

***Summary of Aggregate Revenue Requirement (ARR)
and Determination of Bulk Supply Price (BSP) Filings***

Submitted by

GRIDCO

For

FY-2024-25

Summary of GRIDCO ARR & BSP Filings for FY 2024-25

1. GRIDCO Limited (hereinafter called as 'GRIDCO') is a Deemed Trading Licensee under the 5th Proviso to Section 14 of the Electricity Act, 2003. GRIDCO, a wholly State-owned Company, is engaged in the business of purchase of electricity in bulk from various generators located inside Odisha and the State share of power from the Central Generators for supply in bulk to the four Electricity Supply Companies (hereinafter called as 'DISCOMs') for onward retail sale to the end consumers of the State. GRIDCO also supplies emergency power to the Captive Generating Plants (CGPs) and trades the surplus power, if any, from time to time.
2. Under the existing Bulk Supply Agreements between the DISCOMs and GRIDCO, the DISCOMs are to purchase power from GRIDCO at a regulated price to be determined by the Commission. The Commission is empowered under section 86 (1) (a) and (b) of the Electricity Act, 2003 to determine the power procurement price of the DISCOMs. This procurement price of DISCOMs incidentally happens to be the Bulk Supply Price at which GRIDCO supplies power in bulk to the DISCOMs. Thus, as a statutory requirement, as provided in the OERC (Conduct of Business) Regulations, 2004 & other related Regulations and as per Section 86 (1) (a) & (b) & other applicable provisions of the Electricity Act, 2003, GRIDCO is required to submit its Annual Revenue Requirement before OERC for determination of the power procurement cost of the DISCOMs. In this above backdrop, GRIDCO has filed an application for approval of its proposed Annual Revenue Requirement (ARR) and revision of Bulk Supply Price (BSP) for the FY 2024-25 to enable it to carry out its functions of bulk supply to DISCOMs.

Projection of Demand for FY 2024-25

3. The Simultaneous Maximum Demand (SMD) of DISCOMs for the FY 2024-25 has been projected by GRIDCO as 6740 MVA based on the data received from the DISCOMs which has been estimated considering the maximum SMD observed during the period from April' 23 to September' 23 period and the additional load growth as estimated for the FY 2024-25 over FY 2023-24 for each DISCOM. The maximum SMD recorded during first six months of FY 2023-24 and DISCOMs projection for FY 2024-25 as submitted by GRIDCO in its BSP and ARR application are given in table below.

Table: 1

Projection of Simultaneous Maximum Demand (SMD) for FY 2024-25 (MVA/Month)

DISCOMs	OERC approval for 2023-24	Highest SMD recorded during FY 2023-24 (Apr.'23 to Sept'23)	DISCOMs Projection of SMD for FY 2024-25
	MVA	MVA	MVA
TPCODL	2190	2244	2583
TPNODL	1280	1267	1394
TPWODL	1860	1676	1900
TPSODL	760	711	862.76

4. GRIDCO has submitted that the projected SMD seems to be higher as compared to the actual occurrence in the summer months of the current financial year. Moreover, the rate of increase in the SMD is much higher to the energy requirement of the State DISCOMs for FY 2024-25. GRIDCO has requested the Commission to approve the monthly SMD considering the actual SMD of the DISCOMs as per SLDC data for the FY 2023-24 and the additional increase proportionate to the increase in energy demand on monthly basis during FY 2024-25.

Quantum of Energy Requirement

5. The total energy requirement of the State projected by GRIDCO for FY 2024-25 is 37457 MU consisting of 36263 MU for sale to DISCOMs, 70 MU towards emergency power supply to captive generating plants (CGPs) and 1124 MU towards Transmission Loss @ 3.0%. The energy requirement vis-a-vis the availability to GRIDCO from various sources during FY 2024-25 is shown in the table below.

Table: 2

Projected Energy Requirement of GRIDCO for FY 2024-25

Sl. No.	Particulars	Projection for FY 2024-25 (MU)
1	Energy Demand of DISCOMs and emergency sales	36333
2	Transmission Loss @ 3% as approved for FY 2023-24	1124
3	Energy Required to be purchased by GRIDCO to meet the energy demand of DISCOMs & CGPs	37457
4	Energy available to GRIDCO from various sources	39652
5	Surplus power	2195

Energy Availability to GRIDCO during FY 2024-25

6. GRIDCO has projected energy availability of 39652.15 MU during FY 2024-25 from different generating stations considering the Generation plan shared by respective stations, PLF and synchronization issues etc. However, considering application of merit order dispatch (MoD), GRIDCO has estimated procurement of 37456.22 MU for State consumption. The station-wise details of availability of power to GRIDCO during FY 2024-25 along with available surplus power are given in the table below.

