PUNJAB STATE ELECTRICITY REGULATORY COMMISSION
SITE NO. 3, BLOCK B, SECTOR 18-A, MADHYA MARG, CHANDIGARH

Review Petition No. 01 of 2021
In Petition No. 28 of 2019
Date of Order: 06.09.2021

Review of the Order dated 01.02.2021 passed by the Commission in the petition filed by Punjab State Power Corporation Limited seeking approval for the PPAs and Procurement process related to the conventional generating (Thermal/Gas) Stations.

In the matter of: Punjab State Power Corporation Limited, PSEB Head Office, The Mall, Patiala Punjab 147001.

...Review Petitioner

Versus

1. Damodar Valley Corporation DVC Towers, VIP Road, Kolkata- 700054
2. Pragati Power Corporation Limited, Himadri, Corporate Office, Rajghat Power House Complex, New Delhi- 110002.
3. Meja Urja Nigam Power Private Limited, Meja Thermal Power Project, P.O- Kohdar, Meja Tehsil, Allahabad- 212301 (UP)

.....Respondents

Present: Sh. Viswajeet Khanna, Chairperson
Ms. Anjuli Chandra, Member
Sh. Paramjeet Singh, Member

ORDER

Punjab State Power Corporation Limited (PSPCL) has filed the present review petition for review of the Order dated 01.02.2021 passed by the Commission in petition No. 28 of 2019 to the extent that disallowing the procurement of power from the DVC Generating Stations, Pragati Gas Power Station and Meja Thermal Power Project, aggregating to 885.10 MW is at variance with the actual facts and is required to be modified.

2. PSPCL has submitted as under:

That the Commission disallowed the procurement of power from DVC

Generating Stations (Durgapur, Raghunathpura and Bokaro), Pragati Gas Power Station (Bawana) and Meja Urja Nigam Private Limited (Meja Thermal Power Project) aggregating to 885.10 MW based on the assumption that Punjab is surplus in power during a large part of the year and it is not economical to procure power from stations with a variable rate higher than Rs. 3/kWh. The power demand can be met through a judicious mix of long term, medium term and short term contracts coupled with banking arrangements/purchase through power exchange. The above decision of the Commission is at variance with the actual facts.

2.1 PSPCL has been consistently scheduling power from the DVC Generating Stations w.e.f their respective commercial operation dates, dating as far back as FY 2012-13. The Procurement is not limited to the paddy season but is spread throughout the year. PSPCL has been scheduling power from these Generating Stations on a month to month basis and even during the non-paddy season. The average scheduling during FY 2018-19 & 2019-20 from DVC Durgapur, Raghunathpur and Bokaro was 83.4%, 86.4% and 94.2% respectively of the availability declared by DVC. The non consideration of this fact constitutes an error apparent on the record.

2.2 The weighted average variable cost of Durgapur plant was Rs 2.874/kWh & Rs 2.912/kWh, for FY 2019-20 & 2020-21 respectively, Raghunathpur plant Rs 2.952/kWh & Rs 2.927/kWh for FY 2019-20 & 2020-21 respectively and for Bokaro Plant Rs 2.186/kWh & Rs 2.275/kWh for FY 2019-20 & 2020-21 respectively. PSPCL has attached a detailed statement of the variable cost of the DVC plants during the FY 2019-20 to 2020-21 further submitting that the power procurement from the above DVC Generating Stations is within the merit Order for dispatch.

2.3 With regard to Pragati Power Generating Station it has been submitted that there has been a significant reduction in Gas prices, bringing the variable costs within the range of Rs. 3/KWh as prescribed by the Commission. Further, there are other benefits which accrue if Gas Based Generation is included in the portfolio of PSPCL. The Central Electricity Authority has also mentioned the advantages of Gas Based Generation in its National Electricity Plan, 2018. Gas based units respond faster to load changes and have higher ramp rates and are thus better suited for flexible operation. It has been specifically noted in the CEA report of December 2017 that Gas Plants are most ideally suited to balance the variation from renewable generation. The availability of gas power helps the procurer in getting peak power at a short notice. The continued operation of the Pragati Power is considered necessary for the islanding scheme planned for the NCT of Delhi.

