

# ANDHRA PRADESH ELECTRICITY REGULATORY COMMISSION 4<sup>th</sup> Floor, Singareni Bhavan, Red Hills, Hyderabad 500 004

O.P.No.26 of 2015

Dated: 04.06.2016

## Present

# Sri Justice G. Bhavani Prasad, Chairman

#### Dr. P. Raghu, Member

## Sri P. Rama Mohan, Member

#### Between:

- 1) Southern Power Distribution Company of Andhra Pradesh Limited, besides Srinivasa Kalyanamandapam, Tiruchanur Road, Tirupathi 517501.
- 2) Eastern Power Distribution Company of Andhra Pradesh Limited, P&T Colony, Seethammadhara, Vishakhapatnam 530020.

....Petitioners

## AND

- M/s National Thermal Power Corporation Limited (NTPC), NTPC Bhawan, Core 7, SCOPE Complex 7, Institutional Area, Lodhi Road, New Delhi -110003.
- Andhra Pradesh Solar Power Corporation Limited represented by its MD having registered office at H.No.6-3-856/A/3, Sadat Manzil Compound, Opp. to Green Park Hotel, Ameerpet, Hyderabad.

...Respondents

This petition has come up for hearing finally on 07-05-2016 in the presence of Sri P. Shiva Rao, learned Standing Counsel for the petitioners, Sri M.G. Ramachandran, learned Counsel for the 1<sup>st</sup> respondent, Sri G. Adiseshu, Managing Director for the 2<sup>nd</sup> respondent and Sri M. Venugopala Rao, learned objector. After carefully considering the material available on record and after hearing the arguments of both parties, the Commission passed the following:

# ORDER

A petition under section 86 (1) (b) of the Electricity Act, 2003 praying (a) for approval of Long Term Power Purchase Agreement dated 24.04.2015 signed by the petitioners with the 1<sup>st</sup> respondent (b) to regulate the price in respect of purchase of solar power by the petitioners from the 1<sup>st</sup> respondent from the proposed 250 MW (Stage-1) Solar Park at N.P. Kunta, Anantapur District and (c) to pass any other order or orders which the Commission feels fit and proper.

2. The averments of the petitioners are briefly as follows:

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- i. The GoAP has signed Memorandum of Understanding (MoU) dated 16.09.2014 with M/s NTPC for setting up of 1000 MW solar power project at Kadiri, Ananthapur dist. The relevant paras of the said MoU are as hereunder:
  - Para 3.1 (a), The GoAP will identify and allot requisite land on payment of nominal lease rent, to be mutually agreed in writing by the Parties, for 1000 MW solar power project(s) at sites with high solar radiation to NTPC initially for a period of 25 years with a provision for further extension on mutually agreed terms of both the parties.
  - b. Para 4.1, Applicable tariff for the solar project(s) shall be determined on cost plus basis based on discovered project cost from competitive bidding by NTPC and other parameters based on applicable appropriate commission regulations / norms. A nominee of GoAP shall be associated while determining the discovered project cost.
  - c. Para 3.1 (b), Statutory clearances and approvals for the project(s), availability of land and other required infrastructure such as approach road, water supply, power evacuation etc. shall be facilitated by GoAP at no cost to NTPC.
  - d. Para 3.1 (c), GoAP shall facilitate through suitable agency, the establishment of any Sub-Station and / or transmission line from the solar project up to grid substation that may be required for power evacuation, at no cost to NTPC.
  - e. Para 3.1 (d), The infrastructure support such as development of approach roads / strengthening of existing roads, drainage, ground levelling, arranging water supply etc. would be facilitated by GoAP through Solar Energy Corporation of India (SECI) / any other agency at no cost to NTPC.
  - f. Para 3.2 (a), NTPC shall carry out competitive bidding for works & procurement of equipment as per CPSU / CVC guidelines for determining the discovered project cost. A nominee of GoAP shall be associated while establishing the discovered project cost.

- g. Para 3.1 (c), NTPC shall implement the 1000 MW Solar Power Project(s) on Build-Own-Operate (BOO) basis, in a phased manner.
- h. Para 4.2, the power generated from the proposed 1000 MW solar park shall be allocated to AP DISCOMs.
- ii. In pursuance of said MOU, M/s NREDCAP (nodal agency for alienation of lands) has handed over the land of 1250 acres to NTPC for the stage-1 of 250 MW solar park against the requirement of 5000 acres for 1000 MW solar park. The said land is sufficient for Stage-1.
- iii. The GoAP vide letter dated 03.03.2015 has constituted a committee with Managing Director / Andhra Pradesh Solar Power Corporation Limited and Director (Finance) / AP GENCO to take part in evaluation of bids for 1000 MW Solar plant to be established by NTPC at NP Kunta site, Ananthapur dist.
- iv. M/s NTPC vide letter dated 10.11.2014 has claimed the levelised tariff of Rs.
   6.16 per kWh. It is claimed by M/s NTPC that the said levelised tariff is arrived at duly considering the Viability Gap Funding (VGF) of Rs. 1.0 Cr per MW provided by Gol and availing the accelerated depreciation benefit, etc., and communicated the same to GoAP.
- v. As per the scheme the delivery point is 33 kV line and will be developed by M/s NTPC in the solar plant premises.
- vi. The Andhra Pradesh Solar Power Corporation Ltd. (APSPCL) is establishing 220/33 kV SS, from which PGCIL is constructing the 400 / 220 kV SS and associated transmission lines for evacuation of 1000 MW power.
- vii. M/s NTPC has forwarded Power Purchase Agreement proposed to be entered with AP DISCOMs and requested for consent that entire 1000 MW would be availed by DISCOMs of AP.
- viii. The Secretary/Energy, I&I Dept/GoAP vide letter dated 11.04.20I5 have given consent to NTPC for availing entire 1000 MW by AP DISCOMs. Also, the Secretary informed to NTPC that the stage-I of 250 MW would be availed at the levelised tariff of Rs. 6.16/kWh and also issued directions to APDISCOMs for signing of PPA. In compliance thereof Petitioners have entered PPA with M/s NTPC for purchase of solar power @ Rs 6.16 per kWh

from the proposed 250 MW (Stage-1) solar park at NP Kunta, Anantapur Dist on 24.04.2015.

- ix. Since the petition is not for determination of tariff, though the generator is owned by Central Government and the petition is for approval of PPA together with regulation of price, as per Appellate tribunal judgment, this Commission alone has jurisdiction to try this petition.
- x. Clause 6.1 of PPA envisaged that "The tariff on levelised basis for entire energy supplied from any UNIT of Stage-1 (250 MWp) shall be payable by APEPDCL @ Rs. 6.16 per kWh. This has been arrived at by considering the Viability Gap Funding (VGF) of Rs. 1.0 Crore / MW provided by the Gol vide MNRE letter No 30/11/2014-15/NSM dated 20/03/2015 and availing the accelerated depreciation benefit etc. For the annual CUF above 18.13%, the tariff shall be 50% of Rs.6.16/kWh. For the annual CUF between 18.13% and 17.9%, APEPDCL shall compensate NTPC for the energy equivalent to annual CUF of 18.13% at Rs 6.16/kWh after deducting the compensation received from EPC contractor as per EPC contract. However CUF below 17.9%, APEPDCL shall compensate for energy equivalent to CUF between 18.13% to 17.9% at tariff of Rs.6.16 per kWh after deducting the compensation received from EPC contractor, as per EPC contract. The tariff for all generating UNITS of the Stage-I shall be uniform irrespective of the date of commissioning and shall be put up before the Appropriate Commission". In this case the Appropriate Commission is APERC.

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- xi. Though the PPAs have been signed based on the tariff communicated by GoAP, duly considering the factors indicated above and facilities provided by GoAP through MoU, the Commission may regulate the tariff at which the DISCOMs shall purchase the power from the NTPC project.
- xii. The Commission is vested with powers to regulate the power procurement process of DISCOMs through agreements, including the price at which power is to be purchased.
- 3. The petition was taken on the file of the Commission and notices were issued to the parties.
- 4. Sri M. Venugopala Rao, Senior Journalist and Convener, Centre for Power

Studies, Hyderabad requested that in view of the importance of the matter and its implications on the power sector, the matter be considered through the process of public hearing, pursuant to which, the Commission decided that the nature of hearing to be conducted will be decided after hearing both the parties and in the meanwhile 1<sup>st</sup> and 2<sup>nd</sup> Respondents and Sri M. Venugopala Rao were directed to file their submissions in writing.

5. The petitioners have filed an application seeking amendment to the O.P. No. 26 of 2015, as the correct content of the PPA was not recorded / stated in the petition due to inadvertence. As per the application the correct elucidation of actually agreed terms in the PPA are is as hereunder:

"The tariff on levelised basis for entire energy supplied from any UNIT of Stage-I (250 MWp) shall be payable by Petitioners at Rs. 6.16 per kWh. This has been arrived at by considering the Viability Gap Funding (VGF) of Rs.1.0 Crore per MW provided by the Gol vide MNRE letter No. 30/11/2014-15/NSM dated 20/03/2015 and availing the accelerated depreciation benefit etc. For the annual CUF above 18.13%, the tariff shall be 50% of Rs. 6.16/kWh. For the annual CUF between 18.13% and 17.9%, Petitioners shall compensate NTPC for the energy equivalent to annual CUF of 18.13% at Rs. 6.16/kWh after deducting the compensation received from EPC contractor as per EPC contract. The tariff for all generating UNITS of the Stage-I shall be uniform irrespective of the date of commissioning and shall be put up before the Appropriate Commissions".

- 6. The respondent No.1 viz., M/s NTPC Ltd. essentially objected to the redetermination of the price in respect of the purchase of solar power sought for by the petitioner. The other averments made leading to the above stand are as hereunder:
  - The tariff agreed to in clause 6.1 of the PPA between the parties is not subject to determination by the State Commission. The tariff in the case of NTPC Generating Stations is to be determined by the Central Electricity Regulatory Commission in accordance with the provisions of Sections 79

     (1) (a) read with Sections 61, 62, 64 etc. of the Electricity Act, 2003.
  - ii. In view of Rule 8 of the Electricity Rules, 2005, the tariff for sale of

electricity by the NTPC Solar Power Project to the Petitioners is regulated as per the Orders of the Central Electricity Regulatory Commission and in so far the Commission is concerned; the Power Purchase Agreement is to be approved with such tariff. The tariff determined by the Central Commission cannot be subject to further regulation of the power purchase price by the Commission.

- iii. Accordingly, M/s NTPC submits that the Commission may be pleased to approve the Power Purchase Agreement entered into between NTPC and the Petitioners excluding the issue in regard to the approval of the tariff / power purchase price. The power purchase price is to be regulated as per the Orders of the Central Electricity Regulatory Commission and not as per the State Commission order. The price mutually agreed is consistent with and below the price determined by the Central Commission in the order dated 31.03.2015.
- 7. Sri M. Venugopala Rao, Senior Journalist and Convener, Centre for Power Studies, Hyderabad as a sequel to his request to hold a public hearing in the matter made certain submissions essentially requesting the Commission to hold public hearing on the subject PPA. The submissions include: (a) AP Discoms procuring power from NTPC is without following the process of competitive bidding as provided in the National Tariff Policy and also in the G.O. Ms. No. 46 dated 27.11.2012 against the backdrop of Discoms in the State of Maharashtra getting a tariff of Rs. 5.05 per kWh in respect of M/s Sky Power Investment Ltd., and Discoms in the neighboring State of Telangana getting a lowest price of Rs. 5.17 per unit, for Solar Power for the same company, besides TTD reportedly getting a tariff of Rs. 4.64 per unit, through competitive bidding route; (b) Many sops being extended to NTPC (which are not available to the projects selected through competitive bidding earlier) such as land being given on nominal lease rent, GoAP facilitating statutory clearances and approvals, other required infrastructure such as approach roads, water supply, power evacuation, drainage, ground leveling at no cost to NTPC and with the additional benefits of advance depreciation benefit and Viability Gap Funding make the tariff to be paid to NTPC work out to about Rs.

8.67 per unit; (c) Even demand growth and availability of power and the Discoms obligation under RPPO to purchase solar power of 0.25% of their total requirement, do not warrant entering into a long term PPA with NTPC at such an exorbitant tariff.

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- 8. The respondent No.1 viz., M/s NTPC Ltd. made certain additional submissions as hereunder:
  - 1) NTPC, being a Company owned and controlled by the Central Government falls within the Regulatory jurisdiction and control of the Central Electricity Regulatory Commission ('the Central Commission') constituted under Section 76 of the Electricity Act, 2003 and discharging the functions under Section 79 of the said Act. The tariff terms and conditions for generation and supply of electricity by NTPC are, therefore, determined by the Central Commission.
  - In terms of Rule 8 of Electricity Rules, 2005, the tariff terms and conditions decided by the Central Commission, become final and binding between the parties to the Power Purchase Agreement.
  - 3) In terms of Section 86 (1) (e), 61 (h) of the Electricity Act, 2003 and the National Electricity Policy and National Tariff Policy notified by the Central Government in exercise of power under section 3, the Central Government, the State Government as well as the Central Commission have been evolving avenues for promotion of Non-Conventional Energy including and in particular, the development of Solar Power Projects. In order to promote the same, the Central Government has evolved various measures. One of the measures has been to require companies such as NTPC to get involved in the establishment of Solar Power Projects at various places and generate and supply power to the Distribution Licensees. This has been done for speedier and sustained promotion of Solar Power Projects.
  - 4) The Central Commission has also determined the tariff applicable for generation and sale of electricity from the Solar Power Projects. By Order dated 31.3.2015, the Central Commission has decided on the generic tariff at which NTPC and others can enter into agreement for generation and sale of electricity from the Solar Power Projects.

In pursuance of the above, NTPC Limited which is predominantly engaged in the generation and sale of electricity from Conventional projects decided to enter into Power Purchase Agreements with the Distribution Licensees such as APSPDCL and APEPDCL for establishing the Solar Power Projects and supplying electricity to the distribution licensees. It is reiterated that this is being done as per the policy decision of the Central Government and for carrying out the objective and purpose of promoting Non-Conventional Energy.

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- 6) In the above background, the Power Purchase Agreement was signed between NTPC of the one part and APSPDCL and APEPDCL of the other part on 24.4.2015 for generation and supply of solar power to the extent of the contracted capacity of 250 MW. This Power Purchase Agreement was signed providing for a tariff of Rs. 6.16 per unit as against the tariff of Rs. 6.35 per unit decided by the Central Commission in the Order dated 31.3.2015 thereby, benefiting APSPDCL and APEPDCL substantially. Further, the Power Purchase Agreement was signed at the instance of the Government of Andhra Pradesh which was equally keen for the promotion of Solar Power Projects by NTPC. A comfort letter by the Government of Andhra Pradesh for procurement of solar power from NTPC @ Rs.6.16 per unit was also issued prior to the signing of the Power Purchase Agreement.
- 7) As can be seen from Clause 6 of the Power Purchase Agreement dated 24-04-2015, the tariff was solemnly agreed to between the parties. NTPC has proceeded with the implementation of the project and has committed finances to the extent of Rs.1600 Crores out of which approximately Rs. 150 Crores have already been incurred by NTPC. This includes Rs. 50 Crores towards upfront payment for land and infrastructure development. Another Rs. 62.5 Crores is envisaged to be paid as land lease rent by NTPC over the useful life of the plant.
- 8) The Petitioners APSPDCL and APEPDCL, have agreed to the above tariff and are bound by the same. The said distribution companies were to take the approval of the Commission in terms of Rule 8 of the Electricity Rules, 2005. The petition No. 26 of 2015 pending before the Commission

is for the above purpose.

9) In the background of the above, the Commission may be pleased to approve the Power Purchase Agreement entered into between NTPC and AP Discoms on the terms contained therein, particularly, as the tariff provided in Clause 6 of the Power Purchase Agreement is less than the generic tariff determined by the Central Commission and, therefore there is no issue on the reasonability of the tariff determined. In this regard, NTPC would crave reference to Regulation 84 of the Central Electricity Regulatory Commission (Terms and Conditions for Tariff determination from Renewable Energy Sources) Regulations, 2012 which provides as under:

## Clause 84. Deviation from Norms

"Tariff for sale of electricity generated from a generating station based on renewable energy sources, may also be agreed between a generating company and a licensee, in deviation from the norms specified in these regulations subject to the conditions that the levelised tariff over the useful life of the project on the basis of the norms in deviation does not exceed the levelised tariff calculated on the basis of the norms specified in these Regulations".

