure 5.3 of the EIA report shall be followed.
- viii. In all the construction sites within 150m of the nearest habitation, noisy construction work such as crushing, concrete mixing will be stopped during the night time between 10.00 pm to 6.00 am. No noisy construction activities will be permitted around educational institutions/health centres (silence zones) up to a distance of 100 m from the sensitive receptors. All plants and equipments used in construction shall strictly conform to the CPCB/SPCB noise standards.
- ix. Traffic Control Devices/Road Safety Devices/ Roadside Furniture including various types of cautionary, informatory, regulatory as mandatory signboards, road markers, studs, etc. shall be provided at appropriate locations all along the project stretch in accordance with the specifications laid down in Manual of Specifications and Standards for Expressways (IRC: SP:99-2013) and IRC:8, IRC:25, IRC:26, IRC:35, IRC:67, IRC:79, IRC:103 and Section 800 of MORTH Specifications.
- x. All the major, minor bridges and culverts should not affect the drainage systems. Flood plains of the rivers/ drainage systems are not to be disturbed.
- xi. About 24700 nos. of trees and 5500 saplings (size less than 30 cm) are likely to be felled. Afforestation using compensatory plantation in the ratio of 1:10 shall be carried out. Native tree species shall be provided as per the IRC Guidelines on Landscaping and Tree Plantation (IRC:SP:21-2009). Effort should be made to plant native trees and Ficus species on both sides of the alignment. Special attention shall be given for protecting giant trees, and locally important trees (having cultural importance) and should be identified chainage wise.
- xii. As per the Ministry's Office Memorandum F. No. 22-65/2017-IA.III dated 30th September, 2020, the project proponent shall abide by all the commitments made by them to address the concerns raised during the public consultation. The project proponent shall initiate the activities proposed by them, based on the commitment made in the public hearing, and incorporate in the Environmental Management Plan and submit to the Ministry. All other activities including pollution control, environmental protection and conservation, R&R, wildlife and forest conservation/protection measures including the NPV, Compensatory afforestation etc., either proposed by the project proponent based on the social impact assessment and R&R action plan carried out during the preparation of EIA report or prescribed by EAC, shall also be implemented and become part of EMP.
- xiii. Proponent shall keep the finish road level sufficiently elevated from ground level with provision of railing on both sides to restrict animal crossing in order to avoid the possibility of wildlife injury/death. Major water bodies have been observed in the vicinity of the proposed road alignment & may be potential human elephant conflict points, appropriate nos of animal safe passages as per the guideline framed by the Wildlife Institute of India and in consultation with Chief Wildlife Warden.
- xiv. Prepare the traffic prediction report for complete project (including all packages of this project) considering the cumulative impact of the traffic on the environment and submit

- to the Ministry and concerned Regional Office within 3 months.
- xv. No Ground water shall be extracted and used. Approval/permission of concerned authority shall be obtained before drawing surface water from canal or any other sources.
 - xvi. The proponent shall obtain permission from the competent authorities for tree felling along the proposed alignment.
 - xvii. Rain water harvesting pit shall be at least 3 - 5 m above the highest ground water table.

Agenda No. 3.3

Development of Economic Corridors, Inter-Corridors, feeder routes and Coastal Road primarily to improve the efficiency of freight movement in India (Lot-3Odisha & Jharkhand/Package-2) Raipur-Vishakhapatnam (Ch.124.661 - Ch. 365.033 km) (Length 240.372 km) in the State of Odisha by M/s National Highways Authority of India under Bharatmala Pariyojana - Further consideration for Environmental Clearance (Proposal No. IA/OR/NCP/131730/2019 and File No 10-4/2020-IA.III)

“The EAC noted that the Project Proponent has given undertaking that the data and information given in the application and enclosures are true to the best of his knowledge and belief and no information has been suppressed in the EIA/EMP report. If any part of data/information submitted is found to be false/ misleading at any stage, the project will be rejected and Environmental Clearance given, if any, will be revoked at the risk and cost of the project proponent.”

3.3.1 The abovementioned proposal was earlier placed before the EAC during its 256th meeting on 4th March, 2021. The proposal was deferred for the want of some requisite information/documents.

3.3.2 At this instance, the aforementioned proposal was further placed before the EAC during 258th meeting on 17th -18th March, 2021. The project proponent alongwith EIA consultant M/s Enviro Infra Solutions Pvt. Ltd., Ghaziabad in association with CEMC Pvt. Ltd., made a presentation through Video conferencing and provided the following information-

3.3.3 The Ministry of Road Transport and Highways (MoRTH) through National Highways Authority of India (NHAI) has decided the assignment of Development of Economic Corridors, Inter-corridors and feeder routes and Coastal road primarily to improve the efficiency of freight movement in India under Bharatmala Pariyojana Lot-3/Odisha & Jharkhand/Package-2 having length of proposed alignment 464.662 km (which is totally green field) which starts from near Abhanpur (ch. 0.000) and ends at Sabbavaram village in Vishakhapatnam district.

3.3.4 The proposed NH is a Green field alignment project and proposed for 6 lane carriageway. The project highway starts from Dhanara village in Nabarangpur district to Tumbigura village in Koraput district in the state of Odisha from CH: 124+661

(20°01'44.59"N 81°51'58.13"E) to 365+033 (18°25'42.52"N 83°02'29.23"E) having a total length of 240.372 Kms.

3.3.5 The proposed project falls under 7 (f) Category A, Highways. Terms of Reference (ToR) was issued vide File No. 10-4/2020-IA.III dated 02nd March 2020. Total Investment/Cost of the project is Rs. 723800 Lakhs (Rs. 7238 Cr.).

3.3.6 Public Hearing was conducted on different dates and places as below-

S. No.	Date	Location
1.	07.12.2020	Police Ground Nabarangpur (Near Police Station, Nabarangpur), Nabarangpur district
2.	21.01.2021	Govt. Boys High School Play Ground (Near R.T.O Koraput), Koraput District

3.3.7 The existing land use pattern around the proposed National Highway is primarily comprises of predominantly agricultural land, followed by Reserve & Protected forest land, land for cattle grazing, village settlements and village ponds/nallah. The proposed alignment passes mostly through uninhabited area avoiding village establishments. The agriculture practiced is mostly multicrops due to the network of canals/rivers and main crops grown in the area are Wheat, maize, soybean etc. The proposed highway lies generally in plain terrain. However certain length of highway lies in rolling & hilly terrain.

3.3.8 The land acquisition for the proposed highway is 1308.024 ha (Private land 702.520Ha + Government land 244.360 ha + Forest land 361.144 ha). The compensation towards the acquisition of land will be made as per the provisions of the NH Act 1956 and applicable clauses and procedures as laid down in the RFCT LARR Act, 2013. The estimated cost for Rehabilitation & Resettlement including land cost has been worked out to Rs. 149.70 Crores.

