MINUTES OF THE 46th MEETING OF THE RE-CONSTITUTED EXPERT APPRAISAL COMMITTEE (EAC) ON ENVIRONMENTAL IMPACT ASSESSMENT (EIA) OF THERMAL POWER & COAL MINING PROJECTS

The 46th Meeting of the reconstituted EAC (Thermal Power) was held on 26th- 27th November, 2015 in the Ministry of Environment, Forest & Climate Change at Teesta Meeting Hall, Vayu Wing, First Floor, Indira Paryavaran Bhawan, Jorbagh Road, New Delhi-110003. The following members were present:

1.	Shri Anil Kumar	-	Chairman
2.	Prof. C.R. Babu	-	Member
3.	Shri N.K. Verma	-	Member
4.	Shri A.K. Bansal	-	Member
5.	Shri G.S. Dang	-	Member
6.	Dr. S.S. Bala	-	Member (Representative of CPCB)
7.	Dr. S.D. Attri	-	Member (Representative of IMD)
8.	Shri B.B. Barman	-	Member Secretary

Shri T.K.Dhar, Shri J.L Mehta, Dr. Ratnavel, Representatives of CEA and WII could not be present. List of other participants is at **Annexure–I.**

At the outset, the Committee welcomed the new Chairman. Chairman reciprocated and congratulated Professor Babu for very successfully conducting the Committee since July, 2014, subsequent to the resignation of earlier Chairman.

Item No.1: CONFIRMATION OF THE MINUTES OF THE 45th EAC (LAST) MEETING.

No comments/observations were received and therefore, the Minutes of the 45th EAC (Thermal Power) meeting held on 29th -30th October, 2015 as circulated were confirmed.

Item No. 2: CONSIDERATION OF PROJECTS

2.1 Expansion of Ramagundam STPP by addition of 2x800 MW (Stage-IV, Telangana STPP, Phase-I) at Village & Mandal Ramagundam, District Karimnagar, Telangana by M/s. NTPC Ltd.- reg. reconsideration for EC

The proposal was earlier discussed in the 45th Meeting of the EAC (Thermal) held during 29th -30th October, 2015, the minutes of which are as under:

Quote "The Project Proponent (PP) along with their environmental Consultant, Vimta Labs, Hyderabad made a presentation and *inter-alia* provided the following information:

- (i) ToR for carrying out EIA study and preparation of EMP for the above proposal (2x660 MW) was accorded by the Ministry on 16.09.2014 and an amendment of ToR for revision of capacity to 2x800 MW was accorded on 12.12.2014. The baseline data for EIA/EMP was collected during December, 2014-February, 2015. The final EIA/EMP report, after conducting Public Hearing on 23.05.2015, was submitted to the Ministry for consideration of environmental clearance.
- (ii) The land requirement for the proposed TPP would be about 635 acres (main plant- about 235 acres and ash pond-about 400 acres) and will be accommodated within the existing Ramagundam Thermal Power Station. No R&R issues are involved. There are no

ecologically sensitive areas such as Biosphere Reserve, National Park and Wildlife Sanctuary within a radius of 10 km from the site. River Godavari flows at a distance of about 4 km from the project site. The nearest railway station, Ramagundam is about 5 km from the plant which lies on the main Kazipet - Ballarshah broad gauge railway line of South Central Railway. The cost of the expansion project is about Rs. 9,954.20 Crores, which includes about Rs. 834.81 crores for environmental protection measures.

- (iii) The coal requirement will be 8 MTPA based on GCV of coal between 3,200-3,900 Kcal/kg Ministry of Coal (MoC) vide letter dated 10.09.2015 has allotted Mandakini-B Coal Mine block in Odisha to the proposed TPP. To expedite the process of project implementation, MoC vide its letter dated 21.09.2015 has accorded in-principle approval for grant of tapering linkage from Coal India Limited (CIL) for the proposed TPP as an exceptional case till the operation of Mandakini-B coal block. The sulphur and ash content in the coal will be 0.5 % (max) and 34-43 % respectively. The transportation of coal will be by rail.
- (iv) The water requirement of the proposed TPP is 5,825 cum/hr (about 58 Cusecs), which is proposed to be drawn from Sreepada Yellampally barrage on River Godavari at a distance of about 14 km from proposed site. Govt. of Telangana vide letter dated 31.03.2015 has accorded commitment for 60 Cusecs (2.0 TMC) of water from Sreepada Yellampalli barrage for the proposed TPP. COC of 5.0 shall be adopted. The plant would be designed on zero discharge concept in normal circumstances.
- (v) The detailed Hydro-Geological study was carried out through Multi-Tech Services, Hyderabad and the report is enclosed as Annexure-XVI in the final EIA report. As per the said report, the stage of ground water development including existing industrial utilization in the study area is 48.92%. The long term water level monitoring data of CGWB observation well data at Ramagundam and Mancherial in the study area indicate a marginal increasing trend of pre-monsoon or post-monsoon ground water levels. The proposed project does not envisage any drawl of ground water. As the required water from the Yellampalli project is very less compared to the availability, no adverse impact on surface water is envisaged.
- (vi) One Twin flue stack of 275 m height shall be installed. The base-line monitoring was done during December, 2014-February, 2015. The maximum base line concentrations of PM, SO₂ and NOx are 68.5 μ g/m³, 23.5 μ g/m³ and 32.8 μ g/m³ respectively The maximum incremental concentrations of PM, SO₂ and NOx are 0.52 μ g/m³, 34.22 μ g/m³ and 13.04 μ g/m³ respectively. The resultant Ground Level Concentrations (GLCs) of these parameters will be within the National Ambient Air Quality Standards (NAAQS).
- (vii) The ash generation will be 3.44 MTPA. Ash utilization/management shall be done as per MOEF Gazette Notification on utilization of ash dated 03.11.2009. Ash utilization plan will be implemented for 100% extraction and utilization of dry fly ash along with suitable collection, storage, segregation, loading, transportation and disposal etc. facilities. Dry form fly ash shall be pneumatically transported to fly ash silos. Loading this ash in tankers/ bulkers and also into rail wagons. Fly ash shall be taken by High Concentration Slurry Disposal system (HCSD) and bottom ash through Wet Slurry Disposal system for ultimate disposal to ash disposal area. Expressions of interests for using ash from the proposed TPP were received from Orient Cement, Kesoram Cement and Vasavadatta Cement plants.

(viii) Public Hearing/Public Consultation for the project was conducted by Telangana SPCB on 23.05.2015. The issues raised in the PH pertained to increasing the funds allocated under CSR, employment to the locals & land oustees, adopting the affected villages and provide basic amenities like water, roads, education, health etc., green belt development, control of pollution, facilitating better infrastructure, to construct women society building and underground drainage system in Annapurna colony, to facilitate an agreement for establishing an ESI hospital, medical college, school in collaboration with SCCL & NTPC. The Committee discussed the issues raised in the Public Hearing and the reply of the PP.

2. After detailed deliberations, the Committee sought the following information/documents which was either not available in the EIA/EMP report or not found appropriate: Accordingly, the proposal was **deferred**.

