

**JOINT ELECTRICITY REGULATORY COMMISSION  
FOR THE STATE OF GOA AND UNION TERRITORIES  
GURGAON**

Quorum  
Shri S.K.Chaturvedi, Chairperson  
Smt. Neerja Mathur, Member  
**Petition No. 199/2016**  
**Date of Order: 25.04.2016**

**In the matter of**

Seeking approval of the Hon'ble Commission for the implementation of Smart Grid Pilot Project in Puducherry.

**And in the matter of**

Superintending Engineer – I, Electricity Department, Puducherry

.....**Petitioner**

**Present**

**For Petitioner**

Shri K. Mathivanan, Electricity Department, Puducherry  
Shri A.S. Jitendra Rao, Electricity Department, Puducherry  
Shri Manish Kumar Tiwari, Power Grid Corporation of India

**ORDER**

The Petitioner through this Petition sought the approval of the Commission for implementation of the Smart Grid Pilot Project in Puducherry. The Petitioner submitted that the Government of India, Ministry of Power, has decided to establish Smart Grids in India with an objective of achieving most efficient management of distribution system. The Ministry of Power approved the implementation of Smart Grid Pilot Project in Puducherry at a cost of Rs 46.11 crores excluding maintenance of the infrastructure after the Project period. The Government of India shall finance 50% of the cost of this Pilot Project and the remaining 50% is to be borne by the Government of Puducherry.

The Petitioner further submitted that it is planned to develop a consumer utility interactive Pilot Smart Grid which will cover smart metering and control through Advanced Metering Infrastructure (AMI) and have additional features like Peak Load Management, Net Metering etc. The Project is to be implemented in Town – I Sub-Division of Division – I, comprising of 34000 service connections plus 1600 CT operated connections of all the four regions of Puducherry.

The Petitioner further submitted that the Government of Puducherry has already accorded its approval to select an Investor cum Service Provider to fund the State Government's share of the Project along with the Power Grid Corporation of India as Consultant in this Project.

The Petitioner further submitted that through the e-tendering process M/s Dongfang Electronics Co. Limited has been selected as the Investor cum Service Provider. The Company had quoted Rs 43.91 crore to invest, supply, install, test, commission and maintain the Project as against the approved Project cost of Rs 46.11 crore . The Project period is 18 months from the date of award of work.

The Petitioner further submitted that the Smart Meters to be provided to the consumers would provide the following benefits to the consumers:-

- Consumers Engagement and empowerment with greater control over their energy use and bill.
- Improved quality and reliability of power supply
- Increased life of appliances and gadgets due to improved power quality.
- No need to invest in power backup solutions like inverters and gen-sets.
- Rooftop renewable generation with facility to feed excess power into the grid.

The Petitioner further submitted that the Smart Meters will provide the following benefits to the Utility:-

- Reduction of AT&C losses by improving billing and collection efficiency results in increase in revenue of the utility.
- More accurate and timely billing.
- Improved outage restoration and power quality data.
- Early detection of meter tampering and theft.
- Online energy accounting and auditing, tamper detection and revenue protection.
- Better understanding of system load to design DR Programs
- Improved load management and system load analysis.
- Optimal utilization of assets – avoidance of capacity addition.
- Crew and asset management
- Faster identification of faults and speedy power supply restoration.
- Improved asset quality and life by remote monitoring of health and undertaking preventive maintenance.

The Petitioner further submitted that the Project cost as approved by the Ministry of Power does not include the cost of Operation & Maintenance of the Smart Grid for five years from the date of operational acceptance of the Project. The consultant charges to the Power Grid Corporation of India will be paid from the share of the Ministry of Power in this Project. Initially the investor will make capital investment on behalf of the Government of Puducherry which will be repaid to the investor in 60 equated monthly installments after the operational acceptance of the Project by the Electricity Department, Puducherry.

The Petitioner further submitted that the investment to be made by the Investor cum Service provider towards infrastructure and maintenance would be reimbursed by the State Government from the revenue receipts of the department after 18 months from the date of signing of the agreement. The Project is expected to be completed by June, 2017 after which the repayment would start. The savings from the implementation of the scheme are expected to offset the outflow of funds.

In response to the specific query made by the Commission on product warranty, the Petitioner agreed to introduce binding clauses on Product and Service Warranty in the agreement, despite the fact that the contractor is to take up O&M of the Project for five years after commissioning.

The Commission has considered the submissions of the Petitioner and accorded its approval for the implementation of the said Smart Grid Project in Puducherry.

Ordered accordingly.

**Sd/-**  
**(NEERJAMATHUR)**  
**MEMBER**

**Sd/-**  
**(S.K.CHATURVEDI)**  
**CHAIRPERSON**

**Certified by**



**KEERTI TEWARI)**  
**SECRETARY**