3.3.9 The stage-1 forest clearance for diversion of 361.144 ha forest land is under process at DFO level. The proposed RoW of the project is 60 m in General & 45 m in Forest area. The alignment will involve cutting of approx. 67,050 nos. of trees.

3.3.10 The natural drainage of the project impacted area shall be maintained through improvement of 295 nos. of culverts, 16 nos. of major bridges and 76 nos. minor of bridges. The proposed alignment does not pass through any flood prone area.

3.3.11 The water requirement is 7046473 KL during construction stage and will be extracted from local surface water resources i.e. from nearby canals/rivers after getting necessary permission from concerned authority by the appointed contractor. No ground water shall be extracted.

3.3.12 About 1000 kg/day Municipal solid waste shall be generated during construction phase and 50 kg/day (approx.) during operation phase at tolls and wayside amenities area within PROW. Bio-degradable waste shall be disposed through bio composting and other waste through landfill site.

3.3.13 Energy conservation: Provision for solar power plant has been recommended in the nearby villages and its budget has been incorporated in EMP budget.

3.3.14 Rainwater harvesting structures shall be provided at the interval of 500 m on either sides of carriageway as per availability of RoW and depending on the water table of first aquifer. The cost for construction of 180 rainwater harvesting structures is Rs 9.00 Crores including its maintenance.

3.3.15 The proposed alignment does not pass through Wildlife Sanctuary/National Park and its eco sensitive zone. The proposed project does not pass through any CRZ locations.

3.3.16 The site specific Wildlife Conservation Plan (including construction of 25 nos. of animal underpasses of adequate length) and 20 nos. of canopy bridges with appropriate mitigation measures in consultation with the Chief Wildlife Warden of the state along with implementation schedule and appropriate monitoring mechanism have been prepared. Two tunnels have been proposed at Ch. 339.240 and at Ch. 346.560 having total length of 3.030 km and 1.930 km, respectively.

3.3.17 Benefits of the project: The proposed project would act as the prime artery for the economic flow to this region. It will enhance connectivity between rural & urban population which will benefit the all sections of the society like general population, small-medium-large scale industries, farmers, businessmen etc. The project will improve access to higher education facilities & modern health facilities and will strengthen both rural & urban economies which in turn will improve economic scenario of the state and country. Faster transportation will strengthen tourist development in the area. During the construction of the road project around 3000 persons would be employed temporarily. However due to construction of toll plazas approx. 100 persons will be employed on permanent basis.

3.3.18 Details of Court cases: No court case is pending against the proposed project.

3.3.19 The EAC, taking into account the submission made by the project proponent had a detailed deliberation during its 258th meeting on 17th -18th March, 2021 and **recommended the proposal for grant of Environment Clearance** with the specific conditions, as mentioned below, in addition to all standard conditions applicable for such projects:

- i. Apart from land compensation, the loss for crop has also to be compensated.
- ii. There shall be no activity of wall construction in the forest zone.
- iii. EMP be revised to the extent that provisions are made in EMP for erection of watch towers (at intervals suggested by concern DFO) and engagement of patrolling teams

- for patrolling along the road stretches passing through forest area for monitoring the crossing of animals through these roads, initially for first 5 years at the project cost.
- iv. The proponent shall obtain Forest Clearance for diversion of forest land as per Forest (Conservation) Act, 1980. Proponent shall submit an undertaking that work on non-forestry land may only be executed upto such point (to be selected by the user agency) on either side of forest land if it is explicitly certified by the user agency that in case approval under the Forest (Conservation) Act, 1980, for diversion of forest land is declined, it is technically feasible to execute the project along an alternate alignment without involving diversion of forest land. Details of all such stretches along with alternate alignment identified to bypass the forest land should be explicitly provided in the proposal seeking approval under the Forest (Conservation) Act, 1980 and the EIA Notification, 2006.
 - v. Commencement of work in non-forest land will not confer any right to NHAI for granting approval under the Forest (Conservation) Act, 1980.
 - vi. In borrow pits, the depth of the pit shall be regulated such that the sides of the excavation will have a slope not steeper than 1:2, from the edge of the final section of bank. Soil erosion checking measures shall be carried out. A general guideline for Borrow area operation and rehabilitation given in Annexure 5.3 of the EIA report shall be followed.
 - vii. Quarry areas shall be barricaded during mining operations. The abandoned quarry shall be developed as water reservoirs with proper fencing around quarry area. Guidelines for Quarry area operation and rehabilitation given in Annexure 5.3 of the EIA report shall be followed.
 - viii. In all the construction sites within 150m of the nearest habitation, noisy construction work such as crushing, concrete mixing will be stopped during the night time between 10.00 pm to 6.00 am. No noisy construction activities will be permitted around educational institutions/health centres (silence zones) up to a distance of 100 m from the sensitive receptors. All plants and equipments used in construction shall strictly conform to the CPCB/SPCB noise standards.
 - ix. Traffic Control Devices/Road Safety Devices/ Roadside Furniture including various types of cautionary, informatory, regulatory as mandatory signboards, road markers, studs, etc. shall be provided at appropriate locations all along the project stretch in accordance with the specifications laid down in Manual of Specifications and Standards for Expressways (IRC: SP:99-2013) and IRC:8, IRC:25, IRC:26, IRC:35, IRC:67, IRC:79, IRC:103 and Section 800 of MORTH Specifications.
 - x. All the major, minor bridges and culverts should not affect the drainage systems. Flood plains of the rivers/ drainage systems are not to be disturbed.
 - xi. About 67,050 nos. of trees are likely to be felled. Afforestation using compensatory plantation in the ratio of 1:10 shall be carried out. Native tree species shall be provided as per the IRC Guidelines on Landscaping and Tree Plantation (IRC:SP:21-2009). Effort should be made to plant native trees significant number of Ficus species on both sides of the alignment. Special attention shall be given for protecting giant and old trees and locally important trees (having cultural importance) and should be identified chainage wise.

- xii. As per the Ministry's Office Memorandum F. No. 22-65/2017-IA.III dated 30th September, 2020, the project proponent shall abide by all the commitments made by them to address the concerns raised during the public consultation. The project proponent shall initiate the activities proposed by them, based on the commitment made in the public hearing, and incorporate in the Environmental Management Plan and submit to the Ministry. All other activities including pollution control, environmental protection and conservation, R&R, wildlife and forest conservation/protection measures including the NPV, Compensatory afforestation etc., either proposed by the project proponent based on the social impact assessment and R&R action plan carried out during the preparation of EIA report or prescribed by EAC, shall also be implemented and become part of EMP.
- xiii. Proponent shall keep the finish road level sufficiently elevated from ground level with provision of railing on both sides to restrict animal crossing in order to avoid the possibility of wildlife injury/death. Major water bodies have been observed in the vicinity of the proposed road alignment & may be potential human elephant conflict points, appropriate nos of animal safe passages as per the guideline framed by the Wildlife Institute of India and in consultation with Chief Wildlife Warden.
- xiv. Prepare the traffic prediction report for complete project (including all packages of this project) considering the cumulative impact of the traffic on the environment and submit to the Ministry and concerned Regional Office within 3 months.
- xv. No Ground water shall be extracted and used. Approval/permission of concerned authority shall be obtained before drawing surface water from canal or any other sources.
- xvi. The proponent shall obtain permission from the competent authorities for tree felling along the proposed alignment.
- xvii. Rain water harvesting pit shall be at least 3 - 5 m above the highest ground water table.