- I. Commitment and Action Plan for compliance to the Ministry's Notification dated 02.01.2014 regarding use of coal with ash content not exceeding thirty-four per cent, on quarterly average basis.
- *II.* Detailed note on rise in temperature in consultation with IMD. The data shall be as old as possible.
- *III. Certification from the concerned authority that the site is not located on economically feasible mineable mineral deposit (ToR 15).*
- *IV.* Occupational Health and epidemic health disorders survey of the study area.
- *V.* The Quality of effluent from ash pond vis-à-vis the River water quality. The impact on agricultural fields in terms of heavy metal in food chain and ground water/soil.
- VI. Plan for recycling and reuse of ash pond effluent after minimizing the discharge of cooling water blow down etc. to the ash pond. No untreated ash pond effluent shall be discharged.
- VII. Detailed report on water drawl, water channels and diversion duly certified by the Irrigation & Flood Control Department of the State Government.
- VIII. Satellite map showing the existing green belt. Revised plant layout by maintaining thick three-tier green belt in minimum 33% area.
- *IX.* As committed, revised CSR action plan for the proposed expansion with a minimum budget of Rs. 20 Crores (only for the construction phase).
- *X.* Budgeted Action plan for the Public Hearing issues.
- XI. Reply to the representation received by the EAC, a copy of which was provided to the PP.
- XII. Revised AAQ modeling results.
- XIII. Commitment for installation of FGD.
- XIV. Detailed document/permission for tapering coal linkage.

XV. All the discrepancies, if any, in the EIA/EMP shall be addressed and submitted. **Unquote**"

2. Upon submission of the above documents/information, the proposal was again placed before the Committee during this meeting, wherein the PP along with their environmental consultant, Vimta Labs, Hyderabad, made a presentation and inter-alia, provided the following information:

- (i) Regarding compliance to the Ministry's Notification dated 02.01.2014, the coal with ash content not exceeding 34% on quarterly basis will be used for the project. Accordingly, the modified Ash Utilization Plan with 34 % maximum ash content has been submitted and also presented.
- (ii) Regarding rise in temperature, the temperature data has been collected from IMD for 1951 to 1980, 1971 to 2000 and 2001-2015 (October) for a period of 65 years. An increase of 4°C in a span of 30 years has inadvertently been mentioned under subsection 3.3.3.3 of chapter-3 of the EIA report due to erroneous comparison of mean maximum IMD data for a period 1951-1980 with the latest 2014 annual temperature data as recorded at Ramagundam STPS. However, comparison of IMD data for period 1951-1980, 1971-2000 and 2001-2015 shows decrease of mean maximum temperature in range between 0.3°C to 1.6°C before and after commissioning of project. The mean maximum temperature during period 1951-1980 (May) is 45.6°C, during period 1971-2000 (May) is 45.3°C and during period 2001-2015 (May) is 43.7°C. Therefore, the mean maximum temperature showed a fall of 0.3°C during the period of 1951-1980 to 1971-2000 and a further fall of 1.6°C during the period of 1951-1980 to 2001-2015. The extreme maximum temperature during period 1951-1980 (May) is 47.2°C, during period 1971-2000 (May) is 47.3°C and during period 2001-2015 (May) is 47.2°C. Further, an increase of 0.1°C is observed in the month of May during period 1951-1980 & 1970-2000 followed by a decrease of 0.1° C during subsequent period.
- (iii) Regarding economically feasible mineable mineral deposit, a letter has been written by NTPC on 02.11.2015 to Deputy Director General, Geological Survey of India requesting to issue the certificate on mineable deposits in the proposed project location. Necessary Certificate is awaited. However, it is reiterated that the proposed project is being set up within the existing premises of Ramagundam STPS.
- (iv) Regarding occupational health, a survey on Environmental Human Health Risk Assessment was conducted by M/s. Pollucon Laboratories Pvt. Ltd, Surat in and around Ramagundam area. The study revealed that there is no specific endemic disease in the surrounding area & the health status of study population was satisfactory and health problems reported during the study were not showing any unusual pattern. The health related problems found during the study like general health related complaints, high blood pressure, malnutrition, anaemia, refractive error were mainly due to life style related factors and not due to above mentioned pollutants in emission.
- (v) Regarding the quality of ash pond effluent, the water samples are collected in River Godavari as well as ash pond effluent. Soil samples are collected from agricultural fields of three villages namely Lingapuram, Rayadandi and Peddampet wherein the farmers irrigate their fields with ash water. Paddy samples are collected from Rayadandi Village where in farmers irrigate their fields with ash water. Paddy samples has also been collected from Elkalapalli as a controlled sample. The results of various parameters are within the limits.

- (vi) Regarding recycling and re-use of ash pond effluent, the entire ash pond effluent (ash water) of Telangana STPP Stage-I (2x800) MW will be recycled for use in the plant and ash handling system. Ash water recirculation system comprising of pumps and piping are envisaged for the same.
- (vii) Regarding report on water drawl etc., irrigation & CAD Department, Government of Telangana vide its letter dated 02.09.2015 has accorded and certified permission for drawl of 60 cusecs (2.00 TMC) water throughout the year from Sreepada Yellampalli Barrage from the net available yield.
- (viii) Regarding greenbelt, the photographs relating to green belt development along with satellite map are presented. The revised General Layout Plan with additional proposed Green belt is also presented. Greenbelt of 60 acres shall be provided as shown in Layout plan.
 - (ix) Regarding CSR action plan, an amount of Rs. 20 crores (during construction phase/five years) will be earmarked for CSR activities of the proposed expansion in the areas of education, health, sanitation, water, electrification, infrastructure etc. During the operation period, CSR funds will be allocated as per GoI Policy.
 - (x) Regarding budgeted action plan for the Public Hearing issues, during the Public Hearing proceedings most of the public have expressed their concern regarding the Community Development activities for their respective villages. In addition to the regular CSR budget of existing Ramagundam plant, one time cost provision of Rs. 20 Crores for implementation of Community Development (CD) activities related to water, roads, education, health, sanitation, training and support for IGS, etc. under CD Plan for Telangana Project will be earmarked based on assessed needs. Further, post commissioning of Telangana project, CSR funds will also be allocated for Project as per Company Act 2013/ Govt. Guidelines/ NTPC Policy.
 - (xi) Reply of PP to the representation received by the EAC has been submitted and also presented.
 - (xii) Regarding the AAQ modeling results, the prediction of maximum Ground Level Concentrations (GLC's) on AAQ due to the proposed power project has been carried out taking in to consideration the worst coal characteristics and worst micro-climatic condition. Based on modeling predictions, it can be concluded that the predicted incremental ground level concentration of SO₂ is about 21.5 μ g/m³ by using WCL coal. This value when compared to predicted GLCs of SCCL coal (i.e. 34.22 μ g/m³) reduction of SO₂ emission rate by 37% is observed. As per discussions with CEA representative of EAC, emission load of SO₂ is observed as 27.1 μ g/m³ considering coal quantity as 7.36 MTPA. Significant reduction in air emission load is envisaged with the use of WCL coal.