2.4 With regard to Meja Thermal Power Station, PSPCL submitted that allocation of power from Meja Thermal Power Station was done by the Ministry of Power on 05.10.2010. In terms of the allocation, PPA was executed on 29.12.2010. It has been held in the impugned Order that in so far as the Central Generating Stations are concerned, the liability of the parties comes into force after signing of the PPA. Since the PPA has been signed between the parties, the same is valid subject to de-allocation by the Central Government. PSPCL continues to be bound by the PPA and non-consideration of this fact constitutes an error apparent on the face of the record.

2.5 With regard to short term power purchase and/or day ahead purchase from the exchange or renewable power in lieu of long term tie up of power, PSPCL has submitted that the distribution licensee is required to have a minimum 85% to 90% of power on long term basis in order to effectively comply with its universal Service obligation to supply under Sections 42 (1) and 43 (1) of the Electricity Act 2003 read with the other applicable provisions of the Act. The distribution licensee is required to make committed arrangements for the purchase of power from various sources in order to maintain supply of electricity to the consumers in its area of supply. The major quantum of energy to discharge this obligation cannot be arranged on day ahead/ short term basis and the distribution licensee needs to enter into a long term contract.

2.6 PSPCL does not have surplus power during the paddy season and no other generating stations, with which PSPCL has a long term contract, can substantiate the 885.10 MW which these 5 generating stations provide. The other generating stations with which PSPCL has a long term contract may be able to supply power as an alternative to these 5 Generating Stations but at a higher variable cost.

3. The review petition was admitted for further hearing by the Commission vide order dated 07.06.2021 and notice was issued to all stakeholders/respondents to file their replies to the petition.

4. The respondents filed their respective replies to the review petition. It has been submitted by the respondents that they are affected/interested parties in petition No. 28 of 2019 and the Commission ought to have heard them before passing the Order dated 01.02.2021. The principle of natural justice requires that the affected party should be given an opportunity to be heard. The principles of natural justice have been violated while passing the order dated 01.02.2021 at the back of the

respondents. Petition No. 28 of 2019 should have been decided after hearing the respondents.

4.1 Damodar Valley Corporation, respondent No. 01, has submitted that agreement dated 7.11.2006 was executed with Punjab State Electricity Board. As per the term of the agreement, DVC agreed to generate and supply and PSEB agreed to purchase electricity of the contracted capacity of 200 MW on the terms and conditions of the said power purchase agreement. The duration of the agreement is 25 years from the date of COD and PSPCL is required to pay tariff for the quantum of power declared available from the power plants and energy charges for the quantum of power scheduled for taking delivery. PSPCL started scheduling power from Durgapur, Raghunathpur and Bokaro Thermal Power Stations from 27.07.2012, 15.07.2016 and 26.03.2018 respectively. Since then PSPCL has been paying capacity charges from the quantum declared available by DVC and capacity and energy charges from the quantum scheduled by PSPCL from the above three plants. The tariff paid by PSPCL has also been included in the Revenue Requirements of PSPCL and recovered through the tariff/charged from consumers. The variable costs of DVC's Power Plants are very competitive. The variable cost for Durgapur steel TPS from the FY 2012-2013 to 2019-2020 falls in the range of Rs. 2.13 to Rs. 3.04 per unit, Raghunathpur TPS for the FY 2016-17 to 2019-20 falls in the range of Rs. 2.21 to Rs. 2.95 per unit and Bokaro – A TPS for the FY 2017-18 to 2019-20 falls in the range of Rs. 1.49 to 2.18 per unit. The variable charge for the above three power plants for FY 2019-20 and FY 2020-21 (upto Jan 2021) is substantially below Rs. 3 per unit. Further, PSPCL has been consistently scheduling & procuring power from these three power plants of DVC even during the non paddy season. The Power Supplied by DVC to PSPCL is economically viable and in the interest of consumers of Punjab.