Agenda No. 3.4 (This will be moved to any other item during compilataion)

Development of Urban Extension Road-II (NH-344M) from Design chainage Km 0.000 to Km 38.111. Development of link road (new NH344P) (Km 0.000 to Km 29.600) between Bawana Industrial Area Delhi (from Km 7.750 of UER II) till bypass of NH-352A at village Barwasni, Sonipat in Haryana as spur of Urban Extension Road-II (NH-344M) in the state of Delhi/Haryana. Development of link road (new NH-344N) (Km 0.000 to Km 7.500) between Dichaon Kalan till Bahadurgarh Bypass/NH10 in the state of NCT of Delhi/Haryana. (Total Length of Project: 75.211 Km) by M/s National Highways Authority of India (NHAI) - Reconsideration for Environmental Clearance (Proposal No. IA/DL/MIS/104396/2019 and File No 10-30/2019-IA.III)

“The EAC noted that the Project Proponent has given undertaking that the data and information given in the application and enclosures are true to the best of his knowledge and belief and no information has been suppressed in the EIA/EMP report. If any part of data/information submitted is found to be false/ misleading at any stage, the project will be rejected and Environmental Clearance given, if any, will be revoked at the risk and cost of the project proponent.”

3.4.1 The Terms of Reference (ToR) for the aforementioned project was accorded in 217th EAC meeting on 27th June 2019 *vide* F. No. 10-30/2019-IA.III dated 19th July 2019. Based on the recommendation of EAC in its 225th meeting held on 22nd October, 2019, the Ministry amended the ToR dated 19th July 2019 by removing the following specific condition no. 4(ii) at page no. 7.

"Study to be carried out on Acoustic and Light Proofing measures considering the Wildlife Institute of India manual and other studies by the reputed institutes on the matter. The study shall be carried by the qualified professionals, scientists from any national institute having requisite experience to conduct such study."

3.4.2 Subsequently, the proposal was submitted to the Ministry for the want of Environmental clearance. The EAC had a detailed deliberation during its 247th meeting during 23rd –24th November, 2020 and recommended the proposal for grant of Environmental Clearance with specific conditions which also includes condition no. (iii) that "A revised biodiversity survey to be undertaken with the help of institute of repute or a team of experts of national repute and submitted to the Committee that is duly endorsed by Chief Wildlife Warden of the state" as mentioned in the MoM of 247th EAC meeting under Agenda item No. 3.1.

3.4.3 The PP *vide* e-mail dated 30th December 2020 requested the Ministry to amend the above mentioned Para (iii) of recommendation in 247th EAC MoM, since, the said condition was already removed from the ToR dated 19th July 2019 as amended on 22nd October, 2019.

3.4.4 It is further informed to the Committee that the EC letter has not yet been issued for the project for the want of declaration letter from the PP for forest clearance.

3.4.5 After detailed deliberation it has been decided by the EAC that since, the specific condition Para no. (iii) has already been removed from the ToR, the same shall be omitted from the 247th EAC MoM and EC conditions, as well.

Agenda No. 3.5

Establishment of Devakothikoppa Industrial Area at by M/s Karnataka Industrial Areas Development Board - Extension of validity of Terms of Reference (Proposal No IA/KA/NCP/201623/2021 and File No 21-55/2017-IA.III)

"The EAC noted that the Project Proponent has given undertaking that the data and information given in the application and enclosures are true to the best of his knowledge and belief and no information has been suppressed in the EIA/EMP report. If any part of data/information submitted is found to be false/ misleading at any stage, the project will be rejected and Environmental Clearance given, if any, will be revoked at the risk and cost of the project proponent."

3.5.1 The project proponent along with EIA consultant M/s Hubert Enviro Cares Systems Pvt Ltd has made a presentation through Video Conferencing before the EAC and requested for extension of validity of Terms of Reference for the period of one year as per MoEF&CC Notification dated 14th September, 2016. Terms of Reference for the aforementioned project

was granted vide letter No. 21-55/2017-IA-III dated 20th March, 2017, which is valid up to 19th March, 2021.

3.5.2 The PP vide on-line application dated 4th March 2021 alongwith a letter no. KIADB/EE/DVG/2020-21, dated 10th March 2021 has submitted that the EIA/EMP documents have been submitted to KSPCB for conducting the Public Hearing (PH) with required fees. However, due to pandemic situation, there is delay in getting date for PH.

3.5.3 In view of the above reason, the PP has requested to extend the validity period of ToR for one more year, so that they will upload the final EIA/EMP report for appraisal after conducting the PH.

3.5.4 It has been appraised to the Committee that as per Govt. notification, dated 18th January, 2021 *“the period from the 1st April, 2020 to the 31st March, 2021 shall not be considered for the purpose of calculation of the period of validity of Terms of Reference granted under the provisions of this notification in view of outbreak of Corona Virus (COVID-19) and subsequent lockdowns (total or partial) declared for its control, however, all activities undertaken during this period in respect of the said Terms of Reference shall be treated as valid.”*

3.5.5 The EAC, taking into account the submissions made by the project proponent and the Notification issued by the Ministry dated 18th January, 2021 stated that there is no need for the project proponent to extend the validity of ToR letter; in view of the Notification issued by the Ministry the ToR is valid upto 19th March, 2022. Project proponent will notify the Ministry in case of any changes in the proposed land area.

Agenda No. 3.6

Development of Integrated Manufacturing Cluster (IMC) under Amritsar Kolkata Industrial Corridor (AKIC) Project at Raghunathpur, Purulia, West Bengal by M/s West Bengal Industrial Development Corporation Ltd. - Terms of Reference (Proposal No. IA/WB/NCP/147335/2020 F. No. 21-32/2020-IA.III)

“The EAC noted that the Project Proponent has given undertaking that the data and information given in the application and enclosures are true to the best of his knowledge and belief and no information has been suppressed in the EIA/EMP report. If any part of data/information submitted is found to be false/ misleading at any stage, the project will be rejected and Environmental Clearance given, if any, will be revoked at the risk and cost of the project proponent.”

3.6.1 The aforementioned proposal was earlier placed before the EAC during its 234th meeting on 27th April, 2020. After detailed deliberations by the EAC, the proposal was returned in its present form.