The maximum base line concentrations of PM_{10} , SO_2 and NOx are 68.5 $\mu g/m^{3}$, 23.5 $\mu g/m^3$ and 32.8 $\mu g/m^3$ respectively. The maximum cumulative incremental concentrations of PM_{10} , SO_2 and NOx considering the coal from SCCL /worst case scenario are 11.41 $\mu g/m^3$, 54.47 $\mu g/m^3$ and 20.11 $\mu g/m^3$ respectively. Accordingly, the resultant Ground Level Concentrations (GLCs) of PM_{10} , SO_2 and NOx will be 79.91 $\mu g/m^3$, 77.97 $\mu g/m^3$ and 52.91 $\mu g/m^3$ respectively.

- (xiii) Regarding installation of FGD, the cumulative impact indicates a maximum SO_2 concentration of 65.10 µg/m³ with the committed tapering linkage of WCL coal which is well within prescribed limits. However, space provision has been kept in General Layout Plan for retrofitting FGD System in future, if required.
- (xiv) Regarding tapering coal linkage, Coal India Limited (CIL) vide its letter dated 06.11.2015 has allotted tapering coal linkage for the Telangana Stage-I STPP (2x800) MW from Western Coalfields Ltd. (WCL).
- (xv) Regarding discrepancies, if any, in the EIA/EMP, the issues raised in the minutes of EAC meeting have been addressed.

3. Based on the information/document provided by the Project Proponent and clarification provided during detailed discussions held on all the issues, the Committee recommended the project for environmental clearance subject to stipulations of the following additional specific conditions:

- I. As the Satellite Imagery submitted was not clear, a clear satellite imagery shall be submitted to the Ministry and its R.O. Further, latest authenticated satellite imagery shall be submitted on an annual basis to the Ministry and its R.O. to monitor the alterations of the area.
- II. The PP shall ensure compliance to the Ministry's Notification dated 02.01.2014 regarding use of coal with ash content not exceeding thirty-four per cent, on quarterly average basis. This is to be ensured by incorporating a condition in the MoU/FSA with CIL etc. Also, if required, coal washery shall be installed.
- *III.* The Sulphur and ash content of coal shall not exceed 0.5% and 34 % respectively. In case of variation of quality at any point of time, fresh reference shall be made to the Ministry and suitable amendments to the environmental clearance will have to be sought.
- *IV.* FGD shall be installed as the emissions are found to be almost reaching threshold limit of 80 unit (for the worst case scenario) and also considering the cushion w.r.t NAAQS.
- V. NTPC shall endeavor to enter into MoUs with NHAI, Associations of Cement Industries and Municipal Authorities for ensuring ash utilization in roads construction and cement manufacturing.
- VI. The PP shall examine possibility of relocating the ash pond. In case, the relocation of ash pond is not possible, precautionary measures by providing maximum green belt between ash pond and reservoir etc. shall be undertaken.
- VII. Study shall be conducted regarding the impact on agricultural fields in terms of heavy metal in food chain and ground water/soil for a period of one year and the report submitted to the Ministry.
- VIII. The Ash Water Re-circulation System (AWRS) shall be immediately installed for the existing TPP. Till that time, the ash pond effluent shall not be discharged into agricultural fields etc.
- *IX.* The PP shall enhance the green belt of the existing TPP in compliance to the earlier EC conditions etc.

- X. Long term monitoring of temperature shall be undertaken on-site and off-site of the TPP, as data of decrease in temperature needs to be verified. Further, requisite corrective action shall be taken based on the findings of the monitoring.
- XI. As the data for the health studies was more than five years old, a fresh Occupational Health and epidemic health disorders survey of the study area (10 km radius) shall be conducted and the report submitted to the Ministry and its R.O. within one year.
- XII. As committed, a minimum amount of Rs. 20 Crores shall be earmarked as capital cost for CSR activities and the recurring cost per annum shall be as per the CSR policy of GOI till the operation of the plant commences.

2.2 300 MW replacement Coal Based Thermal Power Project at Parli- Vaijanathi, District Beed, Maharashtra by M/s Maharashtra State Power Generation Co. Ltd.reg. reg. extension of validity of EC.

The Committee noted that EC for the above TPP was accorded by MoEF&CC on 09.09.2008 with a validity period of five years to start the production operations by the TPP. The PP has applied to MoEF&CC for extension of validity of EC only on 02.11.2015 i.e. after more than two years after the expiry of validity. The Committee also noted that the PP has revised the TPP capacity to 250 MW without the prior approval of MoEF&CC.

2. As the validity of the EC expired more than 2 years back, the proposal could not be considered.

2.3 Expansion by addition of 1350 MW (Phase-II) Natural Gas Combined Cycle Power Plant at Village Komaragiri, Mandal U. Kothipali, District East Godavari, Andhra Pradesh by M/s Spectrum Power Generation Ltd.- reg. extension of validity of EC.

The Committee was informed that the PP has applied to the Ministry for extension of validity of EC on 19.03.2015 i.e. within the validity period. The Committee noted that MoEF&CC vide its Notification dated 29.04.2015 has amended the initial validity period of ECs inter-alia for TPPs from 5 to 7 years. However, due to a pending decision by the Ministry on the applicability of the Notification, the proposal was not placed before the EAC. Since the said decision is still awaited, as per the extant procedure being followed, the proposal has been referred to the EAC for its recommendations.

- 2. The PP made a presentation and inter-alia provided the following information:
 - (i) EC for the above TPP and CRZ clearance for intake and outfall of sea water was accorded by MoEF&CC on 01.06.2010 and 22.06.2011 respectively. The entire land required is in the possession of the PP. Tender process for sourcing the main plant equipment was completed and the PP is about to issue the LoI to the successful bidder. Financial closure for the first phase of 350 MW out of 1350 MW was completed. APDISCOMs intends to avail 50 % of the expansion capacity without going through competitive bidding process at tariff determine by AP-ERC and the PP is about to enter into PPA.
 - (ii) The implementation of proposed expansion was deferred on temporary basis due to non-availability of domestic gas till 2015-16 as per MoP and CEA. GAIL (India Ltd.) has agreed in-principle to enter into an MoU/Term Sheet for the supply of Natural Gas for

the proposed expansion. Alternatively, two LNG floating terminals (FSRUs) one at Kakinada Deep Water Port by APGDCL, GAIL, GDF SUEZ & SHELL and another at Gangavaram Deep Water Port by LNG Petronet and other State owned oil companies with a peak capacity of 5 MTPA each are coming up by 2016-17. Hence, extension of validity of EC for a further period of 5 years is requested.

3. The Committee noted that although the PP is not at fault for non-availability of domestic gas subsequent to the EC, the PP even as on date, does not have firm gas linkage / MoU which is a pre-requisite for the viability of the proposed TPP and accordingly, for the extension of validity of EC. The PP submitted that they would secure the gas linkage within 3/4 weeks time and would produce relevant document. Hence, the proposal was **deferred** in the absence of firm gas linkage, and PP was advised to approach the Ministry after availability of linkage.