10) Further more, NTPC had proceeded with the project on the basis of comfort letter from GoAP, the Power Purchase Agreement and in furtherance of the overall objective of the Government of India and the Government of Andhra Pradesh to promote renewable sources of energy. In so far as APSPDCL and APEPDCL are concerned, they had duly signed the Power Purchase Agreement agreeing to the terms contained therein including the tariff of Rs.6.16 per kWh without any reservation or condition. The said tariff was also duly accepted by various agencies of the Government of Andhra Pradesh. The Electricity Act, 2003 as well as the National Tariff Policy and the National Electricity Policy do not mandate a competitive bidding process for procurement of electricity from Non- Conventional Sources including solar power. The Purchase Agreement in regard to purchase of power from Solar Projects can be finalized on negotiated basis, so long the tariff is approved by the

Appropriate Commission. In the present case, the Power Purchase Agreement entered into between NTPC and APSPDCL and APEPDCL provides for a tariff lesser than the generic tariff determined by the Central Commission. Though, NTPC could have entered into Power Purchase Agreement with generic tariff of Rs. 6.35, as a Central Government public Utility, NTPC has passed on the benefit of the reduced price resulting from the competitive bidding process adopted by NTPC for selection of packages in the establishment of the generating stations to APSPDCL and APEPDCL. NTPC has, therefore, acted in the interest of the State Discoms and had passed on all the benefits of competitive bidding process of selection of packages. APSPDCL and APEPDCL had duly agreed to the same at the relevant time.

11) In the circumstances, it is not appropriate for APSPDCL and APEPDCL to raise issues on the tariff duly agreed to by them and incorporated in the Power Purchase Agreement, namely, Rs.6.16 per kWh for the entire period of 25 years or raise any issue on the requirement to undertake the process of competitive bidding. In the facts of the present case, having agreed to the scheme, it is not appropriate for APSPDCL and APEPDCL to plead in any manner for a process of competitive bidding to be adopted at this stage, based on any recent development in the procurement of power by other States such as in Telangana. Such a process would completely defeat the objective of the Central Government in facilitating the Solar Power development by involving the Central Government Companies such as NTPC and the bonafide manner under which NTPC has acted. This would also amount to a complete negation of the scheme adopted by the Government of Andhra Pradesh, the agencies in the State Government and also the two distribution companies who had signed the Power Purchase Agreement without any reservation or condition at the relevant time. APSPDCL and APEPDCL are bound by such Power Purchase Agreement entered into, particularly, in the context of the promotion of Non- Conventional Energy. Any other course of action if adopted by APSPDCL and APEPDCL will destroy the foundation of the promotion of Non-Conventional Energy being adopted by the Central Government and involvement of the Central Public Sector Entities.

- 12) In the premise, the Commission may proceed to approve the arrangements contained in the Power Purchase Agreement dated 24.4.2015 entered into between NTPC and AP Discoms with the tariff of Rs.6.16 per kWh and on other terms and conditions without considering the recent submission sought to be made by the counsel for APSPDCL and APEPDCL dated 19.9.2015.
- 13) In terms of the provisions of Section 86 (1) (e) of the Electricity Act, 2003 the Commission has the power to approve the Power Purchase Agreement as per its terms, taking into account the background of the case and the Policies of the Government of India and the Government of Andhra Pradesh.
- 14) Had there been any indication of tariff through competitive bidding and if APSPDCL and APEPDCL had proposed the same at the initial stage itself, NTPC would not have executed the Power Purchase Agreement and more importantly would not have proceeded with the implementation of the projects. APSPDCL and APEPDCL have led NTPC to believe that they would proceed with the Power Purchase Agreement as executed. This was also based on what the Government of Andhra Pradesh and other State Government agencies represented to NTPC at the time of the execution of the Power Purchase Agreement.
- 15) NTPC has therefore bonafide and substantially altered its position based on the above. APSPDCL and APEPDCL are estopped from raising such pleas in the proceedings before the Commission which would defeat the entire process adopted and place NTPC in a precarious position in regard to the investments made, particularly, when such investments have been made by NTPC to implement the policies of the Government of India.
- 9. Vide letter dated 26<sup>th</sup> September 2015, Sri M. Venugopala Rao, Senior Journalist and Convener, Centre for Power Studies, Hyderabad with reference to the affidavit dated 14<sup>th</sup> September 2015 filed by M/s NTPC and having traced the mutually contradictory and conflicting stands taken by NTPC and the Discoms on the power of this Commission to determine the tariff in the case of NTPC Solar Power project, once again requested to hold a public hearing. Further, he also stated that if the Commission agrees with the

contention of NTPC that tariffs pertaining to its projects are to be regulated as per the orders of CERC and that the APERC should not re-determine them, essentially, it is requested to reject O.P. No. 26 of 2015 and direct the Discoms to select the developers for purchase of power through competitive bidding only. The other points made in the submissions include (a) The levelised tariff of Rs. 7.04 per kWh of solar PV power projects fixed by the CERC in its order dated 31.03.2015 is repugnant to the spirit of Electricity Act (section 86 (1) (b); 61 (c) and (d)) and related policies and rules (para 1.6, 5.12.1, 5.12.2 of National Electricity Policy dated 12<sup>th</sup> February 2015 and para 5.1, 6.0, 6.1, 6.4 of National Tariff policy dated 6<sup>th</sup> January 2006) and the contention of NTPC that the price mutually agreed is consistent with and "below the price determined by the central Commission in the order dated 31.03.2015" confirms that the central Commission had determined inflated price. As such, the tariff determined by the central Commission in the above said order is neither sacrosanct nor unalterable; (b) The manipulated, one sided and questionable provisions in the PPA are detrimental to genuine interests of consumers of power besides imposing avoidable additional burden on consumers of power as a result of which the actual tariff will be more than Rs. 6.16 / kWh; (c) Cost on various sops being extended to NTPC works out to an additional sum of Rs. 2.51 / kWh. If the same is reduced from the lowest price quoted in the earlier competitive biddings, Discoms would have got much lower price per kWh of Rs. 2.74, provided such sops are being extended to the lowest bidder who guoted a tariff of Rs. 5.25 / kWh.

- On 26<sup>th</sup> September 2015, the petitioners filed a rejoinder to the counter filed by M/s NTPC Ltd. on 14-09-2015, essentially reiterating the same prayers as in their original petition. The other averments made are as hereunder:
  - The Power Purchase Agreement dated 24.04.2015 sets out the terms and conditions on the sale and purchase of solar power. The Power Purchase Agreement provides for the allocation of capacity under clause 2.2 which reads as under:

"2.2 Allocation of Capacity:

2.2.1 The Contracted Capacity to the State of Andhra Pradesh shall be 100% subject to approval of Ministry of Power, GOI

# without prejudice to the interest of AP Discoms".

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- 2) The allocation of capacity from NP Kunta Ultra Mega Solar Power Project, Stage-1 (250 MW) shall be 100% to the State of Andhra Pradesh with formal approval of MoP, Gol. Thus, AP DISCOMs have signed the PPA with M/s NTPC for 100% capacity i.e. 250 MW. The PPA provides for the tariff under clause 6.
- 3) The proposed solar park is located in Andhra Pradesh with 100% power is being tied up with AP DISCOMs under this PPA. Further, GoAP has provided land and other infrastructure facilities to encourage solar parks in the State. Further, the GoI has also extended the support to M/s NTPC by way of Viability Gap Funding. In view of the aforesaid Government support, the petitioners' stand on the issue of jurisdiction to regulate the tariff is that it is with APERC not CERC. Section 79 of Electricity Act is not applicable to this project for the reason that entire power generated shall be sold to A.P. State and A.P. state has provided the large extent of land required for the project. Consequently Rule 8 of Electricity rules also is not applicable to this case.
- 4) The main objective for extending the aforesaid incentives to M/s NTPC is with a view to add more capacity generation in the state. This object would be achieved by getting tariff regulated by APERC.
- 5) The Commission is vested with powers to regulate the tariff under section86 (1) (b) read with section 64 of Electricity Act.
- 6) The generic tariff that was determined under the order dated 31.03.2015 by the CERC in respect of solar power is not for the project similar to this nature. The said tariff applies where no incentives are provided to the developer unlike this project. Therefore, the claim of NTPC that the tariff agreed is lesser than the tariff decided by CERC, is not correct.
- 11. On 26<sup>th</sup> September 2015 during the hearing and upon filing of rejoinder by the petitioners and response of Sri M. Venugopala Rao to the affidavit dated 14.09.2015 filed by NTPC, the Commission decided to hold a public hearing in deciding the matter and the date of public hearing was fixed as 7<sup>th</sup> November 2015. On the same date the amendment petition filed by the petitioners was

also allowed in I.A. No. 36 of 2015.

- 12. Thereafter, the office of the Commission caused a public notice to be issued in one English News Paper (In English) and in one Telugu News Paper (In Telugu) on 1<sup>st</sup> October 2015 inviting responses / objections of interested persons / stakeholders which are to be received on or before 30<sup>th</sup> October 2015 and it was specifically mentioned that any interested person / organization desirous of being heard in person may appear before the Commission on the date of hearing scheduled for 7<sup>th</sup> November 2015.
- 13. Pursuant to the public notice dated 1<sup>st</sup> October 2015, Sri M. Venugopala Rao, Senior Journalist & Convener, Centre for Power Studies, Hyderabad; Sri A. Punna Rao, Convener, Praja Energy Audit Cell, Vijayawada; Sri Anil Reddy Vennam, President, FTAPCCI; Sri M.A.Gafoor, State Secretariat Member, CPI (M),Vijayawada; Sri Penumalli Madhu, Secretary, CPI (M), Vijayawada; Sri Y. Venkateswara Rao, Secretariat Member, CPI (M), Vijayawada and Sri Ch. Narasinga Rao, AP State Secretariat Member, CPI (M), Vijayawada have submitted the following points on 29.10.2015 and 30.10.2015, for consideration of the Commission on the subject PPA:
  - The Discoms could not provide any justification for entering into PPA, in its present form, with NTPC and with such exorbitant and unjustifiable tariff, except stating that they have done so in compliance of the directions issued by the GoAP in their letter dated 11.4.2015.
  - The terms and conditions in the PPA are one sided, irrational and 2) detrimental to larger consumer interest besides being contrary to the terms and conditions in the 27 PPAs pertaining to a total capacity of 619 MW of Solar Power of Private Projects selected through competitive bidding by the two DISCOMs approved by the Commission. The important deviations are in relation to (a) Obligation to recommend for grant of permission/sanctions for the solar power projects; (b) The definition for interconnection facilities together with the responsibility of bearing cost of interconnection facilities and bearing of transmission/wheeling charges and transmission losses for supply of power; (c) Voltage of delivery; (d) Provisions relating to treating the Station as MUST RUN (In as much as the present solar capacity of 619

MW would be sufficient to meet the RPPO requirement, the MUST RUN condition poses a problem); (e) The implications of clause 5.4 of the PPA in case the project is transferred to third party after its Techno Economic viability, needs to be examined; (f) The provisions in Article 2.2.1 of the PPA making the contracted capacity to the State of Andhra Pradesh contingent upon approval of the Ministry of Power, Gol might be misused to the detriment of AP Discoms and as such without allocation of 100% capacity to AP Discoms consent of the Commission should not be given; (g) The 5 (Five) days advance notice period relating to date of synchronization of the unit / project being very short; (h) To include provisions relating to penalties for delayed implementation of the project; (i) To include provision for Acceptance / Performance Test in the PPA; (j) In Article 6.1, compensation from the Discoms is provided for the annual CUF between 18.13% and 17.9% for the failure of NTPC and its EPC contractor. This is perverse and nothing but penalizing the Discoms and their consumers for their no fault. This needs to be changed; (k) The Tariff payable by the Discoms should be inclusive of all taxes as in the case of other PPAs consented by the Commission and these should not be paid over and above the tariff; (I) 'APERC' should be substituted for 'Appropriate Regulatory Commission' / 'CERC', wherever they occur in the PPA; (m) Article 14.4 making APSPDCL liable to pay tariff (when NTPC terminates the agreement) till firm arrangement for sale of power with alternative customers substituting APSPDCL, penalizes the Discoms without any justification and hence should be deleted from the PPA; (n) Article 4.1.1 should be amended to the effect that all expenses, including charges/fees related to scheduling and dispatch of electricity are borne by NTPC; (o) A new Article should be incorporated in the PPA to share Clean Development Mechanism (CDM) benefit with DISCOM as provided in CERC (Terms and Conditions for the Tariff determination from Renewable Energy Sources) Regulations 2012 and as amended from time to time; (p) It is fair to take the lowest price of Rs. 5.17 per kWh recently quoted by Sky Power Investments Ltd., in the State of Telangana pursuant to competitive bidding and reduce the same by working out the cost of all the sops extended to NTPC in the agreement and arrive at the

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tariff.

- 14. On 30th October 2015, Sri M. Venugopala Rao, Senior Journalist & Convener, Centre for Power Studies, Hyderabad; Sri Anil Reddy Vennam, President, FTAPCCI; Sri M.A. Gafoor, State Secretariat Member, CPI(M), Vijayawada; Sri Penumalli Madhu, Secretary, CPI (M), Vijayawada; Sri Y. Venkateswara Rao, Secretariat Member, CPI (M), Vijayawada and Sri Ch. Narasinga Rao, AP State Secretariat Member, CPI (M), Vijayawada labored hard to suggest the additional tariff that is being extended to NTPC on account of all the sops extended to it as compared to the PPAs signed with private solar developers for 619 MW for which consent had already been given by the Commission, works out to a minimum of Rs. 3.55 per kWh and to a maximum of Rs. 3.905 per kWh. Thereafter they suggested that considering the lowest tariff of Rs. 5.17 per kWh obtained in the State of Telangana, the permissible tariff works out to between Rs.1.265 / kWh to Rs.1.62 / kWh after deducting the benefits accrued due to the additional sops extended to NTPC. They also brought out the worked out cost implications over the agreement period.
- 15. Vide Letter dated 5<sup>th</sup> November 2015, the Chief General Managers of APEPDCL and APSPDCL have furnished separate replies with similar response to the objections raised by Sri M. Venugopala Rao, Senior Journalist & Convener, Centre for Power Studies, Hyderabad; Sri A. Punna Rao, Convener Praja Energy Audit Cell, Vijayawada; Sri Ch. Narasinga Rao, CPI (M) AP State Secretariat Member, Vijayawada and M/s FTAPCCI, which are as hereunder:
  - i. AP DISCOMs have entered power purchase agreement with M/s NTPC as per the Memorandum of Understanding (MoU) between GoAP and M/s NTPC, GoAP letter dated 11.04.2015 and based on the calculation sheet as enclosed to the petition filed by APDISCOMs. Further, in the rejoinder to the counter filed by M/s NTPC, APDISCOMs submitted that the Commission is vested with powers to regulate the tariff under section 86 (1) read with section 62 of Electricity Act.
  - ii. AP DISCOMs entered power purchase agreement for a total capacity of 619 MW as per the Commission approved solar draft PPA. However, the concept of Solar Park is first of its kind in Andhra Pradesh. There is no

approved draft PPA for the solar park concept.

- iii. The main objective to extend the aforesaid incentives mentioned in the MoU is with a view to encourage renewable energy in the State for affordable tariff, thereby DISCOM would achieve the RPPO obligation. The objective would be achieved by getting tariff regulated by the Commission. The concept of Solar Park is first of its kind in Andhra Pradesh.
  - (a) To encourage solar power projects, GoAP in the Solar Policy 2015, Solar Power Projects treated as MUST RUN stations.
  - (b) Out of total 619 MW contracted capacity through competitive bidding, only 6 MW solar power being set up in the geographical jurisdiction of EPDCL. This would not be sufficient for EPDCL to meet its future SPPO.
- iv. Hence, the 250 MW solar project would enable AP DISCOMs and specifically APEPDCL to meet their future SPPO needs.
- v. AP DISCOMs, in the rejoinder to the counter filed by M/s NTPC, stated that the allocation of capacity shall be 100% to the State of Andhra Pradesh as GoAP has provided land and other infrastructure facilities to encourage solar power in the State.
- vi. The capacity contracted through PPA may be firm and binding on NTPC to supply the contracted capacity.
- vii. As per the article 13.0 read with article 1.0 (xii), M/s NTPC shall complete
   200 MW in 12 months and additional 50 MW in additional 6 months time
   period.
- viii. The Commission, in the draft solar approved PPA in the article 3.10.1 provided that solar power developer shall give a written notice to the concerned SLDC and DISCOMs at least 60 days in advance to the date on which it intends to synchronize the project to the grid system. However, this PPA provided that each unit of solar power generating station shall be deemed to be commissioned as and when a block of 5 MW is commissioned progressively on different dates. M/s NTPC will progressively inform APSPDCL in writing at least 5 days in advance (5.0).