3.6.2 At this instance, the aforementioned proposal was further placed before the EAC during 258th meeting on 17th -18th March, 2021. The project proponent alongwith EIA Consultant M/s EQMS India Pvt. Ltd., Delhi has made a presentation through Video Conferencing and provided the following information to the committee:

3.6.3 The proposed project is for development of Amritsar Kolkata Industrial Corridor Project (AKIC) in the States of Northern and Eastern region of India. The State of West Bengal has identified a site in Raghunathpur area of Purulia district for development of “Integrated Manufacturing Cluster” as RIMC under AKIC region after assessing feasibility and potential of proposed location. Land is in possession of West Bengal Industrial Development Corporation (WBIDC) which is also the nodal agency to coordinate and supervise project development activities related to RIMC Project. The project site is well connected to the Highway, airways, rail and waterways.

3.6.4 The proposed project falls under 7(c), Category A. Total project cost is Rs. 114877 Lakh (1,148.77 crore).

3.6.5 The total land area of the project is 952.0755 ha. The identified land is an industrial land under possession of WBIDC. Presently, majority of this Industrial land is barren and under developed. A small portion of this industrial land is under cultivation. The topography/terrain of this site is slightly undulated and required cutting and filling for development towards flat topography. The proposed development of this Industrial land is in the form of an Industrial township with Industrial Manufacturing cluster.

3.6.6 The identified land is under possession of WBIDC. There is no habitation present within the project area. The local people do not dependent on the identified land. Since, no population is living in the allocated land; hence, no R&R issue is involved with this project.

3.6.7 List of industries to be housed with the proposed project site is as following:

Sl. No.	Industry Proposed	Schedule as per EIA Notification-2006	Category with threshold limit	Category as per CPCB
1	Non - toxic secondary metallurgical processing Industries, each of capacity > 5000 metric tons/ annum.	3 (a)	Category B (ii)	Red
2	Standalone cement clinker grinding units, each of capacity <1.0 million metric tons/ annum.	3 (b)	Category B	Red
3	Engineering & manufacturing	Not applicable	Not applicable	Orange
4	Auto component and automobile	Not applicable	Not applicable	Orange
5	Refractory & ceramics	Not applicable	Not applicable	Orange
6	Machinery & equipment	Not applicable	Not applicable	Orange/Green
7	Ancillary & MSME cluster	Not applicable	Not applicable	Orange
8	Fabricated metal products	Not applicable	Not applicable	Orange
9	Electronics and electrical equipment	Not applicable	Not applicable	Orange

3.6.8 Details of water bodies, impact on drainage: Uttala river is flowing along the north-western boundary of the RIMC-I. Besides that, few ponds are also available within the project area. Storm water management approach in RIMC is envisaged to utilize existing water bodies as Flood Retention ponds to store runoff and reduce peak discharge.

3.6.9 Total water requirement during the construction phase is 3.750 MLD, which will be sourced from the surface water through tankers. Total water requirement during the operation phase is 20 MLD, which will be sourced from the Panchet Dam. Water will be arranged by WBIDC from Panchet dam operated by Damodar Valley Corporation (DVC). Panchet dam is a perennial water storage reservoir to be used as a source of water for RIMC as Distance from RIMC to Panchet dam is approximately 9 km (from intake point). The WBIDCL already approached for confirmation on availability of water vide letter WBIDC/AKIC/2016-17/2413 dated 25/03/2019. No ground water abstraction shall be done for the proposed project.

3.6.10 No major tree vegetation is present on the identified land. However, some tree species like Mahua (*Madhuca longifolia*), Imlu (*Tamarindus indica*), Arjun (*Terminalia arjuna*), Jamun(*Syzygium cumini*), Bargad (*Ficus benghalensis*), Neem (*Azadirachta indica*), Palash (*Butea monosperma*), Chatim (*Alstonia scholaris*), Tal (*Borassus flabellifer*), Khajur (*Phoenix dactylifera*), Simul (*Bombax ceiba*), Koroi (*Albizia procera*), Karanj (*Millettia pinnata*), Gulmohar (*Delonix regia*), Kadam (*Neolamarckia cadamba*), Shisam (*Dalbergia sissoo*) etc. are present on the site. Eucalyptus (*Eucalyptus globulus*) plantation also exists in the project area. Details of tree inventory shall be done in later stage during the baseline Environment Study. Forest clearance is not applicable as no diversion of forest land is involved in the proposed project.

3.6.11 There is no Protected Areas (PA) including National Parks, Sanctuaries and Tiger Reserves etc. within 10 km of the project site. The project area is also not located within the Eco-Sensitive Zone (ESZ) or Eco-Sensitive Area (ESA) notified by the MoEF&CC. The project area is not located within CRZ area.

3.6.12 About 29.3 MLD waste water/ effluent/ Sewage will be generated during the operation phase. Total sewage generated from the residential area is about 13.3 MLD. Gravity sewage collection network has been proposed to collect and convey domestic sewage to the proposed Sewage Treatment Plant (STP). The STP will be built in phases in modular and scalable approach. The sewage shall be treated to applicable standards and shall be utilized for non-potable uses, including horticulture, flushing and water bodies recharge etc.

3.6.13 Total wastewater generated in RIMC (Industrial area) is about 15.75 MLD. The treatment of this wastewater shall be done in centralized CETP which shall be built in phases in modular and scalable approach. The treatment of this wastewater shall be done in CETP of 7.5 MLD and remaining 8.8 MLD shall be treated by the individual industry operators. Individual industries shall pre-treat the effluent prior to discharge in effluent collection network. Gravity effluent collection network with intermediate pumping stations has been proposed for collection of pre-treated effluent. Pre-treated effluent shall be collected and treated up to desired level prior to recycling for non-potable requirements of industries for

process and non-process requirement i.e. flushing, horticulture etc. The proposed project will comply zero discharge plan.

3.6.14 Benefits of the Project: Macro policy level changes coupled with development and availability of ready to use Manufacturing Zones like Raghunathpur will be an impetus towards higher Gross State Domestic Product (GSDP) including higher job creation in the state. Financial benefits anticipated due to savings in taxes along with higher lease rates for developed Raghunathpur Industrial zone is expected to deliver an overall financial gain to the industrial units. Proposed Skill Development Framework suggests conducting skill mapping of region, organizing skill gap studies, assessment of employability, preparing delivery mechanism for enhancing the employability, quality assurance and certification. Total Working Population projected for RIMC is 71125. IMC at Raghunathpur Industrial Park aims to generate and transfer socio-economic benefit to local and regional population in terms of offering immense employment opportunities, skill development, and improvement in livelihood. Proposed Industry sectors are highly manpower intensive and have huge potential for indirect job creation in the region. According to National Manufacturing Policy 2011, every job created in the manufacturing sector creates two-three additional jobs in related activities resulting in up to approximately 1.7 Lakh indirect Job due to RIMC (considering multiplier factor of 2.5). A vocational Training (Skill development) Institute has also been proposed as part of RIP Master Plan.