Table: 3

Summary of Proposed Energy Availability to GRIDCO for FY 2024-25

Station Name	Energy Available (MU)
HHEP	717.19
CHEP	301.72
Rengali	850.40
Upper Kolab	581.07
Balimela	1192.33
Sub-Total (OHPC OLD)	3642.71
Upper Indravati	1396.46
Total OHPC	5039.17
Machkund	259.88
Total State Hydro	5299.05
OPGC (1& 2)	2447.98
OPGC (3& 4)	9236.11
Small Hydro	468.70
Biomass	70.00
Wind	1091.92
Solar	1950.00
CGPs and Co-generation Plants	0.00
IPPs (as per MoD)	4829.27
Total State	25393.03
TSTPS-I	2233.89
TSTPS-II	1336.46
FSTPS-I&II	
FSTPS-III	
KhSTPS-I	
KhSTPS-II	
DSTPS-I	5207.20
Barh-I	410.64
Barh-II	
MTPS-II (Kanti Bijli)	171.70
Nabinagar STPS-I	105.26
North Karanpura STPS-I (U#1, #2)	1932.05
Central Thermal Availability as per MoD	11397.20

Station Name	Energy Available (MU)
Chukha	256.00
TALA	116.00
Mangdechhu	287.00
Teesta	0.00
Rangit	6.00
Kiruchu	1.00
Total Central Hydro Availability	666.00
Power Purchase to meet State demand as per MoD Principle	37456.22
Surplus power	2195.93
Total energy availability	39652.15

Power Purchase Cost Projected for FY 2023-24

7. GRIDCO has proposed to procure 37456.22 MU of estimated energy during FY 2024-25 to meet the state demand. The detailed cost of power purchase as furnished by GRIDCO for FY 2024-25 is reproduced hereunder in table.

Table:4

Summary of Proposed Power Procurement Cost during FY 2024-25

Station Name	Energy Available (MU)	Total Cost (Rs. Cr.)	Per unit Cost (P/U)
HHEP	717.19	94.23	131.39
CHEP	301.72	39.30	130.25
Rengali	850.40	72.18	84.88
Upper Kolab	581.07	66.25	114.01
Balimela	1192.33	94.61	79.35
Sub-Total (OHPC OLD)	3642.71	366.57	100.63
Upper Indravati	1396.46	171.08	122.51
Total OHPC	5039.17	537.65	106.69
Machkund	259.88	32.13	123.63
Total State Hydro	5299.05	569.78	107.52
OPGC (1& 2)	2447.98	725.55	296.39
OPGC (3& 4)	9236.11	3210.59	347.61
Small Hydro	468.70	199.17	424.94
Biomass	70.00	53.20	760.00
Wind	1091.92	305.55	279.83
Solar	1950.00	720.02	369.24
CGPs and Co-generation Plants	0.00		
IPPs (as per MoD)	4829.27	1454.62	301.21
Total State	25393.03	7238.48	285.06
TSTPS-I	2233.89	699.78	313.26

Station Name	Energy Available (MU)	Total Cost (Rs. Cr.)	Per unit Cost (P/U)
TSTPS-II	1336.46	397.96	297.77
FSTPS-I&II		20.06	
FSTPS-III		107.27	
KhSTPS-I		10.17	
KhSTPS-II		34.87	
DSTPS-I	5207.20	1612.18	309.61
Barh-I	410.64	376.59	917.08
Barh-II		28.24	
MTPS-II (Kanti Bijli)	171.70	110.59	644.09
Nabinagar STPS-I	105.26	50.79	482.52
North Karanpura STPS-I (U#1, #2)	1932.05	696.56	360.53
Central Thermal Availability as per MoD	11397.20	4145.06	363.69
Chukha	256.00	79.54	310.70
TALA	116.00	27.27	235.09
Mangdechhu	287.00	124.55	433.97
Teesta	0.00	0.00	
Rangit	6.00	2.46	410.00
Kiruchu	1.00	0.24	240.00
Total Central Hydro Availability	666.00	234.06	351.44
PGCIL Transmission Charges		1018.03	
ERLDC Charges		3.50	
Power Purchase to meet demand as per MoD Principle	37456.22	12639.14	337.44
Variable charges of surplus power	2195.93	720.68	328.19
Total energy availability	39652.15	13359.82	336.93

8. GRIDCO has requested the Commission to approve the fixed charges as payable by GRIDCO to the generating stations for all the existing and the upcoming new stations, which should be recovered from DISCOMs through BSP for the ensuing FY 2024-25.