2.4 Proposed expansion by addition of 1,000 MW (2x500 MW) Lignite based TPP at Neyveli, Tehsil Kurinjipadi, District Cuddalore, Tamil Nadu by M/s Neyveli Lignite Corporation Ltd. – reg. extension of validity of EC.

The PP made a presentation and inter-alia provided the following information:

- (i) EC for the above TPP was accorded by MoEF&CC on 21.10.2010. Govt. of India, PIB sanction was accorded for the project on 09.06.2011. Notice inviting tender was floated for steam generator, steam turbine generator and balance of plant packages from 28.06.2011. But as the boiler design is unique for lignite firing, the right agency for the steam generator package could not be finalized as the capability of the agency quoted could not be verified and the process had gone for retender. Finally, the contract for the steam generator (boiler) was awarded in October, 2013 and the steam turbine generator package was awarded in December, 2013 to M/s BHEL. The balance of plant package contract was awarded to M/s ESSAR (EPIL) on 30.04.2014.
- (ii) The Boiler, ESP, FD, ID and TG house foundations were completed. TG Raft, TG columns, Spring placements completed. TG Deck casting to be done. Chimney, Cooling Towers, Raw water pump house, Pre-treatment and DM water plant, Lignite handling and Switch yard foundations are in progress. Ash Handling and Circulating Water System foundations are yet to be started. ESP erection is in progress. TG hall columns 'A' row 19 columns out of 24, 'B' row 8 of 24 and 'C' row 7 of 24 had been erected. The Boiler column erection is yet to be started as M/s Alstom, the Technical &Process Collaborator for M/s. BHEL, had insisted for bolted structures and E450 grade structural steel. Now the columns are under fabrication in vendor units and are expected by January, 2016. The unique material specifications and the design for the Main Steel Structures of the Steam Generator (Boiler) which have limited availability in India. All the bottle necks have been overcome and the plant is likely to be commissioned in the middle of 2018. However, it is requested to extend the validity of EC for five years.

2. The Committee noted that MoEF&CC vide Notification dated 29.04.2015 has amended the initial validity period of EC inter-alia for TPPs from five to seven years. However, while a formal decision by the Ministry on the applicability of the Notification is pending, as per the extant procedure being followed, the proposal has been referred to the EAC for its recommendations. Hence, the Committee recommended the maximum permissible Extension of Validity of EC i.e. for two years/till 20.10.2017 to start the production/operations by the TPP subject to the following additional conditions.

- *(i)* The monitoring data of AAQ, water quality etc. shall be compared with the oldest baseline data available to assess the impact of the TPP and also the cumulative impacts on a continuous basis.
- (ii) Considering the location of the TPP in Cuddalore District and the directions of Hon'ble NGT pertaining to the cumulative impacts/carrying capacity of the area, the PP shall comply with all the conditions stipulated/Action Plan, if any, by SPCB for the area.

2.5 2x660 MW Thermal Power Project at Karchhna, District Allahabad, Uttar Pradesh by M/s Sangam Power Generation Company Ltd. - reg. reconsideration for extension of validity of EC.

The proposal was earlier discussed in the 26th Meeting of the EAC (Thermal) held during 27th -28th November, 2014, the minutes of which are as under:

Quote "The proposal is for extension of validity of EC accorded by the Ministry for the above project on 30.10.2009. The PP made a presentation and inter-alia provided the following information. The cost of the project is Rs. 6,500 Crores and the expenditure incurred till 31.08.2014 is Rs. 887.47Cores

2. Regarding the project implementation status, the project was awarded to PP by Uttar Pradesh Power Corporation Limited (UPPCL) based on competitive bidding process vide Letter of Intent (LOI) dated 20.02.2009. 'Power Purchase Agreement' executed between PP & the Procurers (5 Discoms of UPPCL, namely MVVNL, PaVVNL, PVVNL, DVVNL and KESCO), to provide total required land for the proposed thermal power project. The requisite land admeasuring 555.63 Ha. was allotted by UPPCL. Land deed of conveyance was executed for 273.48 Ha of land on 23.02.2010, and for 239.473 Ha of land on 05.08.2010. To meet the capital investment for the Project, necessary equity and debt have been tied up. The financial closure for the project was achieved by 12.08.2010. Orders for BTG (Boiler & Turbine Generators) equipment were placed with L&T on 23.07.2010. An advance of Rs.313 crores was also released to the contractor (L&T) as per terms & conditions stipulated in the Letter of Award.

3. Regarding the major reasons for delay in implementation of project, efforts were made to commence the work at the project site on various occasions starting 11.12.2010, 1.12.2011 and recently on 7.9.2014. However, the work could not be started, as section of land owners/villagers were opposing the commencement of work and resorted to violent agitation to stop the activities at site. The PP has reported all the law and order problems and its effect on starting construction activities to UPPCL/District Administration at various levels from time to time.

4. A section of land owners approached to Hon'ble High Court of Allahabad, opposing the land acquisition for establishment of Thermal Power Plant. Hon'ble High Court of Allahabad vide its Order dated 13.04.2012, quashed the land acquisition done vide land acquisition notification dated 23.11.2007 under Section 4 read with Section 17(1) and 17(4) of the Act as well as the declaration under Section 6 of the Act dated 3.3.2008 subject to refund of compensation, if any, received by the petitioners. A Notification in this regard was published in two local newspapers Hindustan and Dainik Jagran on 25.9.2012 to refund the compensation within 30 days. However, none of the land owners turned up to refund the compensation. The Hon'ble High Court of Allahabad, also, ordered to State Government to proceed afresh for acquisition of land relating to relevant villages of Tehsil Karchhana, District Allahabad in accordance with law.

5. Regarding the actions taken by District Administration & UPPCL to sort out issues regarding land acquisition, Principal Secretary (Energy), GOUP, vide its letter, dated 23.10.2013 to District Magistrate, Allahabad, wherein, it has been mentioned that, to comply with Hon'ble High Court's decision, a Notification in this regard was published in two local newspapers, to refund the compensation within 30 days. However, as none of the land owners turned up to refund the compensation, construction work can be started on that land. District Magistrate and Developers can negotiate with land owners, not accepted compensation and their compensation has been deposited in RD with State Govt., for relocation on mutual consent basis, within the acquired land, so that project activities won't get affected.

6. Out of 1,942 affected land owners/farmers owning 512.592 Ha of land under acquisition, 1,850 land owners owning 490.673 Ha of land had given consent and accepted the compensation as per communication dated 12.11.2013 received from District Magistrate, Allahabad. With persistent persuasion thereafter, the number of these distraught landowners/farmers has been reduced from 92 to only 33. More so, out of these 33 land owners, 17 have given consent for relocation of their land outside the plant boundary. UPPCL has tried land acquisition through negotiations with the land owners vide letter dated 28.11. 2013. As a follow up, UPPCL vide its letter to PP dated 22.7.2014 has issued minutes of meeting dated 11.7.2014 chaired by Principal Secretary (Energy), GOUP wherein, it has been mentioned that, the remaining land owners be persuaded to take compensation with interest or get their land relocated outside plant boundary. Principal Secretary (Energy), in pursuance to the above, issued directions to DM to proceed with the formalities for exchange of land under section 161.