3.6.15 Details of Court cases: No Court case is pending against the proposed project.

3.6.16 The EAC, taking into account the submission made by the project proponent had a detailed deliberation during its 258th meeting on 17th -18th March, 2021 and **recommended the proposal for grant of Terms of Reference** with the specific conditions, as mentioned below, in addition to all standard conditions applicable for such projects:

- i. The proponent shall submit a detailed physical and fiscal targets and means of achieving as a part of the EMP in the EIA Report.
- ii. Both red and green category projects should be set aside in separate areas.
- iii. The planning of Industrial Estate should be based on the criteria mentioned in this Ministry's Technical EIA Guidance Manual for Industrial Estate (2009) as well as CPCB's Zoning Atlas Guidelines for siting industries.
- iv. No ground water shall be used in any case. Proponent is required to obtain permission from competent authority to use water from river or other surface water sources. Consent to Operate shall not be issued without obtaining permission competent authority for use of surface water.
- v. Provide detailed water balance statement a scheme to achieve ZLD by each industrial unit as well as for utilization of treated sewage.
- vi. Since, natural drainage pattern is seen in/around the proposed project site, it is important to have a detailed hydrogeological study on the catchment area of the drainage system within core zone of the project area
- vii. Detailed biodiversity study of the project area.
- viii. All tall and old and heritage native trees should be enumerated, GPS tagged and detailed in EIA EMP and plotting design should be such that all such trees are protected
- ix. The Action Plan on the compliance of the recommendations of the CAG as per Ministry's Circular No. J-11013/71/2016-IA.I (M) dated 25th October, 2017 needs to be submitted at the time of appraisal of the project and included in the EIA/EMP Report

- x. As per the Ministry's Office Memorandum F. No. 22-65/2017-IA.III dated 30th September, 2020, the project proponent, based on the commitments made during the public hearing, shall include all the activities required to be taken to fulfill these commitments in the Environment Management Plan along with cost estimates of these activities, in addition to the activities proposed as per recommendations of EIA Studies and the same shall be submitted to the ministry as part of the EIA Report. The EMP shall be implemented at the project cost or any other funding source available with the project proponent.
- xi. In pursuance of Ministry's OM No stated above the project proponent shall add one annexure in the EIA Report indicating all the commitments made by the PP to the public during public hearing and submit it to the Ministry and the EAC.
- xii. As proposed by PP themselves the cement clinker industry should be dropped from the list of industries in IMC.
- xiii. Extent of the green area and green belt should be increased. The width of green belt along the river bank/waterbodies shall be increase to at least 50 meters.

Agenda No. 3.7

Development of Zaheerabad National Investment and Manufacturing Zone (NIMZ) in Sangareddy District of Telangana by M/s Telangana State Industrial Infrastructure Corporation Limited - Environmental Clearance (Proposal No. IA/TG/NCP/71421/2017 and File No. 21-237/2017-IA.III)

“The EAC noted that the Project Proponent has given undertaking that the data and information given in the application and enclosures are true to the best of his knowledge and belief and no information has been suppressed in the EIA/EMP report. If any part of data/information submitted is found to be false/ misleading at any stage, the project will be rejected and Environmental Clearance given, if any, will be revoked at the risk and cost of the project proponent.”

3.7.1 The project proponent along with EIA Consultant M/s L&T Infrastructure Engineering Limited, Hyderabad has made a presentation through Video Conferencing and provided the following information.

3.7.2 The proposed project is for Development of Zaheerabad National Investment and Manufacturing Zone (NIMZ) in Sangareddy District of Telangana State. Telangana State Industrial Infrastructure Corporation Limited (TSIIC) has proposed to establish NIMZ at Nyalkal and Jharasangam Mandal's near Zaheerabad in Sangareddy District of Telangana in an area of ~12,635 acres (Acres 12,635.14 guntas, 5,113 ha) and will house both Category A and Category B Industries listed in the EIA notification, in pursuit of NMP of Department of Industry and Policy Promotion (DIPP) of Government of India.

3.7.3 The project land falls in 17 revenue villages i.e., Ganeshpur, Husselli, Ganjoti, Mungi, Rukmapur, Hadnur, Namtabad, Mamidgi, Kalbemal, Basanthpur, Metalkunta, Gangwar, Rejinthal and Malkanpahad villages of Nyalkal Mandal and Chilepalle, Yelgoi and Bardipur villages of Jharasangam Mandal, Sangareddy District. The infrastructure development being proposed includes water supply, water distribution, internal roads, storm water drains, electrical distribution network, internal street lighting, wastewater and waste management facilities, technical and support buildings, housing along with allied facilities, logistic zone with its necessary utilities, amenities and services.

3.7.4 The proposed project falls under 7(C), Category A. Total project cost is Rs. 3,095 Crore. The Terms of Reference was accorded vide letter no. F.No.21-237/2017-IA.III dated 01st March, 2018.

3.7.5 The topography of the site is almost flat terrain with levels varying from 605 m to 660 m. Project site falls in seismic zone II (Least Active Zone). Nearest Road Connectivity is SH-14 and SH-16 -passes through site and NH-65 (Pune – Machilipatnam Road) - 10km south. Nearest Rail Connectivity is Metalkunta (1.4 km)- railway station and Zaheerabad (10 km) railway station. Nearest Seaport is JNPT (600 km) on west coast and Krishnapatnam Port (465 km) on east coast. Nearest Airport is Rajiv Gandhi International Airport (RGIA) at Shamshabad, Hyderabad. It is located to the southeast of the site at a distance of 125 km by road (105 km aerial distance) and Bidar Airport is located at 17 km by road from the NIMZ site and is currently under Indian Air Force Station.

3.7.6 The project site is mostly comprised of barren and vacant lands. Few pockets of farmlands are also located within the site Land Use Type in project site are Scrub Land (44.6%), Agriculture Crop Land (27.65%), Fallow (26.21%), Plantation (0.8%), Rocky Area (0.43%), Built-up (Rural (0.31%)), Waterbodies (Tanks/pond/lakes; 0.02%).

3.7.7 Following industries are proposed to be housed with the project site-

Proposed Sector	Anticipated Types of industries/activities	Category as per EIA notification, 2006	Category as per CPCB
Electrical equipment	Manufacture of electric motors, generators, transformers and electricity distribution and control apparatus (includes electric motors, generators and motor generator sets, switchgear and switchboard apparatus etc.)	Not Applicable	Orange
	Manufacture of batteries and accumulators (includes batteries, rechargeable batteries, etc.)		Red and Orange
	Manufacture of wiring and wiring devices (includes wires for live transmission, optical cables)		Orange
Metals	Manufacture of basic iron and steel (Ferro alloys, wire of steel by cold drawing, tube and tube fittings etc.)	Category A and B	Red and Orange
	Manufacture of basic precious and other non-ferrous metals (includes manufacture of copper from ore, lead etc.)		
	Casting of metals (includes manufacture of tubes, pipes and hollow profiles, casting of non-ferrous metals)		
Food and Agro Processing	Processing and preserving of meat (includes production, processing and preserving of meat and meat) products, aqua food related processing (fish and prawns etc.)	Not Applicable	Red
	Manufacture of dairy products (includes manufacturing of milk, milk powder, ice cream etc.)		Red
	Manufacture of grain mill products, starches and starch products (includes flour milling, rice		Orange and Green