- ix. APERC model approved Solar PPA provides for the developer furnishing a Performance Bank Guarantee to ensure commencement of supply as per agreed commissioning timelines. There is no such provision for penalties in delay in commissioning of the project.
- x. There is no provision for acceptance / performance test as provided in the Commission approved draft solar PPA.
- xi. APERC model approved Solar PPA mentions "All future increase in taxes, duties and levies on energy generated will have to be borne by the Solar Power Developer." Similar treatment of taxes may be incorporated in this PPA as well.
- xii. Appropriate Commission / CERC may be replaced by APERC since the entire procurement is being done by AP Discoms.
- xiii. As per the prevailing APERC regulations M/s NTPC is not eligible for obtaining RECs.
- xiv. APERC model approved Solar PPA requires Solar Power Developer to share CDM benefits with DISCOM. Similar sharing of CDM benefits may be incorporated in this PPA as well.
- 16. On 13<sup>th</sup> November 2015, Sri M. Venugopala Rao, Senior Journalist & Convener, Centre for Power Studies, Hyderabad made certain submissions as hereunder in response to the additional submissions dated 24<sup>th</sup> September 2015 filed by NTPC, replies to objections given by the Discoms and oral submissions by MD of AP Solar Power Corporation Ltd. during the public hearing on 7.11.2015, as given hereunder (a) When the Act, by a specific provision under section 86 (1) (b) empowers the State Regulatory Commission to regulate electricity purchase and procurement process of distribution licensees including the price at which electricity shall be procured from the generating companies or licensees or from other sources through agreements for purchase of power for distribution and supply within the State, the decision of the Commission in regulating the price implies automatically that the price determined by it is binding on the distribution licensee directly and on the generator indirectly and such powers cannot be taken away from the State Regulatory Commission by rules (Rule 8) issued by Gol or any authority; (b)

Rule 8 of Electricity Rules, 2005, notified by the Central Government, applies when CERC considers PPA of a generating company of the Central Government or an inter-State project and gives its consent; it does not apply when a PPA is between a generating company of the Central Government and a Discom(s) of a State, when the project concerned is not an inter-State project and when the entire capacity is agreed to be supplied to the Discom(s) of a State only, comes up for hearing before the State Regulatory Commission concerned; (c) When APERC has to regulate price, it has to invariably examine its reasonability; simply because the Govt. of A.P. has given a comfort letter and the Discoms have agreed to the tariff of Rs.6.16 per kWh, the decisions of GoAP and the Discoms on the price cannot take away the powers of APERC to regulate it; giving consent mechanically to such a price agreed to by the GoAP and the Discoms defeats the very purpose of regulation; (d) There is no justification in rushing in for entering into long-term PPAs for purchasing high cost solar power, when tariffs for solar power are going to come down further through competitive bidding in the near future; (e) The Discoms are silent on un-reasonability of the tariff vis-a-vis the tariffs determined through competitive bidding. However, they are leaving it to the Commission to regulate the tariff expecting that the Commission would come to their rescue and of their consumers; (f) If the main objective to extend the incentives mentioned in the MoU is to encourage renewable energy in the State "for affordable tariff," as the Discom contends, then, for regulating tariff, all those incentives should be taken into account for working out reasonable tariff; (g) In the name of meeting requirements of RPPO, the Discoms need not rush, and should not be forced, to enter into long-term agreements to purchase renewable energy from any company, in any manner and at any cost, ignoring consumer interest and possibility for tariff for solar energy coming down further in the near future. (h) Sri G. Adiseshu garu, Managing Director of Andhra Pradesh Solar Power Corporation Limited informed that there is a condition that NTPC should purchase local solar panels and that there would be difference in cost. The condition that only local solar panels should be purchased is intended, clearly, to do undue favor to their local manufacturers at the cost of consumers of power. The fact that CUF in the PPA between NTPC and AP Discoms is 18.13% only confirms that NTPC is going to

purchase solar panels of inferior quality at higher cost, as per the condition that it should purchase local panels only, when solar panels of better quality and lesser cost can be procured through international competitive bidding.

17. On 20th November 2015, Sri M. Venugopala Rao, Senior Journalist & Convener, Centre for Power Studies, Hyderabad submitted additional points for consideration of the Commission further to his written submissions dated 13.11.2015 which are briefly as hereunder: (a) Sun Edison of the US has quoted the lowest tariff of Rs.4.63 per kWh in the competitive bids invited by NTPC for setting up 500 MW solar project at Ghani Solar Park in Kurnool district, as already mentioned in earlier submissions. Sun Edison has to pay Rs.42 lakh per MW to A.P. Solar Power Corporation Ltd. towards development expenses and availing itself of the infrastructure facilities, whereas, as per the agreement between NTPC and APSPCL, the former pays a sum of Rs. 20 lakh per MW towards development expenses and availing itself of infrastructure facilities. Similarly, Sun Edison has to pay Rs. 2.5 lakh per MW to APSPCL towards annual O&M charges, whereas NTPC pays only Rs.1 lakh per MW towards the same expenses. Furthermore, NTPC avails the benefit of VGF, whereas Sun Edison does not. Regarding evacuation of power from the plant, Sun Edison supplies power at interconnection point at 220 kV, whereas NTPC supplies power at interconnection point at 33 kV, imposing avoidable additional burdens of transmission charges and losses on the Discoms and their consumers. Despite all these additional advantages and benefits it gets, NTPC's tariff is Rs. 6.16 against Rs.4.63 of Sun Edison. These differences, among others, once again confirm how inflated and unjustified the tariff to be paid to NTPC is;(b) Necessary amendments need to be brought about to make it clear that whatever expenses/charges NTPC has agreed to pay to APSPCL, as per the agreement between them, should be borne by NTPC only and should not be imposed on the Discoms; (c) The responsibility for getting transmission capacity allocated and ensuring maintenance of transmission system to have highest availability for evacuation of power should rest with NTPC, and an amendment to this effect needs to be brought about; (d) In the PPA, interconnection point is defined as incoming 33 kV feeder of 33/220 kV pooling sub-station of APSPCL. As per the definition and explanation given in the PPA, 250 MW is evacuated at 33 kV, then stepped up to 220 kV,

transmitted again and then stepped up to 400 kV (up to PGCIL injection); then again stepped down from withdrawal point of PGCIL SS to 220 kV and then stepped down to 33 kV and finally transmitted to AP Discoms. There is no need for bringing in PGCIL network for transmission of power from NTPC's project to the Discoms, as the entire transmission takes place within Andhra Pradesh. The Commission has to examine the issue thoroughly, reject the interconnection point and delivery voltage as proposed in the PPA, and direct the parties to the PPA to modify and rectify the same in line with standard practices and applicable regulations. (e) PGCIL, as well as AP Transco, is getting green corridor funding from the GoI for this project. The same should be incorporated in the PPA and its benefit be passed on to the consumers in terms of reduction of the proposed tariff.

- 18. On 20<sup>th</sup> November 2015, the Managing Director, Andhra Pradesh Solar Power Corporation Pvt. Ltd. has submitted replies to the objections raised by Sri M. Venugopala Rao and others. The details of the submissions are as hereunder:
  - i. As per MNRE Scheme for development of Solar Parks (Ref.No.30/26/2014-15/NSM dt.12.12.2014), APSPCL has been designated as implementing agency in the State of A.P. for development of Solar Parks. APSPCL has been formed as a JV Company with 50% equity from SECI (a Govt. of India Enterprise under MNRE) and 41% from APGENCO and 9% from NREDCAP (State Govt. Agencies) as per Mode 2 of MNRE Guidelines.
  - ii. Under this scheme, MNRE will provide grant to implementing agency i.e.
     APSPCL through SECI @ Rs. 20 Lakhs / MW or 30% of the Project cost including Grid-connectivity cost whichever is lower.
  - iii. Under this scheme, APSPCL has to provide the infrastructure facilities like land, water, road, drainage and internal transmission etc. in the Solar Park to reduce the risk and gestation period of Solar Power Projects.
  - iv. CERC has amended its regulations for Grant of Connectivity, Long-term access and Medium-term open access in Inter-state Transmission and related matters on 15<sup>th</sup> May 2015 including APSPCL as applicant for LTA and Grid connectivity in inter-state transmission system.

- v. Further, MNRE vide letter dated 26.06.2015 & 29.06.15 has declared APSPCL as Solar Power Park Developer (SPPD) for Ananathapuram & Kurnool Ultra Mega Solar Parks and authorized APSPCL to undertake internal transmission system on behalf of Solar Power Developers.
- vi. As per the above orders, APSPCL is developing internal evacuation system i.e. 220/33 kV pooling sub-stations and connected 220 kV Transmission lines in the Solar Park.
- vii. As per MNRE guidelines, SPPD can recover the cost incurred for developing the infrastructure facilities from Solar Power Developers. Accordingly, APSPCL is collecting Onetime Solar Park Development expenses from NTPC @ 20 Lakhs / MW towards development of infrastructure like land, water, road, drainage and internal transmission system etc. and Rs. 1.0 Lakh/MW as annual O&M charges to meet the maintenance cost of Solar Parks. NTPC has already paid Rs. 50 Cr. towards one time Solar Park Development expenses for the said 250 MW Solar Power Project on 22.09.2015.
- 19. On 20<sup>th</sup> November 2015, the Chief General Manager/APSPDCL has filed a Rejoinder to the additional submission filed by M/s NTPC on 24.09.2015. The details are as hereunder:

i. Section 86 (1) (b) of the Electricity Act, 2003, empowers the State Regulatory Commission to regulate purchase and procurement of Electricity by distribution licensees and its price, such powers cannot be taken away from SRC by the rules (Rule 8) issued by the Government of India or any other authority. The orders or decisions or regulations or guidelines of the Central Regulatory Commission cannot encroach upon the powers of the State Regulatory Commission, and such orders are not binding on the SERC. Rule 8 of Electricity Rules 2005 notified by Central Government applies when the project concerned is inter-state project whereas the PPA seeking for approval in this case is supplying entire power to the AP Discoms of Andhra Pradesh State only. Therefore the said rule is not applicable to this case.

ii. The proposed solar park is located in Andhra Pradesh and 100% power being tied up with AP DISCOMs under the proposed PPA. Further, GoAP has provided the land and other infrastructure facilities to encourage solar parks in the State. Further, the Gol has also extended the support to M/s NTPC by way of Viability Gap Funding. In view of the aforesaid Government support, the petitioner's stand on the issue of jurisdiction to regulate the tariff is only APERC but not CERC. Section 79 of Electricity Act is not applicable to this project for the reason that entire power generated is tied up with AP State and AP State has provided the large extent of land required for the project.

- iii. The claim of NTPC in its additional submissions, that CERC already decided the generic tariff for solar power developers in the country and same applies to the project in issue is baseless besides being false, and misleading. In fact CERC has decided the generic tariff vide order dated 31.03.2015, in respect of the projects of the category for which no such incentives like providing land, infrastructure development, power evacuation facility, viability gap funding (VGF) etc. are there, whereas project in issue comes under category of solar park. In this category the State Government provides land on lease basis, infrastructure development, power evacuation facility. Aside of the same, Central Government provided viability gap funding (VGF) of Rs. 1 Crore per MW. Thus, it is clear that the said order dated 31.03.2015 of CERC does not apply to the Solar Parks, hence the claim of NTPC that CERC order dated 31.03.2015 governs the issue in this case, is incorrect. In this arrangement of the project in issue under solar park system, the parties arrived at agreement about the tariff and same is submitted as required under section 86 (1) (b) to the Commission for its verification and appropriate orders.
- iv. Even otherwise, without admitting the claim of NTPC, still as per law settled by Hon'ble Supreme Court in a case between Tata Power Vs Reliance decided in 2009 that interpreting 86 (1) (b) of Electricity Act that until the State Regulatory Commission gives its approval, the arrangement that was by parties i.e. Generator with DISCOM, remains as plan, nothing beyond. Therefore even assuming that CERC has decided the tariff, still this Commission is required to examine the said plan as to whether such arrangement is in the interest of DISCOM and end consumers or not.

- v. Therefore the Commission is requested to pass appropriate orders under 86(1) (b) of Electricity Act.
- 20. Pursuant to the request of the Commission during the hearing on 21<sup>st</sup> November 2015 to make more specific and clear the intent and purpose of prayer (b) of the petition, the petitioners filed a memo on 5<sup>th</sup> December 2015 effectively stating that since they have approached the Commission to consider their plan covered by the power purchase agreement dated 24.04.2015 for approval under section 86 (1) (b) of Electricity Act, 2003, they have prayed to regulate the power purchase price and to grant approval of the same. In fact, the prayer (b) forms integral part of prayer (a).
- 21. On 28<sup>th</sup> January 2016, NTPC filed an affidavit stating to be placing on record some of the salient aspects of the development of Solar Power Projects of NTPC in the State of Andhra Pradesh and the generation and sale of solar power to Andhra Pradesh Distribution Licensees as well as the participation by NTPC in the promotion of non-conventional energy sources. The affidavit is also stated to be dealing with the reply to the objections dated 29.10.2015, 30.10.2015, 13.11.2015 and 20.11.2015 all by Sri M. Venugopala Rao, the Objector. The other points submitted in the affidavit are as hereunder:
  - 1) The development of the Solar Power Projects of 250 MW at NP Kunta Solar Park, Anantapur District in the State of Andhra Pradesh, was pursuant to a policy decision taken by the Government of India in consultation with the Government of Andhra Pradesh and the Respondent No. 2 which is the Nodal Agency established by the Government of Andhra Pradesh to promote Solar Power Projects.
  - 2) NTPC is a Government of India Undertaking and has established a number of conventional projects (coal based, gas based etc.) and has been chosen by the Government of India to undertake Solar Power Projects at different places so as to bring the impetus considered necessary in the development of the solar projects. The scheme is to organize substantial capacity of Solar Power Project under one PPA, as compared to the small projects of 5, 10, 20 MW etc. capacity. This had become necessary in order to establish a basic framework by commitment to large capacity, bring about confidence amongst the

Investors of the country's intent to establish substantial higher solar capacity so that the cost of solar power panel and accessories could be made available at a cheaper rate and thereby, reduce the solar power generation cost in the interest of the consumers.

- 3) In the circumstances mentioned above, it had become necessary and it was duly recognized by the Government of India and the Government of Andhra Pradesh that a capacity of about 250 MW should be established immediately in the State of Andhra Pradesh which would pave avenue for establishing higher capacity of another 750 MW in the immediate course by NTPC and which would also be a path development for others. In this regard, the 250 MW project mentioned above is the first single PPA committed project of higher capacity where under NTPC as a developer has entered into one PPA dated 24.4.2015 with the Petitioners. In terms of the above scheme and considering the public importance of the project, in the month of September 2014 (even prior to the signing of the PPA) the process was initiated for 250 MW to be established on an emergent basis i.e. with the commercial operation envisaged in the month of March/April 2016. This was necessary so that the subsequent projects could be established at more competitive rates. The above initiation was with the due consultation of the Government of Andhra Pradesh and Respondent No. 2.
- 4) In pursuance of the above, NTPC proceeded with the establishment of 250 MW by inviting competitive bid packages. The tariff for the project for urgent commissioning by March / April 2016 based on the competitive bid packages works out to Rs. 6.16 per kWh. The tariff so finalized was less than the tariff discovered in other competitive or non-competitive bidding process involving Solar Power Projects prevalent at that time. Thus, the process initiated by NTPC of getting a package for 250 MW Solar Power Projects paved the way for the investors to quote more competitively in the subsequent projects. It was necessary for NTPC to conclude and finalize the arrangements with the contractors / developers for the 250 MW and also sign the PPAs with the AP Discoms in pursuance of the above process in order to establish an avenue for

further development of the Solar Power Projects in India and in particular in the State of Andhra Pradesh i.e. for the subsequent bids to be invited by NTPC towards the balance 750 MW capacity as well as the bids that may be invited by others including the State Utilities.

- 5) The bids in the subsequent projects, namely, Telangana with a weighted average price of Rs 5.72 per kWh, Madhya Pradesh with a weighted average price of Rs 5.36 per kWh, Punjab at the price of Rs 5.65 per kWh, NTPC price at Kurnool of Rs 4.63 per kWh and Uttarakhand Solar Project price of Rs. 5.75 per kWh were much after the conclusion of the bids for 250 MW at Anantapur and were substantially on account of initiative taken by NTPC for the said 250 MW project.
- 6) NTPC has also proceeded to invite the bids for 750 MW (Anantapur Ph-II) and it is expected that the price per unit of the solar power generation under these 750 MW bids would be substantially less. The bids are expected to be opened in February 2016 and the contract shall be concluded thereafter.
- 7) The AP Distribution Companies had entered into the PPA dated 24.04.2015 for purchase of 250 MW solar power from NTPC as per the bid finalized by NTPC at Rs. 6.16 per unit consequent to the initiatives of the Government of India. But for the commitment made by the Government of Andhra Pradesh and the Andhra Pradesh Discoms, neither the Government of India nor NTPC would have proceeded with establishing 250 MW Solar Power Projects in the State of Andhra Pradesh. The Government of India and NTPC would have alternatively dealt with some other States for the development of similar Solar Power Projects.
- 8) The finalization of the balance 750 MW Solar Power Projects in pursuance of the later bids invited, is expected to be concluded at a much more economical competitive price. The sale of electricity to Andhra Pradesh from the 750 MW (Phase-II) bids is dependent and related to the due implementation of the PPA dated 24.4.2015 for generation and sale of 250 MW (Phase-I) at the price of Rs. 6.16 per unit. If otherwise, NTPC may not be in a position to finalize the

contractual arrangements with the bidders (packages) for establishment of the Solar Power Projects of 750 MW, the entire scheme evolved by the Government of India for the State of Andhra Pradesh to get 1000 MW of solar power would be seriously affected. NTPC cannot meet the commitment to the earlier contractors who had agreed to establish the 250 MW projects consequent to the Andhra Pradesh not implementing the PPA dated 24.4.2015.