7. The Committee noted that the land issue is not yet completely resolved. The Judgment of Hon'ble High Court needs to be submitted along with its compliance. The latest operational LoA/FSA for coal was also sought. The proposal was accordingly **deferred**. **Unquote**"

2. Upon submission of the above documents/information, the proposal was again placed before the Committee during this meeting, wherein the PP made a presentation and inter-alia provided the following information. The representative of UPPCL was also present.

- (i) A section of land owners approached the Hon'ble High Court of Allahabad, opposing the land acquisition for establishment of Thermal Power Plant. Subsequently, Hon'ble High Court of Allahabad issued Order dated 13th April, 2012 given the Judgement that, "The Notification dated 23rd November, 2007 issued under Section 4 read with Section 17(1) and 17(4) of the Act as well as the declaration under section 6 of the Act dated 3rd March, 2008 are quashed subject to deposit of compensation, if any, received by the petitioners. It shall be open for the State Government to proceed afresh for acquisition of land relating to relevant villages of Tehsil Karchhana, District Allahabad in accordance with law". A Notification in this regard was published by DM, Allahabad in two local newspapers Hindustan and Dainik Jagran on 25th September, 2012 asking the land owners to refund the compensation, as per MoM chaired by DM, Allahabad dated 18.11.2013.
- (ii) Further, one of the Farmers of Village Deori Kala, Post-Bheer Pur, Tehsil Karchhana has prayed, vide writ Petition No. 52367 of 2014 in the Hon'ble High Court of Judicature at Allahabad to "Quash the Notification bearing No. 3084/24-P-3-2007-35)p)/2007 U/s 4 of the Land Acquisition Act and the Notification bearing No. 417/24-

p-3-2008 35(P)/2007 U/s 6 dated 03.03.2008 of the Land Acquisition Act. Provide the compensation of the land in question to the petitioner according to the new Land Acquisition Act of 2013". It may please be noted that the Prayer itself is in contradiction, accordingly the Hon'ble High Court of Judicature at Allahabad has issued below order dated 14.08.2015 against the Writ Petition filed by Case No.–WRIT-C No.52367 of 2014.

- (iii) The Hon'ble High Court of Judicature at Allahabad Order dated 14.08.2015 given the Judgement that, "The petitioner has filed this petition seeking to invoke Section 24 (2) of the Right to Fair Compensation and Transparency in Land Acquisition, Rehabilitation and Resettlement Act, 2013. The contesting respondents in their reply have specifically asserted that the petitioner had indeed received compensation under the agreement and the possession of the entire land forming the subject of this acquisition had been taken over. The petitioner has filed a rejoinder affidavit today wherein, the factual aspects, as averred in paragraphs 3 and 4 of the counter affidavit, have not been denied. Though it is cursorily sought to be suggested in paragraph 4 of the rejoinder that the petitioner is having actual physical possession of the land, however, the specific submissions made by the contesting respondents in the counter affidavit have not met with specific denial with all particulars by the petitioner. In the totality of circumstances, we find no reason to issue any writ, order or direction in this petition. Exercise of writ jurisdiction in this matter is declined. The writ petition stands dismissed".
- (iv) Subsequent to mentioned Hon'ble High Court Order, a meeting was called by Govt. of Uttar Pradesh in the context of Hon'ble High Court Order on 16th September, 2015, during which Principal Secretary, Govt. of Uttar Pradesh had appraised that the writ petition stands dismissed and the writ jurisdiction in this matter is declined henceforth the land has been acquired for Karchhana Thermal Power Project as per the Land Acquisition Act and no further action is required to be taken in this regard.
- (v) The continuity of the coal linkage was taken up during the meeting of "Standing Linkage Committee (Long Term) for Power" held on 17th July, 2015. As per MOM dated 10th August, 2015, issued by Ministry of Coal, the Standing Committee confirmed the continuity of the Coal Linkage to the project.

3. The Committee was categorically informed by the representative of UPPCL that all the legal matters have been settled, as is evident from the minutes of the meeting held on 16.09.2015 under the Chairmanship of Principal Secretary, Energy, Govt. of U.P.

4. The Committee noted that MoEF&CC vide Notification dated 29.04.2015 has amended the initial validity period of EC inter-alia for TPPs from five to seven years. However, while a formal decision by the Ministry on the applicability of the Notification is pending, as per the extant procedure being followed, the proposal has been referred to the EAC for its recommendations. Hence, the Committee recommended the maximum permissible Extension of Validity of EC i.e. for two years/till 29.10.2016 to start the production/operations by the TPP subject to final outcome of all the pending legal matters, if any.

2.6 4x1000 MW Pudimadaka Super Thermal Power Project at Villages Lalamkoduru, Rambilli, Veduruvdda & Pudimadaka, District Visakhapatnam, Andhra Pradesh by M/s NTPC Ltd. - reg. EC

The PP along with their environmental Consultant, Vimta Labs, Hyderabad, made a presentation. The Committee noted that MoU/FSA for imported coal doesn't mention the coal

quality parameters, details of Port etc. Hence, the same shall be revised and submitted. Further, no study was conducted for transportation of the imported coal. Although, the PP now submits that they propose a captive jetty, this was not a part of EIA/EMP. This seems to be a very recent proposal of PP and no action has been initiated by the PP regarding obtaining EC and CRZ clearance for the Jetty. Hence, the PP needs to firm up the transportation plan and accordingly also shall have to submit permission letter from the Port and Railway authorities depending on the proposed coal transportation plan.

2. Some studies recommended in ToRs i.e. hydro-geological studies etc. were not yet completed and some ToRs i.e. permission from State Govt. regarding diversion of Nalahs etc. have not even been taken up. The PP agreed to attend to these and submit compliance report.

3. The Committee deliberated in detail on the representation received from ERC, New Delhi raising a plethora of flaws, inconsistencies, infirmities and non-compliance of ToR conditions in the EIA/EMP and during public hearing. PP was asked to submit a detailed point wise reply/compliance to all the issues raised in the said representation. A copy of the same was provided to the PP.

4. The EAC advised the Environmental Consultants including IIT Roorkee to guide the PP properly as it was observed that the EIA was not complete in its entirety, some investigations have yet to be taken up, while others are under way, awaiting completion whose data are to be used in the EIA Report.

4. In view of above, the proposal was **deferred.** The Committee also advised the PP that the above lacunae should not be repeated and proposal should never be submitted prematurely.

2.6A Expansion by addition of 1x800 MW (Stage-III), North Chennai TPP at Villages Ennore & Puzhudivakkam, Taluk Ponneri, District Thiruvallur, Tamil Nadu by M/s Tamil Nadu Generation & Distribution Corporation Ltd. (TANGEDCO)- reg. reconsideration for EC.