	milling, milling of other grains)		
	Manufacture of other food products (includes manufacture of bakery products, noodles, Processing of edible nuts etc.)		Orange
	Manufacture of prepared animal feeds (manufacture of cattle feed, poultry feed, feed for pets etc.)		Orange
Non-metallic minerals (except Glass)	Manufacture of non-metallic mineral products etc. (Includes manufacture of refractory products, clay building materials-bricks, tiles, ceramic products, AAC blocks, kerb stones, etc.)	Not Applicable	Orange and Green
Automobile	Manufacture of motor vehicles (such as manufacturing of Tractors, Buses etc.)	Not Applicable	Red
	Manufacture of parts and accessories for motor vehicles (includes parts such as brakes, gearboxes, axles, seats, tyres, rubber products etc.)		Orange and Green
Machinery	Manufacture of general-purpose machinery (includes manufacture of hydraulic and pneumatic components, pumps, compressors, taps, valves, lifts, etc.), construction machinery, power machinery.	Not Applicable	Red, Orange and White
	Manufacture of special-purpose machinery (includes manufacture of agriculture implants, machine tools for drilling, milling, industrial machinery etc.)		
Transport equipment	Manufacture of Railway locomotives and rolling stock	Category A and B	Red
	Manufacture of Military fighting vehicles		

3.7.8 The nearest water bodies from the proposed development is Madhura Nadi at 0.2 km, S and Narinja Reservoir at 1.5 km, S. The existing streams/drains within the project site will be retained as per the ToR requirement from MoEF&CC. The drains passing through the area shall be routed as per the proposed drain routing plan. Due care will be taken during construction to avoid spillage of construction materials. An adequate drainage system will be provided at the site with separate collection streams to segregate the storm run-off from roads, open areas, material storage areas, vehicle wash water and other wastewater streams. Drainage system will be provided at construction yard. Measures will be taken to prevent silting of natural drainage due to runoff from construction areas. Proper drainage by providing surface drainage system from the development parcels and connecting to storm water network. Natural drainage wherever retained will be strengthened to receive the newly channelled drainage to withstand the increased flow rates. Storm water drainage network is to be designed wherever diversion of the drains is proposed. At all drains located near the discharge points into natural drains a desilting and filter chambers shall be provided at suitable intervals which shall be preferably located right below the manhole covers provided on top of the drain to enable periodic cleaning and de-silting of these wells.

3.7.9 Total water (one time) requirement for the proposed development is estimated as 119.34 MLD and 2.5 ML of fire water demand. After treatment of sewage in proposed STP of 43.64 MLD and effluent in CETPs of 27.3 MLD capacity, it is proposed to reuse the treated wastewater into the system which will be in the order of 61.64 MLD. Thus, the net water demand for the proposed NIMZ is 57.71 MLD and 2.5 ML of fire water demand. The

fresh water will be sourced from the Singur reservoir located at about 25 km from the project site. Water allocation consent letter has been obtained from Irrigation and CAD Department. The proposed development will not draw groundwater.

3.7.10 The public hearing was conducted on 20th January, 2021, by TSPCB. The meeting was conducted by the panel consisting of Collector, Joint Collector, Sangareddy District, and Environmental Engineer, Regional office Sangareddy, Telangana State Pollution Control Board. The budgetary estimate (Capital Cost) for Environmental Management is Rs. 300 Crores and the annual recurring cost is Rs. 29.7 Crores.

3.7.11 There is no Protected Areas (PA) including National Parks, Sanctuaries and Tiger Reserves etc. within 10 km of the project site. The project area is also not located within the Eco-Sensitive Zone (ESZ) or Eco-Sensitive Area (ESA) notified by the MoEF&CC. The project area is not located within CRZ area. No forest diversion is involved in the proposed project.

3.7.12 About 27.299 MLD Wastewater and 43.64 MLD Sewage will be generated. Member industry shall carry out primary treatment and shall discharge to CETP after meeting the inlet characteristics of CETP. Multiple CETPs will be developed and overall capacity of CETP will be in the order of 27.3 MLD. Sewage generated at site and at construction workers camp will be collected in holding tank and periodically transferred to temporary Sewage Treatment Plant (STP). In case of non-availability of nearby STP, mobile STP and septic tank with soak pits will be also be explored. No wastewater shall be disposed directly on land or on existing surface water resources without appropriate treatment. An STP of ~ 44 MLD capacities to handle sewage waste from overall site development is proposed and the treated wastewater is stored in an underground retention tank for 24hrs before conveyance for non-potable usage. The treated wastewater from CETP & STP shall be reused to reduce the usage of freshwater resources.

3.7.13 Municipal Solid waste of 154.37 TPD at 100% occupancy is estimated to be generated. Out of this, biodegradable waste constitutes to 123.5 TPD and the non-biodegradable waste constitutes to 30.87 TPD. Integrated solid waste management facility is proposed for handling of MSW generated. Industrial solid waste is estimated as 423 TPD which includes 85 TPD of hazardous waste and 338 TPD of non-hazardous waste. It has been estimated that about 13.2 tonnes of sludge will be generated daily (@300kg/ MLD) from the proposed STPs and about 8.2 tonnes/ day of sludge from the CETPs. Hazardous waste will be sent to nearest Hazardous waste management facility is located at Dundigal (78km from project site) near Hyderabad ORR. Non-hazardous waste will be given to TSPCB approved recyclers/vendors for further treatment and disposal.

3.7.14 The overall power requirement for the proposed NIMZ is 678.63 mVA. The nearest 220 kV supply tapping point is Sadhashivpet 220/132 kV substation, which will be utilised initially. Solar Power Harnessing would be adopted within NIMZ built up areas particularly at available roof tops. Estimated Installation Capacity and Cost for Solar Power Harness 26.55 MW.

3.7.15 Rainwater Harvesting shall be implemented at NIMZ to conserve rainwater. Roof top area, greenbelt/green area, road/paved area, and open areas proposed in the NIMZ are considered for estimating the rainwater which can be harvested. Estimated Volume of run-off that can be harvested is 1930631.34 m³.

3.7.16 Approximately 2300 tree are envisaged to be cut. The total Green area planned in the layout is 1974.4 acres (15.6%) under layout periphery green belt, traffic rotaries, green buffer areas and open green spaces. In addition, each industrial plot will maintain 33% area of its area under Green areas around their industrial plot as per TSPCB guidelines. Approximately, 8,87,000 no. of trees are proposed to be planted in entire NIMZ at park level. The survival of the plantation shall be monitored frequently and survival rate of the plantation during operational phase shall not be less than 80%. A capital cost of INR 135 million (13.5 Crores) shall be earmarked for this purpose and INR of 6.75 million (0.675 Crores) shall be allocated for recurring expenses towards green belt development and maintenance. In addition to this, all other industrial units shall develop green areas within their premises as per the prevailing TSPCB provisions.