4.2 Pragati Power Corporation Limited, has submitted that power is being supplied to PSPCL since 27.12.2011 under the PPA dated 24.09.2008. The tariff has been determined by the Central Commission from time to time and has been paid by PSPCL and is also included in the revenue requirements of PSPCL and recovered through tariff from the consumers in Punjab State. It has further been submitted that 11 years have elapsed since the execution of the PPA, the tariff has been determined, the power purchase cost has been approved by the Commission over the years and the electricity has been supplied for the last more than 10 years. Thus, there is no occasion for any further proceedings for seeking approval of the PPA at this stage. Further, the variable cost of Pargati Power's Generating Station is below Rs. 3/kWh for FY 2020-21 which is the benchmark set by the Commission in the impugned Order. The variable costs for January 2021 and February 2021 are Rs. 1.84/kWh and 2.74/kWh respectively which are below Rs. 3kWh. Moreover natural gas based power generation has many advantages over other conventional energy sources on account of its lower impact on the environment and better economies.

4.3 Meja Urja Nigam Private Limited (MUNPL), respondent No. 03, has submitted that a Power Purchase Agreement was executed with PSPCL on 31.12.2010. As per the Ministry of Power, Govt. of India letter dated 05.10.2010, a share of 48 MW has been allocated to PSPCL. Power is being scheduled from MEJA TPS Stage-1 since 30.04.2019 and is being billed to PSPCL. The cost of Power Procurement is also included in the revenue requirements of PSPCL and recovered through tariff from the consumers in Punjab State. The PPA signed between the parties is valid till such time as the allocation of power by the Central Govt. continues. Procurers including PSPCL are bound by the Power Purchase Agreements as MUNPL had invested and established the instant generating station based on the allocation and the Power Purchase Agreements agreed to between the parties. A substantial part of the investment has been by the Government and through Public funding. Such investments made by the generating companies are to be serviced through the long term period as agreed to between the parties. The variable cost of MUNPL's plant is around Rs. 2.45 per kWh for the months of March 2021 to April 2021, which is very competitive. The components of capacity charges i.e. depreciation, interest on loan, return on equity, interest on working capital and O & M expenses of thermal stations typically start reducing from the first year onwards and reach a minimum level immediately after the 12th year when both interest on loan depreciation reduce due to complete repayment of loan and spreading of residual depreciation. The capacity charges exhibit a reducing trend and eventually after the 12th year the capacity charges are significantly lower than the 1st year. There are numerous generating stations of NTPC where the tariff at present is very low, due to the above reason and the vintage of the generating stations. The same principle will also apply in the present case.

5. **Observations and Decision of the Commission**

The Commission has examined the submissions made by PSPCL, Damodar Valley Corporation (DVC), Pragati Power Corporation Limited (PPCL) and Meja Urja Nigam Private Limited (MUNPL) in the present review petition through information submitted during the course of hearings and the arguments of Learned Counsel for various parties.

Summary of the issues raised in the review petition and observations of the Commission are as under:

5.1 **DVC (Durgapur, Bokaro and Raghunathpur Power Stations)**

PSPCL has submitted that it is consistently scheduling power from DVC generating stations and this is not limited to the paddy season alone. However, the Commission has proceeded on the assumption that PSPCL is procuring power from the said Generating Stations only during the paddy season.

The Commission observes that PSPCL has surrendered 8571 MUs and 15546 MUs during FY 2018-19 and FY 2019-20 respectively from thermal and gas power stations including power from DVC power stations. Power surrendered from DVC power plants as under:

Name of Power Plant	Power Surrendered (MU)	
	FY 2018-19	FY 2019-20
DVC Durgapur	145.04	323.98
DVC Raghunathpur	36.29	391.60
DVC Bokaro	29.03	114.62
Total	210.36	830.20

The commission notes that a substantial quantum of energy is being surrendered by PSPCL from DVC power stations which belies the claim that power from this source is consistently required throughout the year and not only in the paddy season.

5.2 The variable cost of DVC Generating Stations of Durgapur, Bokaro and Raghunathpur for FY 2019-20 is Rs. 2.87/kWh, Rs. 2.95/kWh and Rs. 2.19/kWh respectively but the Commission has proceeded on the premise that the variable charges for these DVC Generating Stations is more than Rs 3/kWh which makes it economical for PSPCL to procure power from these stations.