Additional Power Purchase Cost during FY 2024-25

9. GRIDCO has requested to consider the claim of Rs.760.99 Crore as additional power purchase cost during FY 2024-25 for payment to be made for STU/ scheduling charges and safeguard duty for procurement of RE power, Secondary Fuel Oil Cost of OPGC,

reconciliation of cost of power of Vedanta Ltd for the period from FY 2010-11 to FY 2020-21, Reimbursement of Electricity Duty of M/s GMR , Pay regularization impact of Teesta-V, Allocation of re-allocated power from Central Generating Stations and Bhutan HPS, advance payment of working capital of Machhkund HEP, fixed cost and additional O&M of NTPC stations, enhanced power purchase cost of Chukha HEP, additional cost of PGCIL and additional cost towards Interest on OHPC Securitised Dues from July, 2023 to March, 2024.

Special Appropriation for Loan Repayment Liabilities

10. GRIDCO has requested the Commission to consider the huge outstanding receivable from the erstwhile DISCOMs vis-a-vis its obligations for settlement of outstanding loans to the lending institutions /Banks. As per GRIDCO, it has outstanding loan liability of Rs.6513 Cr. as on 30.09.2023. Thus, GRIDCO has requested the Commission to issue suitable advisories /directives for collection of arrears by DISCOMs towards settlement of outstanding dues and also to frame suitable mechanism for recovery of the balance amount through regulatory process preferably in next two to three years.

Interest, Financing and Other expenses

11. GRIDCO has proposed to incur about Rs 564.49 Crore during the FY 2024-25 towards expenses on account of interest and financial charges including interest on OHPC securitised dues, depreciation, Employees Cost, A&G Expenses etc. GRIDCO has proposed Rs.22.30 Cr towards employee cost for FY 2024-25. Further, Rs.0.98 Cr and 17.19 Cr has been proposed for repair & maintenance cost and administrative & general expenses respectively.
12. GRIDCO has submitted that total interest and finance charges for FY 2024-25 is estimated to be Rs 521.55 Crore based on existing loan liabilities along with securitized dues to be paid to OHPC. GRIDCO submitted that the reasons for borrowing working capital loans in the past were predominantly due to non-cost reflective BSP, delay in truing up exercise, disallowances of carrying cost on regulatory assets in the past period, huge outstanding receivables from erstwhile DISCOMs and mandate to supply power as “State Designated entity” irrespective of recovery of uncontrollable cost from sale of power to State DISCOMs as approved in the ARR. Further, GRIDCO has borrowed working capital loan for timely payment of power purchase dues in order to avail rebate from generators and also to reduce its late payment surcharge obligations, the benefit of

which is ultimately passed on to end consumers. GRIDCO submitted that the cost of raising the fund to earn the rebate, resulted in avoiding the late payment surcharge, needs to be considered by the Commission in the ARR.

13. GRIDCO has further submitted that in view of interim order of the Commission dated 23.05.2023 (Petition No 35/2023), an amicable settlement was agreed upon in the meeting held on 26.06.2023 regarding OHPC Securitized dues under the Chairmanship of Additional Chief Secretary, Energy Department. The Commission has approved the settlement in the final order in Case No. 35/2023 dated 11.07.2023. GRIDCO has submitted that considering the settlement process, total interest payable on settlement of OHPC Securitized dues for FY 2024-25 comes to Rs 134.03 crore and requested the Commission to consider the same favourably.
14. The interest & finance charges and other expenses claimed by GRIDCO in its ARR application for FY 2024-25 is summarised in the table below:

Table: 5
Interest, Financing & Other expenses for FY 2024-25 (Rs. Crore)

Particulars	GRIDCO proposal for FY 2024-25
1. Interest & Financial Charges	521.55
2. Other Costs:	
a. Employee Cost	22.30
b. A & G Cost	17.19
c. Repair & Maintenance Cost	0.98
3. Depreciation	2.47
Total (1+2+3)	564.49

Other Income / Miscellaneous Receipts

15. GRIDCO has submitted that it expects to earn an amount of Rs. 52.22 Crore during FY 2024-25 from the proposed sale of emergency power (70 MU) to long term customers like NALCO and IMFA at the existing approved emergency power rate of Rs.7.46 /kWh.