3.7.17 Benefits of the project: The development of the NIMZ is being envisaged by TSIIC taking into consideration the overall development of Industries in the state. The Nation, State and the region will have impetuous benefits from such development, such as Skill development and Training to the local population, technology transfer, shifting of manpower resources from low productivity to high productive activities, better quality of educational and medical facilities to the local people, improved local infrastructure, improved socio-economic conditions, employment opportunities, etc. NIMZ is envisaged to generate direct and indirect employment of 2,66,000 peoples. During operational phase, the NIMZ and associated facilities is likely to generate direct employment of 1,33,233 people. This project may generate indirect employment of around 1,33,233 people.

3.7.18 Details of Court cases: No Court case is pending against the proposed project. Land related cases are being dealt separately

3.7.19 The EAC, taking into account the submission made by the project proponent had a detailed deliberation during its 258th meeting on 17th -18th March, 2021 and **deferred** the proposal for want of following documents/ information:

- i. The planning of Industrial Estate should be based on the criteria mentioned in the Ministry's Technical EIA Guidance Manual for Industrial Estate (2009) as well as CPCB's Zoning Atlas Guidelines for positioning of industries. Phase wise industrial planning be submitted.
- ii. Automobile industry will be engaging in painting activity, which comes under **Red category**, hence industries can be clearly demarcated.
- iii. Several representations were received by the Ministry on the issues related to land acquisition and compensation paid to the land owners. The EAC suggested Ministry to forward representations to the PP so that a detailed response in a tabular form be submitted on the issues raised by the stakeholders.
- iv. The Proponent should submit a detailed report about direct and indirect type of employment opportunities during construction and operation phase.
- v. An elaborate report presiding land acquired, compensatory details and the period for settlement has to be sorted according to the State Government Policy.
- vi. As per the Ministry's Office Memorandum F. No. 22-65/2017-IA.III dated 30th September, 2020, the project proponent, based on the commitments made during the public hearing, shall include all the activities required to be taken to fulfill these commitments in the Environment Management Plan along with cost estimates of these activities, in addition to the activities proposed as per recommendations of EIA Studies and the same shall be submitted to the ministry as part of the EIA Report.

- vii. Detailed Risk Assessment and Management of the project shall be prepared and submitted.
- viii. Hamlets proposed in the industrial area would lead to a negative impact hence settlements have to be planned in a safe zone and a modified plan be submitted.
- ix. The proponent should develop a Greenery and Conservation management plan to sustain existing greenery.
- x. All tall and old and heritage native trees should be enumerated, GPS tagged and detailed in EIA EMP and plotting design should be such that all such trees are protected

Agenda No. 3.8

Integrated development of International Container Transshipment Terminal (ICTT)- 14.2 Million TEU along with Greenfield International Airport (4000 Peak Hour Passengers-PHP), Township & Area development and 450 MVA Gas and Solar based power plant in 16610 ha. Great Nicobar Islands, Nicobar District by M/s Andaman and Nicobar Islands Integrated Development Corporation Ltd. - Terms of Reference (Proposal No. IA/AN/NCP/201159/2021 and File No 10/17/2021-IA.III)

“The EAC noted that the Project Proponent has given undertaking that the data and information given in the application and enclosures are true to the best of his knowledge and belief and no information has been suppressed in the EIA/EMP report. If any part of data/information submitted is found to be false/ misleading at any stage, the project will be rejected and Environmental Clearance given, if any, will be revoked at the risk and cost of the project proponent.”

[Note: *The required documents of the proposed project were not submitted by the proponent on time for its appraisal by the committee.*]

3.8.1 The project proponent along with EIA Consultant M/s AECOM India Private Ltd. Gurgaon made a presentation through Video Conferencing and provided the following information:

3.8.2 Andaman and Nicobar Islands Integrated Development Corporation Limited (ANIIDCO) propose Holistic Development of Great Nicobar Island in Andaman and Nicobar Islands. Integrated development of International Container Transshipment Terminal (ICTT) - 14.2 Million TEU along with Greenfield International Airport (4000 Peak Hour Passengers-PHP), Township & Area development and 450 MVA Gas, Diesel and Solar based power plant in Eastern and Southern parts of Great Nicobar Islands.

3.8.3 As a part of Holistic Development of Great Nicobar Islands, Deep Berth Port (with ancillary areas for International Trans-shipment terminal) as primary component is planned along with International airport (with ancillary area), power generation and distribution network and township are planned which are interlinked projects to ICTT.

3.8.4 The total area required for the proposed project is 16610 ha (Port (ICTT) - 766 ha + Airport - 845 ha + Township & Area Development- 14960 ha + Power Plant – 39 ha). This area excludes the reclamation areas for port and airport which are 227 ha and 194 ha of

reclamation area, respectively. The proposed Project site is in not connected through any road. Currently, the access is through sea and air route only. Approach roads shall be developed within the Islands.

3.8.5 The proposed project fall under 7 (e) Ports, harbours; 7 (a) Airport Project; 1 (d) Power Plant; and 8 (b) Township & Area Development project, Category A, Scheduled to the EIA Notification, 2006. The ICTT can be developed at a cost of Rs. 35,95,900 lakhs. The international airport can be developed over a 5-year period, including one year for procurement. The cost of the Airport is estimated at Rs. 10,35,900 lakhs. will requires development of simultaneous primary and secondary urban infrastructure networks such as roads, public transport, energy and electrical power, as well as water, wastewater, and storm water facilities and services, which will form the skeleton of the proposed township master plan. Therefore the PP has submitted the proposal to the EAC (Infra-1) in order to facilitate a comprehensive appraisal.

3.8.6 Land use has been worked out to get the most out of the planned Transshipment terminal. As per the estimated traffic of 14.2 Million TEU's during Final Phase, the total reclaimed land (227 Ha) has been redistributed between berths (13%), container storage (70%), building & utilities (1%), road & pavements (9%) & Green areas (6%). Green zone has been assigned keeping in view of the diverse flora & fauna of the Nicobar region.

3.8.7 There will be change in Terrain/topography due to the proposed project development, which will be covered with the integrated project and road network in the site. There will be optimum use of the undulating topography in landscaping and site planning for enhancing the image ability of the place.

3.8.8 Water bodies & impact on drainage: Adjacent to Andaman Sea some water bodies exist such as Matait Anla Near Gandhi Nagar, South Bay (Galathea), Mata Taruwa Bay, Pemayya Bay near Pulobaha, Nanjappa Bay near Pulo Bekka, Galathea River or Dak Kea, Dak Aleh, Dak Ubho, Dak Tolai Near Pulabaha, Dak Air, and Dak Thena. Impact on drainage is being studied.