The Commission notes that while disallowing power from DVC's Raghunathpur, Durgapur & Bokaro Stations in para 5.4.2 (b) of Order dated 01.02.2021 in Petition 28 of 2019, the commission observed that:

> ***"PSPCL's proposal of procurement of 885.10 MW on long term basis from projects namely Meja, Pragati-III and DVC's Raghunathpur, Durgapur & Bokaro Stations at the given per unit price of Rs. 5.53, Rs. 4.82, Rs. 4.61, Rs. 4.44 and Rs. 4.39 respectively, would not be an economically viable proposition, particularly so, when much cheaper power is available in the market. As such, it would not be in the interest of consumers of the Punjab if procurement from these Stations at the indicated rates is approved. Therefore, the Commission does not think it prudent to permit the same at the indicated prices. However, the Commission observes that in some of the PPAs with these Thermal power stations, a provision exists for review after a span of 5 years. Accordingly, PSPCL shall be at liberty to approach the Commission in case it is able to renegotiate the prices to commercially viable levels."***

However the Commission has approved the PPA in respect of power stations having total per unit rate (Fixed + variable) less than Rs. 3, which shall be beneficial for substitution of power of existing stations/ vintage stations having variable cost of Rs. 3 or more.

The arguments of the respective parties have emphasized the variable cost being below Rs. 3/unit, the Commission has disallowed power at the indicated total price from DVC Power Stations which are substantially higher since cheaper power is available in the market.

Accordingly the submission of PSPCL and DVC that for disallowing power from DVC power Station, the Commission proceeded on the premise that the variable charges for the DVC Generating Station is

more than Rs 3/kWh, is incorrect. Therefore, there is no cause to review it.

6. **Pragati Power Corporation Limited (Pragati Power Station):**

In the Petition, PSPCL had indicated the rate for Pragati Power Station as Rs. 4.82 per unit. Now PSPCL has submitted that there has been a significant reduction in Gas prices, bringing the variable costs within the range of Rs 3/kWh, as prescribed by the Commission. Pragati Power has submitted that Variable cost of Pragati power for January 2021 and February 2021 are Rs. 1.84/kWh and Rs. 2.74/kWh and thus below Rs. 3/kWh, the benchmark set by the Commission.

The commission observes that it has neither prescribed nor set any benchmark of the variable cost in its Order dated 01.02.2021. However the Commission has approved the PPA in respect of power stations having total per unit rate (Fixed + variable) less than Rs. 3 per unit, which shall be beneficial for substitution of power of existing stations/ vintage stations having variable cost of Rs. 3 or more.

6.1 PSPCL has submitted that the gas-based units have faster response to load changes and higher ramp rates and are thus better suited for flexible operation. Also it has referred to excerpts from National Electricity Plan (January 2018), CERC approach paper to Tariff Regulations and CEA Report of December, 2017 regarding the Study Of Optimal Location of Various Types Of Balancing Energy Sources/Energy Storage Devices To Facilitate Grid Integration Of Renewable Energy Sources and Associated Issues citing advantages of gas power stations.

The Commission has observed that PSPCL has not put forward these aspects in its submissions in Petition No. 28 of 2019. Also PSPCL is having its own hydro power stations which may be used as and when peaking power station for flexible operation as required. There appears to be no cause to review the order.

6.2 Pragati Power has submitted that there generating station was established based on the request and commitment of consenting states including Punjab. Power is being supplied to PSPCL since 2011 and the tariff paid by PSPCL is included in their Aggregate Revenue Requirements which is being recovered from consumers through tariff. Thus, there is no need of approval of PPA as power purchase has already gone through the regulatory process.

The Commission observed in Order dated 01.02.2021 as under:

"The criterion for approval of Power Purchase and Procurement of the Distribution Licensee was first specified in the PSERC (Conduct of Business) Regulations, 2005 and then in the PSERC (Power Purchase and Procurement Process of Licensee) Regulations, 2012. Accordingly, for obtaining approval of its long term Power Purchase arrangement PSPCL was required to file a specific petition containing a clear and concise statement of the facts with material particulars justifying the need/necessity, reasonability of cost and economic viability of the same as per the provisions of these Regulations, as done now vide the instant petition".