- 9) In addition to the above, the Government of India has also been considering the allocation of a competitively priced thermal generated power to the procurers in the State, purchasing solar power.
- 10) In accordance with the above and in view of the commitment by the Government of India and the Andhra Pradesh Distribution Licensees to purchase solar power on the basis of the above power projects aggregating to 1000 MW, there can be an allocation up to 267 MW of thermal based power from Ramagundam Thermal Power Station which would translate to 1068 MW (i.e. 4 times) equivalent of Solar capacity taking the CUF of 19.0% for the Solar Project. The weighted average effective rate of power from the 1000 MW Solar Power Projects considering Rs. 6.16 per unit for the 250 MW (Anantapur Ph-I), around Rs. 5.25 for the proposed 750 MW (Anantapur Ph-II) and Rs. 3.03 for the power from Ramagundam Thermal Power Station would work out to around Rs. 4.20 per unit.
- 11) The above would be of great benefit to the two Distribution Companies in the State of Andhra Pradesh. If the 250 MW PPA is not implemented, there would be adverse implications on the above benefits.
- 12) The scheme for development of 1000 MW of Solar Power Projects and also the availability of thermal power from Ramagundam Thermal Power Station is required to be considered as one composite scheme. The same cannot be differentiated on the basis of 250 MW for which the PPA dated 24.4.2015 has been entered into and separately for the 750 MW solar power in the process of finalization. The entire scheme is required to be considered in an integrated manner.
- 13) It will not be appropriate for the Andhra Pradesh Distribution Companies

or the consumers of Andhra Pradesh including the persons representing public interest to view the availability of solar power from the 250 MW power project in an independent manner.

- 14) It is the intention of NTPC to benefit the Andhra Pradesh Distribution Companies and thereby the consumers in the State of Andhra Pradesh to make available 1000 MW of solar power at the most economical rate including by allocation from the Ramagundam Thermal Power Station.
- 15) The contracts concluded with various Contractors for establishment of 250 MW was in pursuance of the competitive bidding of the packages. It was not on bilaterally negotiated terms. NTPC got the best possible price in the circumstances then prevalent. The finalization of the contract with the contractor of 250 MW has been at a price most beneficial and prevalent at that time. Further, as mentioned herein above, subsequent development of reduction in the solar power price was primarily on account of initiation by NTPC to conclude the contract for 250 MW resulting in the price of Rs. 6.16 per kWh and establishing the avenues for development of higher contracted capacity.
- 16) NTPC had publicly invited the domestic bidders to submit their bids for the 250 MW. The entire process was done in a most transparent manner. It is, therefore, wrong on the part of the objectors to allege that the process was not in a transparent manner or not disclosed to the public at large.
- 17) One of the objections raised by Mr. Rao, the objector, is with reference to the difference in the terms and conditions of the PPAs entered into by the AP Discoms with the Solar developers and the PPA entered into with NTPC. The Objector is referring to the turnkey contract entered into by the Andhra Pradesh Discoms with the Solar Power Developers. These contracts for generation and supply of solar power are at a price which is subject to escalation. There may be difference in the terms and conditions of such turnkey contracts when compared with the contract entered into by NTPC with the Solar Power Developers / Contractors who have been awarded various packages. In the PPA entered into by NTPC with the Andhra Pradesh Discoms, there is no provision for

escalation and tariff is firm for 25 years which is of significant benefit to the Andhra Pradesh Discoms.

- 18) The point made by the objector that the Solar Power Projects should not be given a MUST RUN status is devoid of any merit.
- 19) The objector is wrongly raising the issue on the compliance with the Renewable Purchase Obligation. The quantum of power purchase to be made from non-conventional sources prescribed by the Commission is the minimum quantum, and not the maximum quantum. Further, the present RPPO for the State of Andra Pradesh fixed at 0.25% has been significantly enhanced to 8.0% as per the provisions of amended Tariff Policy. Hence, it is a conscious decision of the Government of India and the Government of Andhra Pradesh that substantial additional solar-power purchase would be in the interest of the State, its environment and in the interest of the public at large. These cannot be a ground for objecting to the PPA approval.
- 20) As regards evacuation of power from the generating stations, the Solar Power Projects being developed by NTPC within the Solar Park will be connected to the 33 kV / 220 kV sub-station, a pooling sub-station of APSPCL and then connected to the Inter-State Transmission Line of CTU. This facilitates evacuation of power of large quantum from Solar Power Park. It does not in any manner affect the interest of the State of Andhra Pradesh. The solar power evacuated through the Powergrid line is being delivered to Andhra Pradesh Discoms at the Andhra Pradesh periphery. This was also decided as per the decision taken at the meeting held on 16.9.2014. Accordingly, the transmission and wheeling charges are to be paid at applicable tariff determined as per regulations of the Central Commission. The allegations to the contrary are wrong and are denied.
- 21) In terms of the PPA, the AP Discoms are entitled to procure Solar Power generated on the tariff terms and conditions contained in the PPA and the allegations to the contrary are wrong and are denied.
- 22) The objector has also raised number of other objections in regard to the terms and conditions contained in the PPA. These objections are devoid

of any merit. NTPC crave leave to deal with the objections to the various terms of the PPA sought to be raised at the time of the hearing. Each and every allegation is wrong and is denied. The objections to the various terms of the PPA cannot be agreed to. The terms and conditions in the PPA are standard terms which ought to be included in an agreement for generation and sale of power from a Solar Power Project to the procurer. The term of the PPA has been agreed to be of 25 years with a provision for extension of the agreement. The tariff for the extended period is to be on mutually agreed terms and conditions. Accordingly, there cannot be any objection to a provision contained in the agreement for extension of the period after 25 years. If the terms and conditions proposed after the period of 25 years are not acceptable to AP Discoms and / or to the Commission, there need not be any extension of the period. The duration of the agreement provided as 25 years from the last unit of 250 MW is as per the standard terms and conditions when a generating station is set up with number of generating units. This is beneficial to the procurers and general public.

- 23) The agreement by the Government of Andhra Pradesh to facilitate various permissions for the Solar Power Projects in pursuance to the policy decision taken by the Government of India in consultation with the Government of Andhra Pradesh cannot be objected to by the objectors. The provision of delivering the power at the Delivery Point at 33 kV is also in accordance with the standard practice when a generating company is selling electricity to the procurers.
- 24) The objections raised by the objector on the nomination to the Committee evaluating bids from the contractors being of a nominee of the Government of Andhra Pradesh or nominee from the Andhra Pradesh Solar Power Corporation instead of being a nominee of the Distribution Company is devoid of any merit. It was consciously decided to nominate a person connected with the Solar Power development. It is wrong on the part of the objector to contend that only nominee of the Discoms can effectively represent the interest of the consumers and not a nominee of the Government of Andhra Pradesh.

- 25) The objections on the assignment of the project and reimbursement of cost incurred on conducting Techno-Economic Feasibility Report is academic as the project has not been transferred and the PPA has been entered into by NTPC with AP Discoms.
- 26) With regard to the objections on the approval by the Ministry of Power, it is submitted that the entire scheme has been evolved as a policy decision by the Government of India (Ministry of Power). The allegations to the contrary are wrong and are denied. In terms of Section 79 (1) (a) of the Act, NTPC will always be regulated by the Central Commission. There is, therefore, no question of NTPC manipulating or otherwise scheming to change the jurisdiction from the State Commission to the Central Commission. The objections raised in this regard are frivolous.
- 27) Further, NTPC will deliver power at the Pooling Point from the Solar Power Park and accordingly, there is no question of NTPC being involved in the transmission of power requiring any transmission license. As a generator, NTPC is entitled to deliver the power at the Delivery Point agreed to in the PPA. The objections raised in this regard also have no merit.
- 28) Commissioning of modules with 5 days prior notice is sufficient and has been duly agreed to by the AP Discoms.
- 29) The terms relating to Performance Bank Guarantee are according to the standard terms and conditions.
- 30) Similarly, the Capacity Utilization Factor and the consequences thereof provided in Article 6 of the PPA are in accordance with the standard terms and conditions and do not require any change.
- 31) The allegation made by the objector that effective rate on the purchase of Solar Power from the 250 MW Power Project would be more than Rs. 9/per kWh is devoid of any merit. Further, as mentioned in the PPA, the obligation of NTPC is to deliver the power at the Delivery Point agreed to. From the Delivery Point up to the periphery of the State Network as on date, there are no transmission charges and there is only adjustment on transformation and transmission losses. In terms of the Central Electricity

Regulatory Commission (Sharing of Inter-State Transmission Charges and Losses) Regulations, 2010, solar based generation is exempt from transmission charges and losses.

32) The relevant extracts of the said regulation read as under:

Process to determine Point of Connection Transmission Charges and Losses allocations:

- a) No transmission charges for the use of ISTS network shall be charged to solar based generation. This shall be applicable for the useful life of the projects commissioned in next three years;
- b) No transmission losses for the use of ISTS network shall be attributed to solar based generation. This shall be applicable for the useful life of the projects commissioned in next three years.
- 33) Subsequently, in terms of the Central Electricity Regulatory Commission (Sharing of Inter-State Transmission Charges and Losses) (Third Amendment) Regulations, 2015, the said exemption was extended to projects commissioned between 1.7.2014 and 30.6.2017. Since the system built, owned, operated, maintained or controlled by the CTU forms part of the ISTS in terms of Section 2 (36) of the Electricity Act, 2003, the said line is exempt from payment of transmission charges or losses.
- 34) The objections raised by the objector that NTPC is accruing significant extra profit on account of the performance of the generating station above the targeted PLF of 18.13% is without any merit. Unlike, other Solar Power Developers, NTPC has already agreed to charge the AP Discoms at 50% of the tariff for generation in excess of 18.13%.
- 35) The objector in his various submissions/objections has made unwarranted, unjustified and unsupported allegations against NTPC, its functioning and has attempted to project as if NTPC is deriving substantial profit out of the generation and supply of electricity from the 250 MW Power Project. Firstly, as mentioned herein above, the attempt made to inflate the per kWh price of Rs. 6.16 by the objector to over Rs. 9/- is totally unjustified, particularly, in the context of the Regulations

of the Central Commission exempting the transmission charges and losses. In view of the above, the scheme for evacuation of power through the transmission system of CTU connected to the AP Transmission Company periphery at different places is rather more effective and beneficial to Andhra Pradesh. The allegations that these will cause loss to the Andhra Pradesh consumers, is devoid of any merit.

- 36) The objector has compared various provisions of the PPA with other documents to raise nitty gritty issues on the implication of the PPA terms. NTPC has followed the standard PPA and has proceeded to finalize the contracts with the contractors on the basis of the same. There is nothing irrational or perverse in the terms and conditions of the PPA. The implementation having been done based on the provisions already concluded, it is wrong on the part of the Objector to compare the provisions of the PPA, to raise objections.
- 37) The principal contention of the objector of comparing the tariff for the 250 MW at Rs. 6.16 per kWh to a tariff of Rs. 5.17 discovered in the case of Telangana is without any merit. As mentioned herein above, the bid for entering into contract with various contractors by NTPC for setting up the Solar Power Projects of 250 MW was invited in September 2014. The Telangana and other bids with a reduced price were thereafter and as mentioned herein above was due to initiation by the Government of India, the Government of Andhra Pradesh and NTPC of seeking contracts of higher capacity under one PPA. The subsequent trend in the reduction in the price cannot, therefore, be a ground to state that the bid invited for 250 MW is either excessive or should not be considered. The issue is whether the bid invited and submitted for the 250 MW at the relevant time was in accordance with the prevalent market situation. There is no reason not to consider the bid to be competitive if the process of selecting the contractors for establishing the project was done in a transparent and competitive manner.
- 38) The Petitioners should not be directed not to implement the agreement validly concluded based on the bid invited by NTPC (in pursuance of the Government Policy decision). It is well settled that the subsequent

developments, that too, after few months of the implementation of the 250 MW should not be a ground for reviewing the competitiveness of the bid received during the period September 2014 - December 2014.

- 39) It is not also appropriate for the objector to refer to some of the other bids received for small projects. Such a project cannot be a representative for deciding whether NTPC with its 250 MW Project at the tariff of Rs. 6.16 per kWh, is competitive or not.
- 22. On 18<sup>th</sup> March 2016, the respondent viz., M/s NTPC Ltd. had submitted their additional affidavit placing on record the salient aspects as regards the implications of the letter dated 28-12-2015 issued by the Ministry of New and Renewable Energy, GoI which was brought to the notice of M/s NTPC in the hearing held on 30-01-2016, and requested to grant approval to the PPA dated 24-04-2015 entered into between M/s NTPC Ltd. and AP Discoms. The submissions made therein are as hereunder:
  - The letter dated 28.12.2015 was issued by the Ministry of New and Renewable Energy under the Scheme for setting up over 2000 grid connected Solar PV power projects with Viability Gap Funding (VGF) under Batch III of Phase II of the Jawaharlal Nehru National Solar Mission (hereinafter referred to as 'JNNSM') by Solar Energy Corporation of India (SECI).
  - 2) The scheme, as envisaged under the JNNSM, has no application to the facts and circumstances of the present case. Under the scheme of JNNSM, SECI has been identified as the implementation agency. SECI is to procure the power from the Solar Power Developer at the quoted price and sell the same to the various Distribution Licensees in different States. Therefore, under the said Scheme, it shall be the individual Solar Power Developers that shall set up the Solar Project for the generation and sale of solar power. SECI is only to act as the implementation agency and has to enter into a back to back arrangement with the Solar Power Developer and the Distribution Licensee. In the said Scheme, NTPC is not setting up the Solar Project.
  - Accordingly, the benchmark tariff of Rs. 4.50 / kWh, as provided in the Letter dated 28.12.2015 (which was previously Rs. 5.50 / kWh as per the

order dated 4.08.2015) is only applicable to the Projects under the JNNSM Scheme proposed to be implemented under Batch-III.

- 4) In the present case, NTPC in its capacity as the Project Developer has entered into a PPA with the AP Distribution Companies, as per the tariff agreed and finalized at Rs. 6.16 / kWh. This tariff has been determined from the capital cost discovered through biding process.
- 5) In any event, the benchmark tariff of Rs. 5.50 / kWh in August 2015 that was subsequently revised to Rs. 4.50 / kWh in December 2015 by the Ministry of New and Renewable Energy under the JNNSM Scheme, was much after the invitations of the bid for the Anantapur Solar Project i.e. September 2014 and the same is subject matter of the present Petition.
- 6) The approval of the PPA in the present case needs to be judged as per the prevalent situation at the time of bid invitation i.e. September 2014. The subsequent reduction in the prices may not be a consideration for deciding the approval of the PPA sought for.

S. No.	State	Tariff for FY 2014-15
		(in Rs./ kWh)
1.	Haryana	7.45
2.	Central Commission	7.72
3.	Rajasthan	7.5
4.	Madhya Pradesh	8.05
5.	Punjab	7.72
6.	Tamil Nadu	7.01
7.	Uttar Pradesh	8.91
8.	Uttarakhand	6.99

7) As on the date of finalization of the bid Rs. 6.16 / kWh was a competitive tariff in the country as can be seen from the following table.

8) The subsequent trend in the reduction in the price cannot, therefore, be a ground to state that the bid invited for 250 MW (Anantapur, Stage-I) is either excessive or should not be considered. There is therefore, no reason to not consider the tariff to be competitive by reason of subsequent price discovery if the process of selecting the contractors for establishing the project was otherwise done in a transparent and

competitive manner.