3.8.9 Total Water Demand during Operational Phase shall be 160 MLD. 90 MLD shall be Potable/Fresh Water Demand. Source of Fresh/Potable Water will be River Water/ Sea Water. NOC shall be worked in during EIA study. No water ground water extraction/usage proposed.

3.8.10. Tree cutting: No details are available

3.8.11 Diversion of about 13,075 ha of forest land is involved in the proposed project.

3.8.12 Within 10 km of the proposed project sites includes some protected areas such as Galathea National Park (107.103 sq. km), Campbell Bay National Park (391.751 sq. km) and Biosphere reserve (732.798 sq. km). The proposed integrated developments are planned away from ESA/ESZ of these protected areas. The proposed project sites fall under CRZ area. The CRZ studies and mapping is being carried out by National Centre for Sustainable Coastal Management, MoEF&CC, Chennai

3.8.13 STP/CETP: The combined STP capacity shall be 110 MLD and design is being carried out. The Treated Wastewater/Sewage shall be used for non-potable purpose such as flushing, irrigation, washing etc

3.8.14 Owing to the naturally available water depths, relatively lower quantity of dredging is required. Backup area will be mainly created by way of reclamation. Part of material for reclamation shall be obtained from the dredged material and the balance requirement shall be met through the borrowed fill, either through back up land grading site or brought from distant locations through the barges/ships. Unsuitable dredged material shall be disposed at an identified offshore location in about 40 m contour. The location shall be duly selected after mathematical model studies of dredged plume dispersion.

3.8.15 Terminal yards for storage of cargo/containers and during construction temporary facilities will be provided to store construction materials. Open Storage Yard will be provided for container stacking, temporary storage for construction materials. Storage of HSD from DG sets and other equipment / Machinery.

3.8.16 Emissions from ships, vehicles during transportation and operational phase shall be controlled basis MARPOL convention protocol. Adequate pollution control measures will be taken during storage and handling of material. There shall be regular inspection, barriers at the perimeter of storage materials, proper maintenance of vehicles etc. The details of the emissions and control measures will be provided in EIA report.

3.8.17 Fugitive emissions are envisaged from material handling and transportation areas during the construction stage. These will be controlled by good housekeeping, sprinkling water in the dust prone areas, providing paved roads and proper fencing.

3.8.18 Spills are unlikely to occur during normal operations, as the primary in ICTT would be containers which would be handled using specialised equipment. In the event of accidental spills of cargo during transfer from / to the ships, Soil and groundwater remediation activity will be undertaken as per the requirement. Emission control norms and spill contingency shall be adhered to in all the cases.

3.8.19 The coastal stretches on the western coast are used both by Shompens and Nicobarese for fishing purposes. In terms of fisheries, the site has huge potential for oceanic tuna, which is virtually unexploited, and offers ample scope for deep sea fishing.

3.8.20 The area is inhabited by settlers from the mainland and aboriginal tribes Shompen and Nicobarese. No project activities are envisaged in the areas where the aboriginal tribes reside and therefore no impacts on the social and economic conditions are expected. However, due to the proposed development the likely change in the livelihood patterns, socio economic conditions, social behaviours, disease patterns, dependency on natural resource etc., for the settler community will be improved. The proposed development will generate significant number of jobs over the next two decades and catalyse the socio-economic growth of the local population in addition to improving connectivity and developing eco-tourism of the region.

3.8.21 Land acquisition and R&R issues are involved in 2 out of 7 revenue villages.

3.8.22 Benefits of the project: The proposed ICTT will allow India to participate in the regional and global maritime economy by becoming a major player in cargo transshipment. The proposed airport will support both the maritime sector and the tourism sector, which will attract international and national tourists to Great Nicobar to experience the outstanding natural environment and participate in sustainable tourism activities. A Mixed-use urban development in the vicinity of these major infrastructure works will also be necessary to support quality of life for the residents that will generate and enable growth in the various economic sectors over time. This will require the development of simultaneous primary and secondary urban infrastructure networks such as roads, public transport, energy and electrical power, as well as water, wastewater, and storm water facilities and services, which will form the skeleton of the proposed township master plan. It is estimated that after the project is fully implemented, it has the potential to generate around 2.6 Lakh jobs opportunity.

3.8.23 Details of Court cases: No Court case is pending against the proposed project. Land related cases are being dealt separately.

3.8.24 The EAC at the outset noted that this project encompasses development of simultaneous primary and secondary urban infrastructure networks such as roads, public transport, energy and electrical power, as well as water, wastewater, and storm water facilities and services, which will form the skeleton of the proposed township master plan. Therefore the PP has submitted the proposal to the EAC (Infra-1) in order to facilitate a comprehensive appraisal. The EAC taking into account the submissions made by the project proponent had a detailed deliberation during its 258th meeting on 17th -18th March, 2021 and **deferred** the proposal due to non-submission of the proper documents and for the want of following documents/ information:

- i. Details of Township & Area Development project for which 14960 ha of land will be require out of 16610 ha, however, no details have been provided. Details regarding component of Township & Area Development project along with proposed land use, site grading shall be submitted. A note on feasibility of habitation in light of hazards such as seismic, Tsunami etc to be included.
- ii. Detailed requirement of the freshwater along with the source of water for various component of the project detailing water budget shall be calculated and submitted.
- iii. The site proposed for Port be re-analysed in terms of impact on Leatherback Turtle and other geo-seismological view. Alternate site should also be explored as a precautionary principal.
- iv. Geographical Meteorological study report be obtained from Indian Meteorological Department and National Centre for Seismology and submit assessment with regard to the proposed activities.
- v. Conformity of proposed integrated development in relation to latest CZMP at 1: 4000 scale and Island Development plan for Great Nicobar should be provided.
- vi. Area statement indicating total area of great Nicobar, components of proposed activities, ecologically sensitives areas and non-development areas, forest area etc., to be provided.

Agenda 3.11

Any other item with the permission of Chair.

No other items were discussed by the Committee

Annexure-A

Following members were present during the 258th EAC (Infra-1) meeting held on 17th – 18th March, 2021:

S. No.	Name	Designation	Remarks
1.	Dr. Deepak ArunApte	Chairman	Present
2.	Sh. S. Jeyakrishnan	Member	Present
3.	Sh. Manmohan Singh Negi	Member	Present
4.	Sh. Sham Wagh	Member	Present
5.	Dr. MukeshKhare	Member	Requested absentia
6.	Dr. Ashok Kumar Pachauri	Member	Present
7.	Dr. V.K Jain	Member	Absent
8.	Dr. Manoranjan Hota	Member	Present
9.	Sh. R Debroy	Member	Absent
10.	Dr. Rajesh Chandra	Member	Absent
11.	Dr. M.V Ramana Murthy	Member	Present
12.	Smt. Bindu Manghat	Member	Absent
13.	Dr. Niraj Sharma	Member	Present
14.	Sh. Amardeep Raju,	Scientist 'E' & Member Secretary, MoEF&CC	Present
15.	Dr. Rajesh P Rastogi	Scientist 'C', MoEF&CC	Present