The proposal was earlier discussed in the 38th Meeting of EAC (Thermal Power) held on 25th-26th June, 2015, the minutes of which are as under

Quote "The PP along with their environmental consultant, Ramky Enviro Engineers Ltd., Hyderabad, made a presentation and *inter-alia*, provided the following information:

- (i) ToR for carrying out EIA study and preparation of EMP for the above proposal was accorded by the Ministry on 28.05.2012 and the validity of TOR was extended upto 27.5.2015 vide letter 08.09.2014. Public Hearing was conducted on 05.03.2015. Demarcation of site was done by Institute of Remote Sensing, Anna University, in 1:4000 scale including CRZ Zonation / land use for 7 km radius around the project site. The State Coastal Zone Management Authority (SCZMA) recommended the foreshore facilities viz. coal conveyor and cooling water inlet/outlet pipe lines to MoEF in the meeting held on 19.05.2015. Certified compliance report from the Ministry's Regional Office (R.O) for the conditions stipulated in the ECs of the existing Units was submitted and the compliance is found to be satisfactory.
- (ii) The land requirement for the proposed expansion is 76.9 Ha (190 acres), which is located inside the NCTPS complex. Entire land is under possession of TANGEDCO. There are no R&R issues. No further expansion is envisaged. There are no National Parks, Sanctuaries, Elephant/Tiger Reserves, Migratory Routes/Wildlife Corridors

within 10 km of the project site. The site is 500 m away from High Tide Line (HTL) of Sea and 100 m away from the HFL of canal. The project site is a graded area with necessary drains developed during execution of NCTPS Stage I project (3x210 MW). The capital and recurring cost towards EMP is Rs. 480 Crores and 48 Crores respectively.

- (iii) The imported coal requirement of 2.09 MTPA with maximum sulphur and ash contents of 0.8% and 12% respectively will be sourced through MMTC, New Delhi. Ennore Port is establishing Coal Berth 3 (CB 3) exclusively for the use of TANGEDCO in addition to existing Coal Berth 1 & 2. It is proposed to transport coal from CB 3 to the NCTPS Stage III plant site through closed belt conveyors since the coal conveyor route is well within Port and Power plant area alone. Radio activity and heavy metal contents of coal to be sourced have been tested and the parameters are well within limits.
- (iv) The Ambient Air Quality (AAQ) was monitored during June August, 2012. The maximum base line concentration for PM_{10} , SO_2 and NOx was 94.4 µg/m³, 15.8 µg/m³ and 37.7 µg/m³ respectively. The maximum cumulative incremental concentration of PM_{10} , SO_2 and NOx would be 1.4 µg/m³, 61 µg/m³ and 41 µg/m³ respectively. Final GLC of all these will be within the prescribed AAQ limits.
- (v) The potable water of about 9 MLD required for the plant will be met by treating sea water in R.O. based desalination plant. The sea water (1,65,600 KLD) will be sourced Ennore port basin via existing intake channel of NCTPS Stage II. COC of 1.3 has been proposed to optimize water usage. The domestic wastewater from plant and service wastewater will be collected and treated and reused for greenbelt, dust suppression, etc and zero discharge will be maintained As sea water is proposed for cooling purpose, the same will be discharged into sea through the existing pre cooling channel of NCTPS.
- (vi) Both the inlet & outlet points are proposed to be linked with the NCTPS Stage-II systems. Marine EIA study was carried out by IIT Madras in association with WAPCOS Limited. The highlights of the study are that, no rare, endangered or threatened marine flora and faunal species is reported in and around the project area and the area is devoid of sea weeds and coral reefs. The study indicated the availability of primary nutrients (N & P) in moderate level showing the project area having moderate productivity. The marine water quality in and around the proposed outfall area is that of any normal coastal environment. Outfall temperature of coolant water will be only 3.3 °C higher than ambient and at a distance of 2 km from outfall water temperature reduces to 0.4 °C. The outfall of NCTPS stage III project would not change the quality of natural coastal environment.
- (vii) Fly ash and bottom ash would be collected and stored in the silos and supplied to cement/brick industries for manufacturing cement and bricks. 100% Dry Fly ash Collection will be done by providing Pressurized Dry Fly ash Collection System. The fly ash from the existing Units is being sold by e-auction and the same is proposed for the instant Unit. Ash pond water will be collected, treated then reused for slurry making.
- (viii) Socio economic study of 15 km radius around the project site covering surrounding villages was carried out by M/s Madras School of Social Works. As per the recommendations of the study, the local employable youth will be imparted with training skills since the project area is surrounded by number of Industries. A budget of Rs. 8.0 crores and Rs. 2.0 crores has been earmarked as Capital Cost and recurring

cost per annum for CSR respectively. The CSR activities will be monitored by the Environment Cell at project site under the project head.

(ix) Public Hearing/Public Consultation for the project was conducted by Tamil Nadu Pollution Control Board on 04.07.2014. It was noted that the issues raised in the PH pertained to affect of hot water let out into the sea, discharge of ash slurry, affect of soil and ground water, damage to fishing nets and boats, affect of fly ash in air, employment, hydro-geological study, respiratory problems due to carbon particles etc. The Committee discussed the issues raised in the PH and the reply of the PP.

2. The Committee inter-alia noted that as per the O.M. dated 03.02.2015, the PP needs to apply online for CRZ clearance to the Ministry and accordingly the Committee shall consider the comments/remarks of CRZ sector of the Ministry. After detailed deliberations, the Committee sought the following information/documents:

- *I. Action plan for harnessing solar power.*
- II. Revised layout clearly depicting the various Units and facilities.
- III. FSA/MoU for imported coal.
- *IV. Letter from competent Port authority regarding handling of the coal.*
- V. Comparison of the year round base-line data before and after the Stage-I and II.
- VI. Stack diameter of all the stacks.
- VII. Rechecking and the AAQ predictions.
- VIII. The water quality data was not properly presented. Hence, the same needs to be re-done for the fresh water and sea water.
- *IX.* Details of existing and proposed e-auction for fly ash, the LoIs from prospective takers along with quantities etc.
- *X. Explore various avenues for utilization of bottom ash.*
- XI. OHS data of the employees of existing Units. If survey not done, the same shall be done and submitted.
- XII. Green belt development in the existing Units along with illustrative photographs.
- XIII. Employment potential for local people.

On receipt of the above documentation and information, the case will be placed before EAC for reconsideration" **Unquote.**

2. Upon submission of the above documents/information, the proposal was again placed before the Committee during this meeting, wherein the PP along with their environmental consultant, Ramky Enviro Engineers Ltd., Hyderabad, made a presentation and inter-alia, provided the following information:

- (i) EAC/CRZ Committee of MoEF&CC has considered the captioned project during its meeting held on 29.07.2015 and recommended CRZ clearance for the proposed project.
- (ii) Regarding action plan for harnessing solar power, TANGEDCO proposed to tap solar power by installing PV Solar Plant (with seasonal tilt Mechanism) on roof tops of Administrative & Power house buildings at cost of Rs.850 Lakhs to generate 1000 KW power. In addition to this, Solar water heating systems will be provided on the roof tops of guest house and canteen at estimated cost of Rs. 50 Lakhs. Total budget proposed for tapping Solar power is Rs.900 Lakhs.
- (iii) Regarding revised layout, revised layout of NCTPS prepared by Institute of Remote Sensing/Anna university depicting various units Stage I (3x210 MW), Stage II (2x600 MW) and Stage III (1x800 MW) and facilities viz., Coal conveyor, Cooling water inlet/outlet and Bottom ash disposal line to Ash dyke has been submitted and also presented.
- (iv) Regarding FSA/MoU for Imported Coal MoU has been signed between MMTC limited, a GOI Enterprise and TANGEDCO on 25th May 2015 for supply of 2.51 MTPA of Coal for proposed NCTPS Stage III (1x800 MW) plant. The maximum sulphur and ash contents of the imported coal shall be 0.8% and 8% respectively.
- (v) Regarding letter from Port for handling of Coal, letter has been obtained from Kamarajar Port Limited (erstwhile Ennore Port Limited) on 28.07.2015 for handling of imported coal for NCTPS Stage III (1 x 800 MW) plant. Imported Coal will be transported through closed conveyor from Port to the proposed NCTPS Stage III site since the port is located adjacent to the NCTPS complex.
- (vi) Regarding comparison of the baseline data, before Stage I and Stage II. The ambient air quality is being monitored at three locations (Vivekananda Vidyalaya, Vallur, Kamarajar Port and near Cooling water pump house, NCTPS). Sampling is carried out 2 days a week for SPM, SO₂ and NOx. Due to the execution of Vallur TPP (3x500 MW) and NCTPS Stage II (2x600 MW) in the vicinity and development of Ponneri Highway from Chennai, the pollution levels were high during the period of 2007 to 2011. During 2013 and 2014 the values are declining since the construction activities are over
- (vii) Regarding stack diameter, the same ranges from 6.6 to 7.5 for the different TPPs with a same stack height of 275 m.
- (viii) Regarding rechecking the AAQ Predictions, the same were rechecked considering under execution and proposed power plants. The resultant cumulative PM_{10} , SO_2 and NO_x concentrations in the worst case scenario would be 95.8 μ g/m³, 76.8 μ g/m³ and 78.7 μ g/m³ respectively.
- (ix) Regarding the water quality data, three surface water samples were collected and the results were analyzed and compared with surface water standards.
- (x) Regarding fly ash utilization, at present, TANGEDCO is disposing the fly ash by allotment to the cement companies and the companies have established silos to collect the fly ash from the power plant. The bottom ash is being supplied to the brick manufacturing / SSI units for making fly ash bricks. Open tender system is being adopted to allot the fly ash to the companies. An MOU executed with M/s Dalmia Cements (Bharat) Ltd, Dalmiapuram, Tamilnadu for off take of fly ash from the proposed NCTPS Stage III (1x800MW).

- (xi) Regarding bottom ash utilization, the bottom ash of the proposed plant will be collected through dry bottom handling system and used for brick manufacturing and road laying purposes. Excess, if any, will be disposed through existing ash dyke of NCTPS.
- (xii) Regarding OHS data of the employees of existing Units, the consolidated health checkup status of NCTPS I & II plant employees for year 2014-2015 carried out through a clinical Laboratory/Chennai is submitted. Very few employees have shown abnormal results and the needful like change of workspot/division is being done to these employees.
- (xiii) Regarding greenbelt, the total land under greenbelt is around 27% and this will be increased to 33% by additional plantation. The photographs of the existing greenbelt has been submitted and also presented.
- (xiv) Regarding employment potential, a total (permanent and temporary) of about 175 and 550 persons shall be employed during the construction and operation phase respectively. Preference in employment will be given to local people through Contract works. TNEB (TANGEDCO) has provided direct employment to around 1000 land owners who spared their land for development of NCTPS during 1995. Thiruvallur and Kancheepuram Districts located adjacent to Chennai District became the industrial hub of Tamilnadu because of these infrastructure development in Thiruvallur District.

3. The Committee noted that the EAC (CRZ) has recommended the grant of CRZ clearance for the foreshore facilities of the above proposed TPP subject to the following conditions.

- (i) Coal conveyance should take place in closed conveyor and that there could be no open stacking of the coal in the CRZ area.
- (ii) The Intake water pipeline should be laid as per provisions of CRZ Notification, 2011.
- (iii) Disposal of hot water shall meet TNSPCB norms.
- (iv) Water temperature should be monitored at outlets of each of the unit (3 phases) and also at pre-cooling channel joining Ennore creek.

4. Based on the information and clarifications provided by the Project Proponent and detailed discussions held on all the issues, the Committee recommended the project for environmental and CRZ clearance subject to stipulation of the said conditions of EAC (CRZ) and the following additional specific conditions:

- *I. Explore the feasibility of multiple distributing point for the discharge of cooling water into pre-cooling channel and also the widening of the pre-cooling channel.*
- *II. PP* shall endeavor to enter into MoUs with NHAI, Associations of Cement Industries and Municipal Authorities for ensuring full ash utilization.
- III. As committed, FGD shall be installed to ensure emission below threshold limits .

2.7 Coal-based Supercritical Thermal Power Project of 1,320 MW (2x660 MW) at Villages Dimirimunda, Samasingha & Mahulamund, Tehsil Rairakhol, District Sambalpur, Orissa by M/s. Visaka Thermal Power Ltd.- reg. ToR

The PP along with their environmental Consultant, Visiontek Consultancy Services Pvt. Ltd., Bhubaneswar made a presentation and *inter-alia* provided the following information.

(i) TOR for preparation of EIA/EMP to the above proposal was accorded by MoEF&CC on 13/05/2011. Considering the maximum period of validity of ToR, the PP has applied to MoEF&CC for fresh ToR. Prior to the said ToR dated 13.05.2011, ToR was accorded twice for the proposed TPP at two different locations in Bhadrak District of Orissa. However, the ToR expired due to land acquisition issues and techno-economic re-considerations.

2. At the outset, the Committee noted that ToR for the proposed TPP was accorded thrice for three different locations since 2009 and the PP could not submit the final EIA/EMP to MoEF&CC till date. The Committee also deliberated upon the issues raised in the representation received from ERC, New Delhi on the proposed TPP and opined that the said issues need to be first addressed especially considering the lack of progress since 2009.

3. In view of above, the Committee sought detailed reply and compliance to all the issues from the PP. The same shall be duly authenticated by the State Government. Further, the concerned senior officers from the State Govt. shall also be present before the Committee when the proposal would be considered next. The proposal was accordingly **deferred**.

2.8 Expansion by addition of 2x660 MW (Phase-II) supercritical TPP at Villages Kalisindh and Nimoda, Tehsil Jhalarapatan, District Jhalawar, Rajasthan by M/s Rajasthan Vidyut Utpadan Nigam Ltd.- reg. extension of validity of ToR

The PP along with their environmental Consultant, PCRI, BHEL, Haridwar made a presentation and *inter-alia* provided the following information:

(i) TOR for preparation of EIA/EMP to the above proposal was accorded by MoEF&CC on 10/12/2013. Base line data collection for EIA studies has been completed at site during December, 2013 to March, 2014. Based on site studies & ToR prescribed, EIA report was submitted to Rajasthan State Pollution Control Board (RSPCB) for Public Consultation. Public Hearing has been organized at site on 08.07.2015 by RSPCB. Minutes of Public Hearing along with video CD submitted by RSPCB to MoEF&CC vide letter dated 03.09.2015. Final EIA report incorporating all the aspects could not be submitted to MoEF&CC for consideration of EC due to non-availability of coal for the project. Coal allocation is awaited for the proposed project.