- 9) The Government of India has also been considering the allocation of a competitively priced thermal generated power to the procurers in the State purchasing solar power. NTPC is endeavoring its best to get the 750 MW solar power (Anantapur stage-II) to be given the benefit of such bundling in order to bring about the substantial reduction in tariff to the Respondent Discoms. NTPC is seeking the support of the Respondent Discoms and the State Government for the above purpose. If Central Government agrees to the same the effective cost of the 1000 MW solar power (750 MW now under the process of selection and 250 MW dealt with in the present Petition) will be significantly reduced, the details of which have already been furnished by NTPC in its submissions dated 30.01.2016.
- 10) NTPC, in deference to the proceedings before the Commission on 21.11.2015 and in the interest of the consumers of the State of Andhra Pradesh has considered offering a relief of 16 Paise per unit in the tariff earlier agreed to between NTPC and AP DISCOMs. This will translate to a benefit of around Rs.150 Crores to the consumers of Andhra Pradesh over a period of 25 year contracted life of the project.
- 11) The Project is at an advance stage of development and 200 MW of the Anantapur Project is expected to be commissioned in April 2016 with the balance 50 MW in September 2016. NTPC has already incurred expenditure to the tune of Rs.1000 Crores out of the Rs.1600 Crores committed. NTPC ought not to be penalized for the expenditure already incurred, particularly when the same was at the behest of the Government of Andhra Pradesh.
- 23. On 2<sup>nd</sup> April 2016, in response to the additional affidavits filed by NTPC on 28.01.2016 (Received on 30.01.2016) and 18.03.2016 (Received on 19.03.2016), Sri M. Venugopala Rao, Senior Journalist & Convener, Centre for Power Studies, Hyderabad; Sri Penumalli Madhu, Secretary, CPI (M), Vijayawada and Sri Ch. Narasinga Rao, AP State Secretariat Member, CPI (M), Vijayawada have submitted the following points for consideration of the Commission:

- 1) The submissions made by NTPC and annexures submitted by it along with its additional affidavit dated 30.1.2016 make it abundantly clear that in the entire process, the Discoms have not been involved at any point of time, except signing on the dotted lines on the PPA. Those who have taken the questionable decisions, which are detrimental to the interests of consumers of power, relating to this transaction, are not taking any responsibility to appear before the Commission and justify the same. The onus of justifying those questionable decisions is put on the Discoms as signatories to the PPA. That explains the predicament of the Discoms in not submitting their responses to the submissions of the objectors, which were sent to them by the Commission on 1<sup>st</sup> January 2016, to submit their response on or before 30.1.2016, so far. It is a clear case of exercising authority without any responsibility and accountability on the part of the Government of A.P. Therefore, the Commission is requested to examine whether it is expedient to make the Government of A.P. a respondent to this petition, directing it to appear before the Commission and respond to the suggestions and objections raised on the subject issue, and take a decision accordingly.
- 2) The argument of NTPC that the subject transaction "was necessary so that the subsequent projects could be established at more competitive rates" is funny and self-contradictory. On the one hand, NTPC admits that "there were other competitive or non-competitive bidding processes involving Solar Power Projects prevalent at that time," implying that the process of selecting solar power projects by others also has been going on under competitive bidding or on non-competitive basis. Secondly, it is not NTPC that is setting up the solar projects but other developers who are being selected through competitive bidding. There is absolutely no basis to the untenable claim of NTPC, by implication, that but for its initiative in the subject issue in other biddings competitive rates would not have been quoted. The other competitive bids in A.P. and other States have been independent processes and in no way related to the process pertaining to the subject issue. Thirdly, when bids are invited by the utilities concerned in any State, the interested developers would come forward to participate in the bidding process in their commercial interest, not because NTPC is

there in the picture either directly or indirectly. Fourthly, even for setting up solar plants with relatively smaller installed capacity, rates quoted by some of the developers are more competitive, as already explained in earlier submissions.

- 3) Government of India, NTPC and the Government of Andhra Pradesh have come to an understanding on the subject transaction, ipso facto, is not a justification warranting consent of the Commission to the questionable PPA and higher tariff. The issue has to be judged on its merits and the interests of consumers need to be protected through the regulatory process of the Commission.
- 4) NTPC contends that "the sale of electricity to Andhra Pradesh from the 750 MW (Phase-II) bids is dependent and related to the due implementation of the PPA dated 24.4.2015 for generation and sale of 250 MW (Phase-1) at the price of Rs.6.16 per unit. If otherwise, NTPC may not be in a position to finalize the contractual arrangements with the bidders (packages) for establishment of the Solar Power Projects of 750 MW, the entire scheme evolved by the Government of India for the State of Andhra Pradesh to get 1000 MW of solar power would be seriously affected. NTPC cannot meet the commitment to the earlier contractors who had agreed to establish the 250 MW projects, consequent to the Andhra Pradesh not implementing the PPA dated 24.4.2015."
- 5) In other words, NTPC is projecting the entire transaction as a fait accompli, implying that unless the Commission gives its consent to the same, in its present questionable form and content, much to the detriment of the interests of the consumers of power, the entire scheme would be seriously affected. NTPC is deliberately ignoring the regulatory reality that unless the Commission gives its consent to the PPA and tariff, after due consideration of all relevant factors, Government of A.P. cannot get it implemented, notwithstanding its understanding with the Government of India and NTPC. Expecting the Commission to give its consent, simply because it is a transaction between the utilities of the Central and State Governments, not on the basis of merits of the issue, is unrealistic and

would defeat the very purpose for which the Commission is established. The GoI, the GoAP and NTPC must be aware of consequences that would follow, if the Commission would not give its consent to the questionable subject agreement in its present form and content.

- (6) NTPC contends that "the scheme for development of 1000 MW of Solar Power Projects and also the availability of thermal power from Ramagundam Thermal Power Station is required to be considered as one composite scheme." But no such provision is incorporated in the subject PPA. It is only after the Hon'ble Chairman of the Commission, Justice G. Bhavani Prasad garu, during the course of public hearings, directed the learned counsel for NTPC to bring it to the notice of the management of the utility to examine the possibility of reducing the tariff substantially and submit its proposals accordingly, the learned counsel later informed the Commission that the management of NTPC was considering offer of "bundled power." In pursuance of that, the utility, in its additional affidavit dated 31.1.2016, proposed that in accordance with the scheme of Government of India for considering the allocation of a competitively priced thermal generated power to the procurers in the State purchasing solar power, "in view of the commitment by the Government of India and the Andhra Pradesh Distribution Licensees to purchase solar power on the basis of the above power projects aggregating to 1000 MW, there can be allocation up to 267 MW of thermal based power from Ramagundam Thermal Power Station which would translate to 1068 MW (i.e. 4 times) equivalent of Solar capacity taking the CUF of 19.0% for the Solar Project." In its additional affidavit submitted on 19.3.2016, NTPC contended that "if Central Government agrees to the same, the effective cost of the 1000 MW solar power (750 MW now under the process of selection and 250 MW dealt with in the present Petition) will be significantly reduced, the details of which have already been furnished by NTPC in its submissions dated 30.01.2016." In other words, there is no finality to the offer of "bundled power" as yet.
- 7) In its affidavit submitted on 30.1.2016, NTPC pointed out that "the weighted average effective rate of power from the 1000 MW Solar Power Projects

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considering Rs.6.16 per unit for the 250 MW (Anantapur Ph-I), around Rs.5.25 for the proposed 750 MW (Anantapur Ph-II) and Rs. 3.03 for the power from Ramagundam Thermal Power Station would work out to around Rs.4.20 per unit." The arrangement of "bundled power" is a statistical jugglery, because what the Discoms have to pay for the bundled power in the form of weighted average effective rate would be exactly equal to the total amount they have to pay, if they purchase the solar power at the proposed rates of Rs. 6.16 and Rs. 5.25 per unit and Ramagundam thermal power @ Rs.3.03 per unit. In other words, the tariff reduced for solar power is added to the thermal power proportionately and on the whole the Discoms would not have any reduction in the effective rate. It may be recalled that when it was pointed out, during the course of public hearing in response to the proposal of bundled power, that what was being done in the name of bundled power by the Gol, NTPC and its trading entity NVVNL, was exactly the kind of statistical jugglery, the learned counsel for NTPC maintained that it would be different, but the proposal made by NTPC for supply of bundled power in its affidavits is not different. Another implication of this scheme of bundled power is that, in the name of encouraging States to purchase solar power, under the scheme of bundled power, the Government of India is asking them to purchase thermal power also, that too, at a higher cost, in this case @ Rs.4.20 rather than @ Rs. 3.03 per unit, whether they require it or not. What should have been allocated to the needy States at applicable rates from the unallocated power of 15% of its utilities at its disposal, the Government of India has been allotting thermal power in this contrived manner at higher tariff to States irrespective of their requirement.

8) The Commission, in its tariff order for 2016-17, determined that 10472 MU of surplus is available for AP Discoms to be sold in market at Rs.4.29 per unit. It is obvious that additional thermal power under the arrangement of bundled power is not required by AP Discoms. If the Discoms cannot sell the projected surplus power, they will be forced to direct the long-term sources under PPAs to back down to the extent required, thereby imposing avoidable burden of paying fixed costs for non-generation of power accordingly on consumers of power. In a situation of surplus, purchasing

unwarranted thermal power under the arrangement of bundled power would enhance such avoidable burden of paying fixed costs for nongeneration of power.

- 9) NTPC contended that the present RPPO for the State of Andhra Pradesh fixed at 0.25% has been significantly enhanced to 8.0% as per the provisions of amended Tariff Policy of the Government of India. In the tariff policy dated the 28th January 2016 issued by the Government of India, it is stated that "pursuant to provisions of section 86 (1) (e) of the Act, the Appropriate Commission shall fix a minimum percentage of the total consumption of electricity in the area of a distribution licensee for purchase of energy from renewable energy sources, taking into account availability of such resources and its impact on retail tariffs." Further, the policy says: "within the percentage so made applicable, to start with, the SERCs shall also reserve a minimum percentage for purchase of solar energy from the date of notification of this policy which shall be such that it reaches 8% of total consumption of energy, excluding Hydro Power, by March 2022 or as notified by the Central Government from time to time." Therefore, there is no need and no justification to purchase NCE, including solar power, on long-term basis far exceeding the minimum of 5% determined by the Commission under RPPO, that too, at very high tariffs that are being projected now. As the learned counsel for NTPC himself admitted before the Commission during the course of public hearings, the tariffs for solar power would come down further through competitive biddings. In other words, the Discoms can go in for entering into PPAs with developers of solar power plants to be selected through competitive bidding gradually to get the benefit of the tariffs that are going to come down further. That is the prudent way of considering the "impact on retail tariffs."
- 10) Against availability of 66,839 MU for 2016-17 projected by the AP Discoms, availability of non-conventional energy is estimated as 4964.74 MU, out of which solar power is 1463 MU and wind power is 2911.38 MU. Against the projected sale of 50,733 MU, purchase of 4965 MU of NCE works out to 9.79 per cent out of which purchase of 1463 MU of solar power works out to 2.88 per cent. The obligation of Discoms is to purchase 5% of NCE out

of their total consumption (sales), including 0.25% of solar power under Renewable Power Purchase Obligation (RPPO) order issued by the Commission. When the Discoms can confine to purchasing 2536.50 MU of NCE (5%) including 126.825 MU (0.25%) of solar power to meet their obligations under RPPO during 2016-17, purchasing an excess NCE of 2429 MU at exorbitant tariffs imposes avoidable additional burden on the consumers and is unjustified. Unmindful of such avoidable and unjustified burdens on consumers of power - Rs.6.80 per unit for solar power of 1046.91 MU, Rs.6.16 per unit (plus other costs) for solar parks' energy of 416.10 MU, Rs.4.40 per unit for wind power of 2911.38 MU, etc. the proreform Gol and Government of A.P. have been forcing the Discoms to enter into long term PPAs to purchase NCE power, especially solar power, at very high tariffs indiscriminately. That the Commission has reduced projected sale of power by AP Discoms for the year 2016-17 from 50732 MU to 49991 MU would reduce need for purchasing NCE power to meet the obligation even under RPPO.

- 11) NTPC submitted that "from the delivery point up to the periphery of the State Network as on date, there are no transmission charges and there is only adjustment on transformation and transmission losses. In terms of the Central Electricity Regulatory Commission (Sharing of Inter-State Transmission Charges and Losses) Regulations, 2010, solar based generation is exempt from transmission charges and losses." Since solar power under the subject PPA is generated and transmitted within Andhra Pradesh, the question of inter-state transmission does not arise. If it is the contention of NTPC that power under the subject PPA would be supplied to AP Discoms, exempting them from payment of transmission charges and losses, let NTPC take the responsibility to ensure the same by incorporating required provisions in the PPA.
- 12) In its latest additional affidavit, NTPC "has considered to offer a relief of 16 paise per unit in the tariff earlier agreed to between NTPC and AP DISCOMs. This will translate to a benefit of around Rs.150 Crores to the consumers in Andhra Pradesh over a period of 25 year contracted life of the project." Compared to the avoidable hefty burden on consumers of

power under the subject PPA, as explained in the earlier submissions, the "relief" of 16 paise per unit offered by NTPC is a pittance. As such, this offer cannot justify their request for consent of the Commission.

- 13) Regarding various amendments proposed to the subject PPA, the response of NTPC that "the objections to the various terms of the PPA cannot be agreed to. The terms and conditions in the PPA are standard terms which ought to be included in an agreement for generation and sale of power from a Solar Power Project to the Procurer" is untenable, as it has failed to explain what those "standard terms" are, who decided them and what their legal sanctity is. On the contrary, as already explained, the terms in the subject PPA are contrary to terms and conditions in various PPAs signed for supply of solar power by different developers. In view of the attitude of NTPC, the Commission is requested to judge the terms and conditions in the PPA and amendments proposed by us on their merits and take appropriate decisions.
- 24. On 2<sup>nd</sup> April 2016, the petitioners filed a memo making certain submissions in response to the Commission's direction to file the details of levelised tariff of NTPC project as compared to the levelised tariffs obtained in the open competitive bidding route (619 MWs). The details of all the constituent components of tariff were also to be furnished in both cases as above, to enable the Commission to compare and contrast both the projects of different types of bidding. The submissions made are as hereunder:
  - I. APSPDCL has floated tenders for 1000 MW Solar Power in Aug' 2014 and finalized for 619 MW by selection in Oct' 2014. In this bidding the tariff is as follows.

Lowest Tariff: Rs. 5.25 \*/ kWh (Levelised for Rs. 6.17)

Highest Tariff: Rs. 5.99 \*/ kWh (Levelised for Rs. 7.05)

(\*First year tariff with 3% escalation every year up to 10<sup>th</sup> year and 10<sup>th</sup> year tariff continued up to 25 years)

II. The Project cost of solar projects selected under bidding 2014 for a capacity of 619 MW was arrived duly matching with the levelised tariff discovered in the competitive bidding. With the arrived project cost, the

parameters of evacuation cost and land cost were deducted ((a) and (b)) and arrived the tariff with M/s NTPC parameters (c) to (g) to get equivalent tariff of M/s NTPC.

## Evacuation & Land Cost:

a) Evacuation Cost: 55 Lakhs /MW (CERC Order dt. 31.03.2015)

b) Land Cost : 10 Lakhs/MW (Market price)

NTPC Parameters

- c) CUF : 18.13 % ( as per M/s NTPC)
- d) O&M expenses : 10.94 L/MW
- e) Interest on Loan : 9% (as per NTPC)
- f) Debt to Equity Ratio : 80:20
- g) Effective Tax Ratio : 21% (Effective tax rate for M/s NTPC)
- III. The viability Gap Funding (VGF) of Rs. 1 Cr./MW provided by the Gol is not considered since M/s NTPC has conducted bidding with domestic solar panels.
- IV. The interconnection point of M/s NTPC is at 33 kV level of 33/220 kV pooling sub-station of APSPCL where as interconnection point for the solar developers selected under competitive bidding-2014 is at the Grid substation of AP Transco / AP Discom. Since the interconnection point is at the 33/220 kV pooling sub-station of APSPCL, the petitioners have to bear the entire line losses from 33/220 kV Sub-station to petitioners periphery point. Whereas Solar power developers selected under bidding were delivering power at the grid substation of AP Transco /AP Discom (No Losses).
- V. The comparison sheet with various combinations of AP bidding 2014 with one time solar park expenses of Rs. 20 Lakhs / MW is submitted below:

S. No.	Description	Levelized Tariff
		with AD
		(Rs./Unit)

1.	M/s NTPC proposed Tariff with NTPC parameters (6 (c) to (g)) (Sep-2014)	6.16 (Accepted Rs. 6.00 M/s NTPC)
2.	Tariff arrived with AP bidding Lowest (6.17): Tariff arrived by deducting evacuation and Land cost of ((a) to (b)) form expected project cost for AP Bidding L1 tariff of 6.17 with NTPC parameters ((c) to (g)) by addition of One Time expenditure of Rs. 20 Lakhs/MW.	4.67
3.	Tariff arrived with AP bidding Highest (7.05): Tariff arrived by deducting evacuation and Land cost of ((a) to (b)) form expected project cost for AP Bidding highest tariff of Rs. 7.05 with NTPC parameters ((c) to (g)) by addition of One Time expenditure of Rs. 20 Lakhs/MW.	5.35

Note: The above tariff was arrived without considering VGF of Rs.1 Cr./MW

M/s NTPC conducted bidding during 2015-16 for procurement of 1000 MW Solar Park at Gani, Kurnool district, A.P. and the tariff offered by the developers with domestic panels are Rs. 5.12 (100 MW) and Rs. 5.13 (50 MW), wherein AP provided land and evacuation similar to the Solar Park at N.P. Kunta, Anantapur District. In this scheme there is no Viability Gap Funding (VGF) as was provided by Gol of Rs. 1 Cr/MW to the 250 MW Solar Park at N.P.Kunta.