As such, the Commission has already considered the need/necessity of power and reasonability of cost with the objective of making available secure and reliable power supply at economically viable tariffs to the consumers.

Also, contrary to the agreement professed by the respondent Pragati Power that the PPA already has regulatory approval since

the cost is reflected in the ARR approved by the Commission, the Commission asserts that provisional approval of projections for procurement of power in the annual Tariff Orders for the distribution utility cannot be construed to be an approval of the PPA, as intended in Section 86(1)(b) of the Act. At the most it can be attributed as approval of projections of cost and quantity of purchase of power for that one year.

Accordingly, the Commission stands by its earlier order and finds no cause to review it.

7. **Meja Urja Nigam Private Limited (MUNPL) (Meja Power plant)**

7.1 PSPCL submitted that the allocation of power in respect of Meja power plant was done by MoP on 05.10.2010 and accordingly PPA was signed by PSPCL on 29.12.2010. Since the PPA has been signed between the parties, the same is valid between the parties, subject to de-allocation by the Central Government.

The Commission in its Order dated 01.02.2021 observed that:

"5.3 PSPCL has further averred that, in respect of the Central Generating Stations (CGSs) the PPAs entered into are pursuant to the allocation done by the Central Government. And, PSPCL being an allottee of the power from the CGSs by the decision of the Central Government is bound to avail the said power. PSPCL also referred to various judgments of the Hon'ble Courts regarding the liability to comply with the provisions of the PPAs including their obligations to sign the LTA Agreement and liability to pay the transmission charges.

The Commission observes that, the allocation by Central Government is based on the demand raised by States/Union Territories at the instance of their utilities. And, this allocation gets confirmed/implemented only on signing of the PPA by the

beneficiary. Also, the liability as enjoined in the various judgments of the Hon'ble Courts referred by PSPCL comes into force only after signing of the PPA."

The Commission notes that PSPCL submissions also refers that allocation was subject to the signing of PPA. Thus, allocation made has been confirmed by the utility by signing the PPA which was at the instance of the utilities otherwise that power would have been reallocated to the other beneficiaries.

7.2 MUNPL has submitted that their Generating Station has been established based on the allocation made by GoI and the power purchase agreements between the parties with substantial investment. PSPCL is getting power for the last two years and power purchase cost is being approved by the Commission.

The Commission observed in Order dated 01.02.2021 as under:

"The criterion for approval of Power Purchase and Procurement of the Distribution Licensee was first specified in the PSERC (Conduct of Business) Regulations, 2005 and then in the PSERC (Power Purchase and Procurement Process of Licensee) Regulations, 2012. Accordingly, for obtaining approval of its long term Power Purchase arrangement PSPCL was required to file a specific petition containing a clear and concise statement of the facts with material particulars justifying the need/necessity, reasonability of cost and economic viability of the same as per the provisions of these Regulations, as done now vide the instant petition".

As such, the Commission has already considered the need/necessity of power and reasonability of cost with the objective of making available secure and reliable power supply at economically viable tariffs to the consumers.

Also, the provisional approval of projections for procurement of

power in the annual Tariff Orders for the distribution utility cannot be construed as approval of the PPA, as intended in Section 86(1)(b) of the Act. At the most it can be considered as approval of requirement and quantity of purchase of power for that one year.

Accordingly, the Commission stands by its earlier order and finds no cause to review it since the indicated price from Meja Power is quite high and cheaper power is available in the market.

7.3 MUNPL has submitted that capacity charges exhibit a reducing trend. After the 12th year, the capacity charges are significantly lower than in the 1st year of Tariff on account of repayment of loans and fall in cost of depreciation. Only nominal increase in O&M expenses is indicated due to escalation.

The Commission has already given PSPCL the liberty to renegotiate viable rates for the power plants including MUNPL and seek the Commission's approval.

Keeping in view the above facts the Commission finds that review petition is without any merit and is accordingly dismissed

Sd/-	Sd/-	Sd/-
(Paramjeet Singh)	(Anjuli Chandra)	(Viswajeet Khanna)
Member	Member	Chairperson

Chandigarh
Dated: 06.09.2021