2. The Committee noted that as per the Ministry's O.M. dated 22.08.2014 regarding extension of validity of ToR, the PP needs to apply to the Ministry at least three months before the expiry of validity period, together with an updated Form- I, based on proper justification. However, the PP has submitted the proposal for extension of validity of ToR to MoEF&CC only on 15.10.2015, which is less than three months before the expiry of validity period.

3. The Committee was of the view that subject to condonation of delay by the Ministry in submission of the Application, the extension of validity of ToR may be agreed to.

2.9 1x660 MW Super Critical Power Plant at Salboni, District West Medinipur, West Bengal by M/s JSW Energy (Bengal) Ltd.- reg. extension of validity of ToR

The PP made a presentation and *inter-alia* provided the following information:

(i) TOR for preparation of EIA/EMP to the above proposal was accorded by MoEF&CC on 07/01/2014. Subsequently, on-site data was collected for three month period i.e. from December, 2013 to March, 2014. Public Hearing was conducted at Salboni by WBPCB on 26/08/2014. The Final EIA/EMP Report could not be submitted to MoEF&CC due to the reason that the linked coal block (Ichhapur situated in West Bengal) was de-allocated vide Hon'ble Supreme Court ruling dated 24.09.2014. Accordingly, probable overseas and domestic linkages are being sought. As a result, the proposed TPP doesn't have a

firm linkage at the moment. In view of the above, application has been made for extension of the validity of the TOR which is presently valid up to 07/01/2016.

2. The Committee noted that as per the Ministry's O.M. dated 22.08.2014 regarding extension of validity of ToR, the PP needs to apply to the Ministry atleast three months before the expiry of validity period, together with an updated Form- I, based on proper justification. Although, the PP has apparently requested the Ministry for extension of validity of ToR vide letter dated 23.09.2015, the same was without requisite document i.e. updated Form- I and also not applied online through Ministry's Portal, which is mandatory w.e.f. 01.07.2014. Thereafter, the PP has submitted the proposal for extension of validity of ToR online through Ministry's Portal only on 16.10.2015, which is less than three months before the expiry of validity period.

4. The Committee was of the view that subject to condonation of delay by the Ministry in submission of the Application, the extension of validity of ToR may be agreed to.

Item No. 3: ANY OTHER ITEM WITH THE PERMISSION OF THE CHAIR.

There being no agenda item left, the meeting ended with a vote of thanks to the Chair. The next meeting of the EAC (Thermal Power) is scheduled for **18th December**, **2015**.

(Shri Anil Kumar) Chairman (Prof. C.R. Babu) Member (Shri A. K. Bansal) Member

(Shri N.K. Verma) Member (Shri G. S. Dang) Member (Dr. S.D. Attri) Member

(Shri S.S. Bala) Member (Shri B.B. Barman) Member Secretary

List of Participants

2.1 M/s. NTPC Ltd.

- 1. Sh. S. Kishore Kumar, Vimta Labs
- 2. Sh. R.K. Baderia, HoD (Env. Engg.)
- 3. Sh. A.K. Gupta, ED (Engg.)
- 4. Dr. P.R. Rao, AGM (Env.)
- 5. Sh. V. Ravi, Babu, AGM
- 6. Sh. Neeraj Kapoor, AGM (R&R)
- 7. Sh. Pankaj Dhyani, AGM(R&R)
- 8. Sh. S. Padmapriya, AGM (PE-Mech.)
- 9. Sh. Rajeev Baijal, AGM (PE-Civil)
- 10. Sh. K. Athinamilagi, DGM, NNTPP/NLC Ltd.

2.2 M/s. Maharashtra State Power Generation Co. Ltd.

- 1. Sh. V.P. Thagaonkar
- 2. Sh. A.R. Nandanwar
- 3. Sh. V.S. Khatare, CE
- 4. Sh. S.B. Thakur Mohger

2.3 M/s. Spectrum Power Generation Ltd.

- 1. Sh. Srinivas Rao, CFA
- 2. Sh. Venkat Rao, AGMC
- 3. Sh. A.K. Sinha, AGM (F&A)
- 4. Sh. Paratap Reddy, DGM (Env.)

2.4 M/s. Neyveli Lignite Corporation Ltd.

- 1. Sh. Shakil Ahmed, Addl. Chief Manager
- 2. Sh. A. Chellasomg
- 3. Sh. K. Athinamilahi

2.5 M/s. Sangam Power Generation Company Ltd.

- 1. Sh. Kamal Dhawan
- 2. Sh. P.K. Goyal
- 3. Ms. Sharddha Dubey
- 4. Sh. Sumeer Saraf, Project Engg.
- 5. Sh. R.P. Singh, Executive Engg, UPPTCL

2.6 M/s. NTPC Ltd. (Pudimadaka Super Thermal Power)

- 1. Sh. Shashi Ranjan, ED
- 2. Sh. P.R. Rao, AGM
- 3. Sh. Sunil Jain, DGM

- 4. Sh. Manas Samantrav, Sr. Enggr.
- 5. Sh. Rajeev Baijal, AGM
- 6. Sh. R.K. Baderia, HoD
- 7. Sh. A. Gopalakrishnan
- 8. Sh. G. Brahmaji Rao, AGM
- 9. Sh. Y. Apparao, Sr. Enggr.
- 10. Sh. Subhash Chandra, Sr. Enggr.

2.6(A) M/s. Tamil Nadu Generation & Distribution Corporation Ltd. (TANGEDCO)

- 1. Sh. Er. K. Sivaprakasam, Director
- 2. Sh. R. Kamaraj, CE/Project
- 3. Sh. A. Munavar Sultana, SE
- 4. Sh. N. Srinivasan,
- 5. Sh. V. Vajay Kumar, Consultant
- 6. Sh. Pankaj Malik, Consultant
- 2.7 M/s. Visaka Thermal Power Ltd.
- 1. Sh. Uma Shankar Rathi, Director
- 2. Sh. Kali Charan, Visiontek (Consultant)
- 3. Sh. Subrat Mallik, Visiontek(Consultant)
- 4. Sh. P. Kumar Ranjan
- 2.8. M/s. Rajasthan Vidyut Utpadan Nigam Ltd.
- 1. Sh. ER. C.L. Koli, SE (PPM)
- 2. Sh. ER.Mohana Kumar.M.B, Ex.E (PP)
- 3. Sh. Arjesh Sharma, Sr. DGM
- 4. Sh. Manish Sachan, Sr. Manager, PCRI, BHEL
- 5. Sh. Rajendra Singh Yadav, Sr. Enggr., PCRI, BHEL
- 2.9 M/s. JSW Energy (Bengal) Ltd.
- 1. Sh. A. Bhattarcharjee, AVP
- 2. Sh. Jaishankar Balan, Sr. Mgr.
- 3. Sh. Sutaru Guestt, Consultant