- 25. On 6<sup>th</sup> April 2016, the respondent No.1 viz., M/s NTPC Ltd. had filed their final submissions, which are as hereunder:
  - The PPA was entered into between the Petitioners and NTPC Limited in pursuance of a scheme evolved by the Government of India in consultation with the Government of Andhra Pradesh and also in participation by the AP Discoms as well as Andhra Pradesh Solar Power Corporation Limited (APSPCL), a Joint Venture Company of the State of Andhra Pradesh and the Government of India.
  - II. APSPCL has been established as a Nodal Agency to develop the Solar Park in the State of Andhra Pradesh in order to promote the solar power development in the State. The Electricity Act, 2003 in the Preamble, in Sections 61 (h) and 86(1)(e) and the declared policies of the Government of

India and Government of Andhra Pradesh provides for promotion of Solar power in an aggressive way to substitute the fossil fuel sources. The Solar Park at Anantapur is being developed by APSPCL and intends to cater to the development of 1500 MW in aggregate at one place with investments in solar power generation being done not only by NTPC Limited but also by other developers.

- III. Further, the 250 MW scheme, which is the subject matter of the present proceedings, was initiated by the Government of India as an important development to promote the solar power generation with indigenous equipment, namely to promote the manufacture of solar panels and other associated equipment in India instead of importing from outside. The objectives are well known, namely:
  - a. to develop indigenous manufacturing facilities for the panels and equipment involved in the solar power generation;
  - b. to save valuable foreign exchange outflow;
  - c. to provide a competitive environment to reduce the solar power panels cost when such panels are imported from outside. In other words, with the presence of indigenous solar power panel manufacturers, there will be pressure on the suppliers of the solar panel, from outside to reduce the prices.
  - d. to provide employment in the manufacturing of the solar panels in India.
- IV.In order to achieve the above, the Government of India and the Government of Andhra Pradesh agreed to aggressively promote the 750 MW solar power generation with indigenous equipment at the earliest, namely, by March April 2016. The scheme for solar power generation through imported equipment, including the 750 MW power generation by NTPC in the same Anantapur District Solar Park is expected to provide better competitive rates in view of the finalization of the 750 MW Solar Power Project.
- V. The tariff of Rs 6.16 per kWh for the 250 MW (now agreed to be reduced by NTPC to Rs.6.0 per kWh) is to be considered in the light of the above

background and more particularly, the substantial and significant other benefits arising to Andhra Pradesh, in particular and the country, in general, because of the indigenous manufacture of solar power equipment, saving of foreign exchange etc. mentioned herein above. There is a necessity to factor an appropriate additional cost savings for the above benefits. Without prejudice to the above, the power cost of Rs.6/- per kWh is most beneficial to the State of Andhra Pradesh considering the time at which the 750 MW Project was initiated, the tenders were invited from the Contractors and the PPA was finalized.

- VI. AP Discoms had also initiated a process for the Competitive Bid Procurement of solar power. NTPC initiated the process in September 2014 and submissions of the bid by the Contractors were in Oct/Nov 2014. As per the submissions dated 02.04.16 filed by the AP Discoms, the process was initiated by the AP Discoms in August 2014 and the bid submissions were in October 2014. Accordingly, the procurement under NTPC as well as by the AP Discoms was during the same time period, going by the statement made by AP Discom.
- VII. The AP Discoms have now filed an affidavit giving details of the price at which the AP Discoms have signed for the 619 MW with 20 Project Developers of the capacity ranging from 3 MW to 70 MW. The levelised tariff is in the region of Rs.6.17 per kWh minimum and Rs 7.05 per kWh and the weighted average of 619 MW works out to over Rs.6.80 per kWh. As compared to the above, NTPC's price of Rs. 6/- per kWh which is about 80 Paise/kWh less than the price at which the AP DISCOMs have signed for 619 MW, is most competitive in regard to the projects which were bid in the year 2014.
- VIII. In the earlier proceedings, while NTPC had consistently stated that the AP Discoms bid were with an escalation of 3% and the same needs to be factored, the objectors as well as the AP Discoms were only representing the AP Discom price as Rs.5.25 per kWh which is only the first year tariff of one of the 20 bidders for 40 MW (out of the total 619 MW), without consideration of the escalation and levelised tariff for the entire duration. When the Commission specifically directed AP Discoms to place the

comparison on record, the affidavit dated 2.4.2016 had been filed taking into account the escalation and the levelised tariff is between Rs.6.17 per kWh to Rs.7.05 per kWh, the weighted average of the same working out to Rs.6.80 per kWh.

- IX. Being confronted with the above, the AP Discom is now raising two issues of purported adjustments to be given in the price quoted by NTPC, namely the adjustment for the land cost and the evacuation cost. These external issues are being raised now, after the AP Discoms have duly signed the PPA agreeing to the price of Rs.6.16 per kWh. In any event, there are no merits in regard to the said issues raised for the following reasons:
  - a. Firstly AP Discoms and the objector are wrong in giving an impression that land related cost is free for NTPC. In terms of affidavit dated 24.09.2015 filed by NTPC, it is already on record that NTPC has paid Rs. 50 Crores as upfront payment and it is required to pay Rs. 62.50 Crores more to the State Government for the land lease cost over the useful life. This is being deliberately ignored by the AP Discoms and the objector. The above cost of Rs.112.5 Cr. (50Cr+62.5 Cr.) is much more than the land cost considered by the Petitioners i.e. Rs.25 Cr (@ 10 Lakh/MW for 250 MW).
  - b. Secondly the land and infrastructure are being provided by the State Government at the price which the State Government has considered appropriate, taking into account a host of factors in the setting up of the Solar power park, the constitution of APSPCL for the purpose and large number of other direct and indirect benefits that will result, besides the procurement of Solar Power in the State.
  - c. In so far as AP Discoms are concerned, what is relevant is the price at which the solar power is available to them. AP Discoms are not entitled to plead adjustment for any land cost, when the land has been allotted to NTPC in the Solar Park on the basis of a conscious decision taken by the Government of Andhra Pradesh in consultation with the Government of India. These adjustments in the land cost are being proposed without any basis;
  - d. As mentioned herein above, the price at which the solar power is

available to AP Discoms, namely, Rs.6/- per kWh is the most competitive, as compared to the price at which the solar power is being procured by AP Discoms on the process initiated by them where the Weighted Average works out to about Rs.6.80 per kWh;

- e. As regards evacuation cost, the AP Discom is wrongly defining the AP periphery. The substation created by APSPCL is to be treated as the periphery. The substation has been created by APSPCL instead of AP Transco; on account of the fact that APSPCL is a Joint Venture Company with the Government of India and the Government of India has agreed to promote the creation of a substation as a pooling point. In so far as the generator is concerned, APSPCL is the Interconnection Point where the electricity is to be delivered. Like in other solar power developments, the line between the generator bus bar and the 33/220 kV substation of APSPCL is laid down by the NTPC and all costs and expenses related thereto including the losses on the said line would be to the account of NTPC. The price of Rs. 6/- per kWh is inclusive of the above, namely, for delivery of the electricity generated at the Interconnection Point of APSPCL;
- f. The evacuation cost taken as 55 Lakh/MW is allowed by the Central Commission for capital works related to cables and transformer etc. up to the interconnection point only. The interconnection point for the instant case is incoming 33 kV feeder of 33/220 kV pooling substation of APSPCL. Therefore, NTPC has incurred expenditure on evacuation system up to inter-connection point and this is already factored in the tariff of Rs. 6 / kWh. There is therefore absolutely no basis for considering Rs.55 lakhs per MW additionally for NTPC. The deduction made by AP Discoms to arrive at Rs.4.67 and Rs. 5.23 per MW are arbitrary and without any basis.
- g. If APSPCL was not established and the Solar Park was being developed at Anantapur with power generation both by NTPC as well as by others, AP Transco would have been required to establish a substation in accordance with its functions under Section 39 of the

Electricity Act, 2003. In that event also the obligation of the generators including NTPC would be to deliver the electricity at the substation to be created by AP Transco;

- h. Accordingly, AP Discoms are wrongly alleging AP periphery to add cost to the NTPC supply of power beyond Rs. 6/- per kWh;
- i. In view of the submissions regarding the land cost and the evacuation cost incurred by NTPC, it is clear that the Petitioner is not placing before the Commission proper and complete facts and are wrongly representing the tariff of 4.67 / 5.35 per kWh in their submission dated 02.04.16.
- j. Further, the purpose of creation of the pooling point was to enable the generator to inject power at the pooling point. The cost beyond the pooling point cannot be loaded to the generator. If the above is permitted, it completely nullifies the entire scheme evolved by the Government of India and the Government of Andhra Pradesh in establishing APSPCL as the agency to take care of the evacuation of power from pooling point. The submissions made by AP Discoms and the objector in this regard are factoring evacuation cost of Rs.55 lakhs per MW is entirely misconceived and is liable to be rejected.
- IV. Considering the salient aspect that PPA for 250 MW NTPC project and the PPAs signed for 619 MW around the same time, AP DISCOMs having signed the PPA with other developers at the weighted average cost of Rs.6.80 per kWh and every capacity much above Rs. 6 per kWh for Developers of 619 MW, there is absolutely no justification for AP Discoms. This is particularly after AP Discoms had duly signed the PPA with NTPC without raising any issue and had applied to the Commission for approval of the PPA. However, under no circumstances, is it open for this issue to be raised belatedly when the project is on the verge of commissioning and ready to supply the solar power to the State of A.P.?
- V. Without prejudice to the above, it is submitted that NTPC is endeavoring its best to get the bundling of power along with the 750 MW power from Anantapur Solar Park which is in the process of being finalised so as to effectively reduce the cost of 1000 MW of solar power being purchased

by AP Discoms from NTPC. In this regard, NTPC reiterates the submissions made in the affidavit dated 28.1.2016.

- VI. For the reasons mentioned herein above and more particularly as the Commission had already approved the power purchase cost of an Weighted average of about Rs.6.80 per kWh under the bid initiated by AP Discom and further has factored the same in the tariff order issued by the Commission, it is respectfully submitted that the purchase of power from the 250 MW Solar Power Project of NTPC at Rs.6 per kWh be approved. There is urgency as the 250 MW Solar project has already been completed and NTPC has applied to APSPCL for the connectivity.
- 26. On 16<sup>th</sup> April 2016, Sri M. Venugopala Rao, Senior Journalist and Convener, Centre for Power Studies, Hyderabad submitted certain additional points (further to his submissions dated 2<sup>nd</sup> April 2016) for the consideration of the Commission as hereunder:
  - I. The levelised tariff over the term of the PPA comes Rs. 5.79 / kWh, when worked out as per the guidelines dated 4.8.2015 issued by the Ministry of New & Renewable Energy relating to approval for implementation of scheme for setting up of 2000 MW of Grid-connected Solar PV power projects under batch-III of phase-II of Jawaharlal Nehru National Solar Mission with viability gap funding support from National Clean Energy Fund. Thus, it is clear that the tariff of Rs. 6.16 per kWh agreed to between NTPC and the Government of A.P. for purchase of 250 MW solar power is inflated even going by the guidelines of MNRE and cannot be justified. So is the position with the tariff of Rs.6.00 per kWh offered by NTPC.
  - II. As can be seen from the letter ref.No.01:CD:336D dated 11.04.2016 of the Executive Director (Commercial) of NTPC addressed to the Secretary (Energy), Government of Andhra Pradesh, there is no finality to the offer of bundled power made by NTPC, even though the offer of weighted average tariff of bundled power is only a trick of necromancy, of conjuring up illusion of benefit of reduction of tariff which is really not there.
- 27. On 2<sup>nd</sup> May 2016 APSPCL, the respondent No.2, filed a memo in response to the directions of the Commission during the public hearing on 02.04.2016 in the matter of payment of Rs.50+63= Rs.113 Crores by M/s NTPC to them. The

submissions in the memo are as hereunder.

## i. One time Solar Park Development Expenses:

M/s NTPC has paid only Rs. 50 Crs. to APSPCL as one time solar park development expenses @ Rs. 20 lakh per MW and has not made any other payment to APSPCL except Rs. 50 Crs.

## ii. Annual O&M Charges:

In addition to the above, M/s NTPC shall pay annual O&M charges to APSPCL @ 1 Lakh/MW/Year escalated @ 6% every year. This amount is to be paid every year after COD for a period of 25 years.

- 28. On 5<sup>th</sup> May 2016, the respondent no. 2 namely M/s NTPC filed short reply submission to the submission of Mr. M. Venugopala Rao dated 16.04.2016 with a prayer to proceed to pass appropriate orders in the matter, as there is an urgency of the project being commissioned, at an earlier date. The submissions are as hereunder:
  - i. NTPC reiterates the submissions made earlier by it including on 02.04.2016 when the order was reserved and the final submissions were made on 06.04.2016.
  - ii. NTPC has itself pointed out that bundling benefits can be considered only in respect of 750 MW which is in the process of being finalized as Anantapur Stage-II and not with reference to the 250 MW which is a subject matter of the PPA under consideration. In this regard, NTPC would crave reference to the submissions filed vide affidavit dated 28<sup>th</sup> January 2016.
  - iii. Andhra Discoms will have substantial benefit if the entire process is proceeded with, as specifically incorporated in the PPA dated 24.04.2015 and the subsequent Agreement for 750 MW.
  - iv. In order to honour the directions of Commission, NTPC has already offered to extend comfort to the consumers of AP Discoms by way of providing relief of 16 Paise/kWh in the earlier agreed tariff. In this regard, NTPC would crave reference to its submissions in affidavit dated 18.03.2016.
- 29. On 6th May 2016, the Chief Engineer/IPC&PS/APPCC has submitted the

replies stated to be prepared in consultation with APSPCL, in response to the objections received from Sri M. Venugopala Rao:

- i. One time solar park development expenses of Rs.20 lakh per MW and annual O&M charges of Rs.1 lakh per MW payable to APSPCL have already been factored in the tariff mentioned in the PPA i.e. Rs.6.16 per kWh.
- ii. Sri G. Adiseshu, MD/APSPCL has informed during the public hearing that bids were invited by NTPC on 26.09.2014 from EPC Contractors through international competitive bidding under DCR (Domestic Content Requirement) Category for establishment of 250 MW Solar Power Project at Anantapur Ultra Mega Solar Park(1500 MW). EPC cost discovered from the competitive bidding is the basis for arriving at the project cost. As per clause 6.0 of the PPA signed between NTPC and AP Discoms, the tariff of Rs.6.16 per kWh mentioned in the PPA shall be put up before the appropriate commission.
- iii. As per MNRE Guidelines, some capacity has to be earmarked out of total procurement with provisions of domestically manufactured solar cells as well as modules. MNRE will prescribe the quantity to be fixed with DCR in each tender based on the prevailing market conditions from time to time.

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- iv. The committee was nominated by the GoAP as per the Lr.No. 325/ Pr.II(2)/ 2015, Dt.03.03.2015 received from the Energy Secretary/ I&I Department comprising of Director (Finance), APTRANSCO/APGENCO Hyderabad and Managing Director of APSPCL / Hyderabad.
- v. APERC may take appropriate decision on compensation of CUF below 18.13% to 17.9% by APDISCOMs.
- vi. APDISCOMs have entered power purchase agreement with M/s NTPC as per the Memorandum of Understanding (MoU) between GoAP and M/s NTPC, GoAP letter dated 11.04.2015 and based on the calculation sheet enclosed to the petition filed by AP DISCOMs. Further, in the rejoinder to the counter filed by M/s NTPC, AP DISCOMs submitted that the Commission is vested with powers to regulate the tariff under section 86 (1) read with section 62 of Electricity Act. The Commission is yet to fix the

Tariff.

- vii. AP DISCOMs entering PPA subject to approval of the Commission.
- viii. The existing AP Quota of 750 MW from Ramagundam shall continue to the AP State, since AP DISCOMs have paid fixed cost of the plant from last 25 years.
- ix. To maintain the average tariff of Rs.4.20/Unit with thermal bundling power, M/s NTPC shall take up the allocation of 750 MW with the Gol from unallocated quota.
- 30. On 7<sup>th</sup> May 2016, Sri M. Venugopala Rao, Senior Journalist and Convener, Centre for Power Studies, Hyderabad submitted his final submissions further to his submissions dated 16.04.2016, which are as hereunder:
  - i. It was made clear by both NTPC and AP Discoms, during the hearing on 30.4.2016, that they have no more specific submissions to make on the subject issue, especially in the light of the inquisitive observations made by the Commission and the earlier written submissions. The stand of NTPC shows that except offering reduction of tariff to Rs.6 per unit from the earlier Rs.6.16 per unit of solar power, it has no specific response to the observations of the Commission and objections and suggestions made in the earlier submissions. Non-response of the Discoms to the objections and suggestions of the objectors should be treated as their acceptance of the same, as has been the standard judicial practice.
  - ii. The Commission observed during the hearing that a balance has to be maintained between the interests of the parties to the PPA, on one hand, and of the consumers at large, on the other, in view of the fact that the Government of A.P. had given certain commitments and the project of NTPC is nearing completion. In view of the evasive proposals of so-called bundled power at weighted average price, except offering to reduce the tariff by 16 paise per unit, and the attitude of NTPC and forced silence of the Discoms, it is an extremely delicate task before the Commission to strike such a balance, keeping in view the objections and suggestions of the objectors from the public side and the need for protecting genuine interest of consumers of power at large. In deference to the observation of the

Hon'ble Chairman, Justice G. Bhavani Prasad garu, directing to make final suggestions, not objections, on how to resolve the issue, for maintaining such a balance of interests, and in good faith in the fairness and objectivity of the Commission, it is to submit that relevant facts submitted and otherwise need to be considered appropriately, whether they are in the form of objections or suggestions. In a way, objections imply suggestions and vice versa to justify or reject a point of view.

- iii. It is beyond the shadow of a doubt that in view of the untruthful, untenable and evasive claims and proposals made by NTPC, the latter's claims and submissions need not be treated as gospel truth. The false claim of NTPC that it had paid Rs.113 Crores as one-time payment for development expenses of solar park is contradicted by APSPCL in its belated memo, that too, on the direction of the Commission, submitted to it on 4th May 2016, asserting that NTPC had paid Rs. 50 Crores only. In the light of earlier submissions, among others, the claims of NTPC pertaining to the capital cost of the 250 MW unit, in all respects, including availing of VGF and/or AD and the way in which NTPC conducted the process of competitive bidding and finalized it, need to be examined by the Commission thoroughly to reduce the projected tariff realistically. Even the levelized tariff of Rs. 5.79 per unit in terms of the guidelines of the MNRE as pointed out in written submissions dated 16.4.2016 is very high and should not be taken as a benchmark for determining tariff in the present case. This is the most important requirement to protect larger consumer interest. A copy of the calculations of tariffs relating to different solar power plants with which AP Discoms and TS Discoms have entered into PPAs during the recent period is enclosed for comparative examination by the Commission.
- iv. The next important issue that needs to be examined by the Commission is the proposed arrangement for evacuation of power generated by the unit from its delivery point at 33 kV sub-station of APSPCL which is extremely detrimental to the interests of consumers, as already explained in earlier written submissions. In this connection, it is to bring to the notice of the Commission that APCPDCL, on an earlier occasion, had rejected a similar proposal for transmission of 20 MW of solar power from Rajasthan plants by

NVVNL, the trading wing of NTPC. In its letter No. CGM(CommI.&RAC)/ SE(IPC)/f.NVVN/D.No.1167/13 dated:18.06.2013, APCPDCL explained: "5. The per unit additional charges worked out with the above transmission losses and charges from Rajasthan STU to AP DISCOM is Rs. 2.43 per unit and the additional burden in procurement of 20 MW Solar Power from Rajasthan works out to Rs. 218.37 Crores (25 years)." As such, APCPDCL had rejected the proposal, pointing out that the "proposal is not accepted due to aforesaid unjustified financial burden of Rs. 218.7 Crores on APDISCOMs." In its letter dated 19.9.2013, APCPDCL also conveyed the same to NVVNL. When such a guestionable and detrimental arrangement for supply of solar power from another State by NVVNL was not acceptable and was rejected by the Discoms, a similar arrangement within A.P., with the additional burden several times higher than that of NVVNL, as already explained in earlier submissions, needs to be rejected outright. Therefore, the Commission is requested to consider the suggestion in the earlier written submission dated April 2 that - NTPC submitted that "from the delivery point up to the periphery of the State Network as on date, there are no transmission charges and there is only adjustment on transformation and transmission losses. In terms of the Central Electricity Regulatory Commission (Sharing of Inter-State Transmission Charges and Losses) Regulations, 2010, solar based generation is exempt from transmission charges and losses." Since solar power under the subject PPA is generated and transmitted within Andhra Pradesh, the question of interstate transmission does not arise. If it is the contention of NTPC that power under the subject PPA would be supplied to AP Discoms, exempting them from payment of transmission charges and losses, let NTPC take the responsibility to ensure the same by incorporating required provisions in the PPA.

v. The third important issue that needs to be examined and considered by the Commission is the suggestion in the written submissions dated 29<sup>th</sup> October 2015 that "for the annual CUF below 18.13%, NTPC shall compensate AP Discoms for the energy equivalent to annual CUF of 18.13% at the rate as determined by APERC."

- vi. As a matter of fact, for the reasons explained in the earlier submissions and in view of the attitude of NTPC and forced silence of the Discoms on the same, among others, it is a fit case for rejection of consent of the Commission. It is a case of making larger interest of consumers of power in Andhra Pradesh a sacrificial goat for the whimsical experiments of the rulers. Rejection of consent by the Commission may lead to loss of face to the Government, but giving consent to the proposed tariff and the PPA, in its present form and content, will impose avoidable hefty burden on consumers of power for a long period of 25 years. Simply because the Government of A.P. has given certain commitments and the plant of NTPC is nearing completion, they cannot and should not be treated as valid grounds for giving consent to the proposed tariff and PPA, for, if consent is given on those grounds, the same may be treated as a precedent and the Government of A.P. may force the Discoms to enter into similar PPAs with other developers, private or of public sector, again and again and seek consent of the Commission to the detriment of larger consumer interest. It is reliably learnt that moves are afoot to force the Discoms to enter into longterm PPAs with Suzlon Energy Limited and Axis Energy Ventures India Private Limited for purchasing 4000 MW of renewable energy - 3000 MW of wind and 1000 MW of wind-solar, hybrid - and seek consent of the Commission, though it is unwarranted even in terms of requirement of power to meet growth in demand, its higher cost imposing avoidable additional burden on consumers on a long-term basis and obligations under RPPO. Therefore, the Commission is requested that in case it is inclined to consider giving consent to the subject PPA and tariff, the following points may be considered, among others:
  - a) Reduce tariff substantially from Rs. 6 per unit by thoroughly examining all aspects relating to the capital cost of the project, including VGF, AD and the way in which NTPC conducted the process of competitive bidding and finalized the same.
  - b) NTPC should be directed to take the responsibility of ensuring transmission of power from its project to the delivery point of the substation of AP Transco or Discoms, exempting the latter from payment of

transmission charges and losses by incorporating appropriate clauses in the PPA.

- c) Determine the compensation/disincentive/penalty that NTPC has to pay to the Discoms when CUF and generation and supply of solar power from its subject unit is less than 18.13% and incorporate appropriate clauses in the PPA to this effect.
- d) As rightly observed by the Commission in its tariff order for 2016-17 (at page 37), "the need for promoting green energy for environmental protection and the necessity to keep the power purchase cost at a reasonable level have to be delicately balanced". In the name of encouraging renewable power, already enough damage is done to larger consumer interest with the kind of agreements forced by the Governments on the Discoms and orders given by regulatory bodies, pampering developers, whatever be the impact on environmental protection, as experience so far has confirmed unequivocally. In this connection, it is reiterated that renewable energy can be promoted gradually to take advantage of falling prices to keep the power purchase cost at a reasonable level. Anyway, this is a larger subject and its pros and cons can be articulated at length.
- e) All aspects relating to the proposed tariff and clauses in the PPA and the suggestions and objections raised by objectors may be analyzed, making the stand of the Commission on each and every aspect clear, giving reasons for the same, in the Commission's detailed order so that the same can provide proper guidance for arrangements and agreements in future.
- f) It may be made clear that the order cannot be treated as a precedent for seeking consent for similar and other such unwarranted, questionable and untenable agreements, especially the agreements to be signed between NTPC and the Discoms for the remaining 750 MW of the subject project, if they are detrimental to larger consumer interest, thereby sending a strong message to the powers-that-be and power utilities that they cannot take the Commission for granted and the consumers for a ride and subvert the regulatory process.

- g) NTPC and the Discoms may be directed to submit a revised PPA, incorporating the revised tariff and amendments to clauses in the PPA decided by the Commission, duly signed by both the parties to it for its consent.
- h) In view of a plethora of long-term PPAs that the Discoms are being forced to enter into with different developers, especially developers of solar and other non-conventional energy, and seek consent of the Commission for the same, the Commission should direct them to submit a long-term load forecast plan to examine justification or otherwise of such long-term purchases of power. This is all the more necessary in view of the fact that the Commission has already determined, in the tariff order for 2016-17, that the Discoms have a surplus of 10472 MU during the current financial year and in order to restrain them from entering into PPAs for purchasing unwarranted high-cost power indiscriminately and imposing avoidable additional burdens on consumers on a long-term basis.
- vii. It is learnt that NTPC has synchronized its subject plant and started generation and supply of power and billing and demanding the Discoms to pay the same. The Commission is requested to direct the Discoms not to make any payment to NTPC until and unless the Commission gives its consent to the tariff and PPA.
- viii. The Commission was thanked for the way in which it has conducted the public hearings, with a democratic spirit and upholding the principles of transparency and accountability, giving adequate time to objectors to make detailed submissions and directing the parties to the PPA to respond to the same and to the inquisitive observations of the Commission made in consumer interest.
- 31. The point for consideration is whether the subject Power Purchase Agreement deserves to be approved and consented to and if so, subject to what terms and conditions?
- 32. The Electricity Act, 2003 makes the Central Electricity Regulatory Commission discharge the function of regulating the tariff of generating companies owned

or controlled by the Central Government under section 79 (1) (a) of the Act. Still section 86 (1) (b) of the Act makes a State Electricity Regulatory Commission discharge the function of regulating the electricity purchase and procurement process of distribution licensees including the price at which the electricity shall be procured from the generating companies ...... through agreements for purchase of power for distribution and supply within the State. This provision does not expressly or by necessary implication exclude the generating companies owned or controlled by the Central Government from its Rule 8 of the Electricity Rules, 2005 clarifies in effect and operation. substance the approach to be adopted in respect of tariffs of generating companies under Section 79. Rule 8 says that the tariff determined by the Central Commission for generating companies under clause (a) or (b) of subsection (1) of section 79 of the Act shall not be subject to re-determination by the State Commission in exercise of functions under clauses (a) or (b) of subsection (1) of section 86 of the Act and subject to the above, the State Commission may determine whether a Distribution Licensee in the State should enter into a Power Purchase Agreement or procurement process with such generating companies based on the tariff determined by the Central Commission. What is intended by this Rule to be made conclusive is the tariff determined by the Central Commission in such cases which cannot be the subject of any re-determination by the State Commission under Section 86 (1) (a) of the Act. Even while regulating the electricity purchase and procurement process of the distribution licensees including purchase and procurement of electricity from generating companies through agreements for purchase of power, the tariff fixed by the Central Commission will remain undisturbed, while the State Commission can consider under Rule 8 whether such tariff can be the basis for any Power Purchase Agreement or procurement process by a Distribution Licensee in the State. If thus a power is given to the State Commission through Rule 8 to determine whether such a tariff can be the basis of a Power Purchase Agreement or procurement process, it is selfevident that the State Commission may take a decision on the price at which electricity shall be procured from such generating companies also by a Distribution Licensee in the State irrespective of or notwithstanding the quantum of tariff determined by the Central Commission. Section 21 of the

A.P. Electricity Reform Act, 1998 also makes the consent of the State Electricity Regulatory Commission to a Power Purchase Agreement between a licensee and a generating company a must without which any such agreement will be void.

- 33. The agreement for approval of which the present petition has been filed is specifying the tariff in clause 6.1 at Rs.6.16 per kWh. This tariff is claimed to be on levellised basis for the entire energy of 250 MW and to have been arrived at by considering the Viability Gap Funding (VGF) of Rs.1 crore/MW and availing accelerated depreciation benefit etc. The petitioners desired regulation of the price and the 1st respondent contended that the power purchase price is to be regulated as per the orders of the Central Electricity Regulatory Commission and the State Commission can only approve the Power Purchase Agreement with the determined tariff. If Rule 8 of the Electricity Rules, 2005 were to be construed to be of such effect, nothing remains for the State Commission to determine whether a distribution licensee should enter into a Power Purchase Agreement with such a generating company based on such tariff. Such an interpretation restricting the scope and effect of Rule 8 in violation of the plain and unambiguous language of the provision will be violating the natural and grammatical meaning giving a judicious choice to the Commission to judicially determine whether the Power Purchase Agreement is to be permitted to be entered into or not.
- 34. The 1st respondent owned and controlled by the Central Government was referring to the various statutory provisions and policies relating to the Renewable Energy but the 1st respondent itself proposes to enter into this Power Purchase Agreement for a tariff or Rs.6.16 per unit as against the tariff of Rs.6.35 per unit decided by the Central Commission in its order dated 31.03.2015. As such it is clear that tariff decided by the Central Commission is not sacrosanct and the 1st respondent itself can vary the power purchase price. The 1st respondent itself stated that it has passed on the benefit of the reduced price resulting from the competitive bidding process adopted by it, in the interest of the State Discoms indicating that the Power Purchase Agreements can be finalized on negotiated basis and are not inflexible. In any view, when consent was sought for not for the tariff determined by the Central

Commission but for the bidding price, any adjudication of the request for consent in any manner can never be construed as redetermination of the tariff of the Central Commission.

- 35. The power purchase/procurement price to be paid to any generator has to be regulated by the State Commission alone in respect of a distribution licensees within the State and any withholding of consent for a Power Purchase Agreement a distribution licensee proposes to enter into with any generating company is not redetermination of tariff fixed by the Central Commission but is only disapproving any purchase of power at that level of price.
- 36. With this background, it is seen that the price of Rs.6.16 mentioned as the tariff at clause 6.1 of the Agreement may not be open to acceptance by this Commission as it is. Sri M. Venugopala Rao, a Senior Journalist in his first set of objections dated 19.09.2015 firstly objected to not following the process of competitive bidding and nextly with reference to the better price fetched in other States on long term basis in competitive bidding. However, because of any directory provisions in the National Tariff Policy, the Government of Andhra Pradesh and the distribution companies in the State on the one hand and the 1st respondent on the other cannot be construed to have lost their right to enter into any agreement/contract in this regard. An objection was also raised about the extensive assistance given to the 1st respondent by the Government of Andhra Pradesh in facilitating the 1st respondent to execute this project but the 1st respondent still imposing extremely unreasonable and unjustifiable terms and conditions in the Power Purchase Agreement with an exorbitant tariff but mere financial imprudence, even if it were true, may not legally invalidate the agreement.
- 37. In his further objections dated 26.09.2015, Sri M. Venugopala Rao gave elaborate reasons to contend the Central Electricity Regulatory Commission tariff to be neither sacrosanct nor unalterable but as already stated, the State Commission has no jurisdiction to interfere with or re-determine the tariff though it may regulate the power purchase price at which a State distribution company purchases power from a generating company under a Power Purchase Agreement. The learned objector also referred to other Power Purchase Agreements of the distribution companies with private developers at

much lesser prices and the solar policy of the State Government prescribing only a competitive procurement process. The contentions are not without substance and may indicate the un-acceptability of the power purchase price as it is proposed in the agreements.

38. Identical objections filed by different objectors at the end of October, 2015 were firstly finding fault with the distribution companies entering into the Power Purchase Agreements in the present form in compliance with the directions of the State Government. The Electricity Act, 2003 provides a positive role for the Central and State Governments in the electricity sector though the Statement of Objections and Reasons for the legislation specifies the objective of distancing the regulatory responsibilities from the Government to the Regulatory Commissions. The enactment of the Electricity Regulatory Commissions Act in 1998 for determination of tariff distancing the Government from the same was also referred to, but still the appropriate Government was given a positive role to play in various aspects of generation, transmission, distribution, trading and use of electricity, development of electricity industry, protection of consumers etc. The National Electricity Policy and plan under section 3, the National Policy on standalone systems for rural areas and nonconventional energy systems under section 4 and the National Policy on Electrification and Local Distribution in Rural Areas under section 5 are prepared, published, notified, reviewed, revised etc., by the Central Government only in consultation with the State Governments. Rural electrification has been made the joint responsibility of the State Government and the Central Government under section 6 of the Act. The power to issue appropriate directions to the Regional or State Load Dispatch Centres for maintaining smooth and stable transmission and supply of electricity in a region or state was given to the appropriate Governments under section 37. Provision of subsidy to any consumer or class of consumers in the tariff determination by the State Commission is also made the responsibility of the State Government and it is also positively involved in the works of the licensees under sections 67 and 68 of the Act. The State Government receives the advice of the State Commission on various issues under section 86 (2) and it is also conferred the power to give directions in matters of policy involving public interest under section 108, apart from the rule making power

on various matters under section 180 of the Act. The State Government also has a similar role to play even under the Andhra Pradesh Electricity Reform Act, 1998, the provisions of which are saved by section 185 (3) of the Central Act to the extent the provisions of the State Act are not inconsistent. Therefore, the Government of Andhra Pradesh can be seen to be entrusted with very crucial specified statutory responsibilities in the electricity sector as seen from the illustrative provisions referred to above and it may also have to be noted that both the distribution companies are Government companies. Under such circumstances, the association of the State Government with the proposal of generation of solar power within the State and its sale to the petitioners cannot invalidate any agreement entered into by the petitioners with the 1st respondent solely on that ground. The difference in the terms and conditions between the agreements entered into by the petitioners with private developers and the agreement with the 1st respondent is also objected to in good detail by the objectors. Associating the Managing Director of the Andhra Pradesh Solar Power Corporation Limited and the Director (Finance) of Generation Corporation of Andhra Pradesh with the evaluation of bids was also objected to but association of these two public servants of the Government owned companies may not be suspected to be for any other reason than public interest, without any material to the contrary. Suspicion however strong it might be cannot be equated to proof and the extra favour, if any, shown to the 1st respondent which is a Government of India undertaking need not be studied in contrast with any agreement with private industrialists. If impleading the Andhra Pradesh Solar Power Corporation Limited is superfluous as contended by the objector, it will not in any way effect the validity of the request for consent. The detailed objections relating to various clauses in the Power Purchase Agreement are mostly about their being unfavourable to the distribution companies in contrast with the stipulations on identical issues in the agreements with the private developers or others in the past but not about they being illegal with reference to any specific statutory provision or rule or regulation. If any provisions are administratively or commercially imprudent, it is for the distribution companies to take care of their interests and not for the Commission to impose what would have been better terms and conditions in their perception and judgment. Only such provisions

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as can be ex-facie considered opposed to any provision or principle of law or the legitimate interests of the Distribution Companies or the consumers or public policy or interest has to be disallowed.

- 39. In that view, to the extent clause 6.1 of the Power Purchase Agreement provides that for annual CUF between 18.13% and 17.9%, the petitioners shall compensate the 1st respondent for the energy equivalent to annual CUF of 18.13% at Rs.6.16 per kWh, it appears to be unconscionable, irrational and unenforceable. There may be some justification for imposing any such liability on the petitioners if the fall of CUF to below 18.13% is attributable to any cause or reason that can be laid at the door of the petitioners. Otherwise the provision stipulating such a penalty is in terrorem and cannot be construed to be in consequence to the breach of any legal obligation by the petitioners. Therefore, without stipulating the liability to pay any such compensation to be only for any reason or cause attributable to the petitioners, the clause as it stands cannot be consented to.
- 40. The Government of Andhra Pradesh entered into a Memorandum of Understanding with the 1st respondent on 16.09.2014 for development or a 1000 MW solar power project under which it has undertaken the responsibility of allotting land on nominal lease rent for 25 years with provision of further extension, facilitating the statutory clearances and approvals, making required infrastructure available at no cost, providing the sub-station and/or transmission line from the project upto its sub-station at no cost and facilitating signing of the Power Purchase Agreement as per the applicable tariff. The Memorandum also provided for discovery of the project cost from competitive bidding and other parameters based on applicable appropriate Commission regulations with which a nominee of the State Government will be associated. It is in pursuance of this understanding probably two officers were associated with the exercise and the State Government have informed the 1st respondent by letter dated 11.04.2015 that they had given their consent for availing the entire 1000 MW with a levillised tariff of Rs.6.16 ps per kWh for a 250 MW of Stage-I. The State Government also informed that necessary directions have been given to both the petitioners to enter into Power Purchase Agreements accordingly. The present Power Purchase Agreements are a consequence of

these events. The 1st respondent claims to have incurred significant expenditure and to have committed itself to further expenditure based on the understanding with the State Government and with the petitioners and is in effect and substance pleading promissory estoppel against the petitioners going back on the understandings. The 1st respondent cannot be considered unjustified in taking such a stand when the State Government or the petitioners do not claim the sequence of events to be not voluntary or to be vitiated by any reason. The 1st respondent had in fact reduced the tariff from that fixed by the Central Electricity Regulatory Commission only due to it taking recourse to the competitive bidding route. The petitioners not taking recourse to the competitive bidding route again may not be fatal under such circumstances, more so, when the developer selected is a Central Government undertaking and this is not a case of any undue preference between private developers. The concept of a solar park is stated to be the first of its kind and the magnitude of green power proposed to be generated itself may justify some favourable treatment. Much has been said about the motives behind the entire exercise but it is well settled that motives are not quite relevant in determination of civil rights and the examination of issues involved herein by this Commission is clarified to be confined to the functions and duties assigned to it by the statutes, rules and regulations and not to any extraneous factors to the same.

41. During the public hearings, Sri M.G. Ramachandran, learned counsel for the 1st respondent was requested on 21.11.2015 to explore the possibilities of extending any comfort to the distribution companies than that is contemplated under the Power Purchase Agreement and further on 30.01.2016, the letter of the Government of India dated 28-12-2015 fixing the benchmark tariff in respect of the above 2000 MW grid connected solar PV power projects was brought to the notice of the learned counsel for the 1st respondent. The parties have made further submissions orally and in writing in this behalf. In the letter dated 28.12.2015, the Ministry of New and Renewable Energy, Government of India have intimated all the State Governments that benchmark tariff is now reduced to Rs.4.50/kWh for next 25 years without any escalation and corresponding tariff of Rs.4.43/kWh to be paid to the solar power developers for setting up of over 2000 MW grid connected solar PV power projects with

VGF under Batch III of Phase-II of JNNSM. The 1st respondent in the additional affidavit filed on 30.01.2016 stated that it proceeded with establishment of 250 MW by inviting competitive bidding packages which worked out to Rs.6.16 per kWh which was less than the tariff discovered in other competitive or non-competitive bidding processes involving solar power projects. The subsequent projects fetched better weighted average prices substantially on account of the initiative taken for the project. The balance of 750 MW in this solar park is expected to receive substantially less bids. A scheme for allocation of cheaper thermal based generated power evolved by the Government of India for coal based power stations that completed 25 years dated 16.07.2015 proposes bundling for next 25 years with agreements for solar capacity and accordingly there can be an allocation upto 2267 MW of thermal based power from Ramagundam thermal power station which would translate into 1068 MW. The 1st respondent therefore projected a probability of the weighted average affected price from the 1000 MW solar power project to work out to around Rs.4.20 per unit, considering Rs.6.16 per unit for 250 MW, around Rs.5.25 for the proposed 750 MW and Rs.3.03 for the power from Ramagundam thermal power station. The scheme has to be considered in entirety and they will be the most economical rates for the distribution companies and the consumers in the State of Andhra Pradesh. Agreements with the private developers are for a price subject to escalation whereas the price of the 1st respondent is static for 25 years. While 1st respondent justified various clauses in the agreement as normal or standard, a further additional affidavit has been filed on its behalf on 19.03.2016 clarifying that benchmark tariff of Rs.4.50/kWh is applicable only to JNNSM scheme projects and the bid of Rs.6.16/kWh was a competitive tariff in the country by the date of its finalization. The 1st respondent indicated the tariffs fixed for seven other states and by the Central Commission which varied between Rs.6.99/kWh to Rs.8.91/kWh. The 1st respondent also stated that in deference to the proceedings of the Commission dated 21.11.2015 and in the interest of the consumers of the State of Andhra Pradesh, the matter was considered and offered a relief of Rs.0.16 ps per unit which will translate into a benefit of around Rs.150 crores for 25 years. The 1st respondent claimed to have incurred expenditure of Rs.1000 crores by now and it expected the project to

be commissioned by April, 2016. The project was stated to have been accordingly commissioned.

- 42. In the batch of objections dated 02.04.2016, it was rightly pointed out that the proposed bundling making power available to the State for Rs.4.20 ps per unit is contingent on Central Government agreeing to the same. While the sequence of events stated and the documents filed by the 1st respondent probablise the practical certainty of the proposed bundling turning into a reality, the scope for the Government of India going back on the proposal without giving approval or consent in future cannot be totally ruled out. While such bundling may offer a reasonable basis for the Commission to take a positive view on the request for consent, if it does not materialize it should be open to any stakeholder to approach this Commission again to reexamine the entire issue and take a decision on merits on any necessity or/and justification in fact and law for withdrawing any consent. The objectors of-course opined even this proposed bundling to be a mere statistical jugglery and further pointed out during hearing that the already 25 year old Ramagundam thermal power station may not continue to generate power to any extent till another 25 years. However, an overall view of all the facts and circumstances may not permit rejection of the Power Purchase Agreement outright for any or all of the reasons on which the objectors relied on. The Memorandum of Understanding in writing between the two Governments, the directions from the State Government to the utilities, the execution of the project by the 1st respondent only due to such understanding etc. are not facts that can be wished away and the entire process cannot be reversed and nullified in such background without jeopardizing public interest or justice and equity. The price of Rs.4.20 ps per unit is undoubtedly competitive by any standard given the various data placed before the Commission in this inquiry and the submissions on oath made on behalf of the 1st respondent can be given their due weight.
- 43. The Annexure A to the memo filed by the petitioners on 02.04.2016 indicated that levellised tariff in respect of private solar developers with whom the petitioners entered into Power Purchase Agreements is between Rs.6.17 ps and Rs.7.05 ps, even the lowest being 1 ps more than the levellised tariff agreed between the petitioners and the 1st respondent. In addition, private

developers were stated to be eligible for escalation of 3% from the 2nd tariff year to 10th tariff year which thereafter remains constant, while the 1st respondent gets no escalation at all from inception till end. In that view of the matter the impressions gained by the objectors or others from the 1st year tariff of the private developers being between Rs.5.25 ps and Rs.5.99 ps cannot be considered as leading to correct perceptions.

- 44. In its further submissions dated 06.04.2016, the 1st respondent stated that the agreements in respect of 619 MW of the petitioners are not better placed in any manner and the 1st respondent paid Rs.50 crores as upfront payment and is required to pay another Rs.62.50 crores for the land lease. Hence it claims the price offered by it at Rs.6.00 per unit is most competitive against the weighted average price of Rs.6.80 ps per unit paid to private developers. Even the evacuation cost is met by the 2nd respondent which is a joint venture company of State and Central Governments and the costs, expenses and land losses will be accounted for by the 1st respondent without any further cost to the distribution companies. The expenditure on evacuation system upto interconnection point was incurred by the 1st respondent and already factored in the tariff of Rs.6.00 ps. The 1st respondent again submitted that it is endeavouring its best to get bundling of power. Final submissions of the 1st respondent thus effectively met most of the objections and suspicions though Sri M. Venugopala Rao in his submissions dated 16.04.2016 again referred to the letter dated 11.04.2016 from the 1st respondent. But there appears nothing inherently inconsistent in the letter with the submissions of the 1st respondent dated 06.04.2016. While the 2<sup>nd</sup> respondent filed a memo on 04.05.2016 about the payment of Rs.50 crores to it for solar park development expenses and the liability to pay O & M charges for a period of 25 years from the Commercial Operation Date, the 1st respondent again clarified on 06.05.2016 through a reply that bundling will be in respect of the second phase of 750 MW which is being finalized and appropriate orders may be passed by the Commission early in view of the commissioning of the project shortly.
- 45. In the final suggestions filed by Sri M. Venugopala Rao on 07.05.2016 was the suggestion concerning compensation vis-à-vis the annual CUF which was already dealt with above and the other suggestion was about the expenditure

and tariff claimed by the 1st respondent. Suggestions were also relating to evacuation of power. While there appears to be some force in the contentions of Sri M. Venugopala Rao as noted already, the Commission has to maintain a balance between the parties to the agreement and the consumers and also keep in view the sequence of events between the Governments and the public utilities ending with execution and commissioning of the project itself. As already stated it is only any terms and conditions that are illegal that can be rejected and not all imprudent but agreed terms and conditions.

- 46. Thus notwithstanding that the subject Power Purchase Agreement may or may not be an ideal example of financial, administrative, technical and practical prudence, within the scope of the jurisdiction of this Commission in examining such an agreement for granting or not-granting consent, it has to be stated that there appears to be only one term in the agreement which can be construed as an unconscionable penalty and unenforceable condition that relates to the payment of compensation for generation below 18.13% upto 17.9%. To that extent the parties have to be directed to include the words that indicate the fixing of such responsibility only for any reason or cause attributable to the petitioners.
- 47. Then notwithstanding not so favourable terms and conditions in the agreement including the power purchase price binding on the parties for 25 years, the offer of bundling provides a strong incentive to the Commission not to withhold its consent for the agreement as a whole. If the balance 750 MW of power in the solar project and 1068 MW of thermal power from Ramagundam power station were to be provided to the petitioners the bundling of which will result in a power purchase price of Rs.4.20 ps per unit to the petitioners including the present 250 MW, it offers a very attractive proposition by any standards. However in the contingency of such bundling not happening, the same may provide justification for any stakeholder to approach this Commission for reexamination of the entire issue within the limits of its jurisdiction.
- 48. Considering the price offered by the 1<sup>st</sup> respondent at Rs.6.00 per unit, the petitioners have filed a memo with detailed reasons and three annexures. Annexure No.3 reduced the infrastructure working capital margin, contingency cost, project management and working capital margin by 25% which

calculation led to arriving at a levellised tariff with A.D. benefit of Rs.5.96 ps. The memo of the petitioners also gave detailed reasons for such reduction of three items. The memo and the annexure read together clearly appear to provide a reasonable, verifiable and acceptable basis for the power purchase price at which the Commission can permit the distribution companies to enter into the agreements in exercise of its jurisdiction under Rule 8 of the Electricity Rules, 2005 read with the statutory provisions already referred to. Hopefully there will be a gentleman's agreement between the parties to abide by the conclusions of this Commission on the above three aspects and the petition has to be ordered accordingly.

Therefore, the petition is ordered with the following directions,-

(1) In clause 6.1 of the subject Power Purchase Agreement, the petitioners and the 1<sup>st</sup> respondent shall incorporate the words "for any reason or cause attributable to the Eastern Power Distribution Company of Andhra Pradesh Limited (or the Southern Power Distribution Company of Andhra Pradesh Limited as the case may be), after the words "for the annual CUF between 18.13% and 17.9%" and before the words "Eastern Power Distribution Company of Andhra Pradesh Limited (or the Southern Power Distribution Company of Andhra Pradesh Limited as the case may be), after the words "for the annual CUF between 18.13% and 17.9%" and before the words "Eastern Power Distribution Company of Andhra Pradesh Limited (or the Southern Power Distribution Company of Andhra Pradesh Limited as the case may be) shall compensate";

(2) In clause 6.1 of the subject Power Purchase Agreement, the petitioners and the 1<sup>st</sup> respondent shall substitute the words "Rs.6.16 per kWh" wherever they occur with the words "Rs.5.96 per kWh";

(3) In the event the proposed bundling of 750 MW solar power to be generated from Stage-II of this project and 1068 MW of thermal power to be generated from Ramagundam thermal power station (on allocation of 267 MW of thermal power from that generating plant) making the effective power purchase price of Rs.4.20 per unit including for the 250 MW proposed to be generated from Stage-I of this project does not materialize as and when it should so materialize, any stakeholder including the petitioners, the 2<sup>nd</sup> respondent, the objectors herein and any other consumer or stakeholder can invoke the jurisdiction of this Commission for reexamination and reconsideration in accordance with law of the consent being given herein;

Page **71** of **72** 

(4) Accordingly, in exercise of its regulatory jurisdiction, under section 86 (1) (b) of the Electricity Act, 2003, section 21 (4) of the Andhra Pradesh Electricity Reform Act, 1998 and Rule 8 of the Electricity Rules, 2005, the Power Purchase Agreements between the petitioners and the 1<sup>st</sup> respondent dated 24.04.2015 respectively are approved and consented to, subject to the conditions specified at (1) to (3) above;

(5) The parties shall bear their own costs;

(6) The parties shall submit such agreements executed in compliance of this order to the Commission within 45 (forty five) days from today.

This order is corrected and signed on this the 4<sup>th</sup> day of June, 2016.

P. Rama Mohan

Member

Dr. P. Raghu Member

Justice G. Bhavani Prasad Chairman