Receivable from DISCOMs and other parties

16. GRIDCO has submitted that there is a substantial outstanding amount of Rs. 6707.41 Cr. receivable from erstwhile distribution companies as of 30.09.2023. There is no scope for recovery of the arrear dues from the erstwhile Utilities due to vesting of the license along with business operations with the new DISCOMs. The Commission in the vesting order has issued directives for collection of arrears by the new DISCOMs and the DISCOMs

to fulfil the minimum commitment amount as envisaged in the vesting order. The Commission notified the OTS for recovery and settlement of outstanding dues from the defaulting consumers for onward settlement with GRIDCO against past dues receivable from erstwhile DISCOMs/Utilities. However, there is still huge outstanding to be collected from the consumers of the erstwhile utility period which are continuing in the consumers ledger. GRIDCO has requested the Commission to issue suitable advisories /directives for collection of such arrears by DISCOMs towards settlement of outstanding dues of GRIDCO and also to frame suitable mechanism for recovery of the balance amount by GRIDCO through regulatory process preferably in next two to three years.

Aggregate Revenue Requirement (ARR)

17. The proposal for Annual Revenue Requirement of GRIDCO for FY 2024-25 is summarized in the table below:

Table:6
Aggregate Revenue Requirement for FY 2024-25

Particulars	Amount (Rs Cr.)
Power Purchase cost as per MOD for State requirement	12639.14
Additional Power Purchase Cost	760.99
Interest & Finance cost	521.55
Employee cost	22.3
Repair & Maintenance	0.98
Administrative and General Expenses	17.19
Depreciation	2.47
Aggregate Revenue Requirement (ARR)	13964.62
Less: Revenue from Emergency sales of 70 MU	52.22
Net Aggregate Revenue Requirement (ARR)	13912.40
Revenue from DISCOMs at existing BSP of respective DISCOMs including Surcharge @30 P/U from TPWODL	12184.08
Units to be sold to DISCOMs (MU)	36,263
Revenue Deficit at existing BSP of respective DISCOMs	(1728.32)

Proposal for Revision of Bulk Supply Price for FY 2024-25

18. GRIDCO has estimated that it would suffer revenue deficit of Rs. 1728.32 Crore considering the proposed net ARR of Rs. 13912.62 Crore and the revenue of Rs.12184.08 Crore to be earned from sale of the proposed energy of 36263 MU to DISCOMs during FY 2024-25 at the existing BSP Rate for FY 2023-24. In order to meet the above estimated revenue deficit during FY 2024-25, GRIDCO has submitted before the Commission for upward revision of Bulk Supply Price for the FY 2024-25. GRIDCO has proposed the revised average BSP of 383.66 P/U to recover the Net Revenue Requirement of Rs.13912.40 Crore through energy charge only as given in the table below.

Table:7
Proposed Bulk Supply Price (BSP) for FY 2024-25

SL. NO.	COMPONENTS	Proposed ARR and BSP for FY 2024-25
1	Net ARR to be recovered through BSP (Rs Crore)	13912.40
2	Units to be sold to DISCOMs Utilities (MU)	36263
3	Proposed Average BSP to recover the Net Total Aggregate Revenue (P/U) [A*1000/B]	383.66

Other Allied Submissions to Facilitate GRIDCO for Recovery of its Expenses

Demand Charges for excess SMD

19. The maximum permitted SMD is proposed to be revised from the existing allowable limit of 110 % to 105 % of the approved annual SMD. The Demand Charge @ Rs.250/KVA/Month is proposed to be levied from DISCOM Utilities on the excess SMD only when the actual SMD of a DISCOM in a month exceeds the permitted monthly SMD (105 % of the approved SMD). Further, Such Demand Charges shall not be adjusted at the end of the year even if the actual monthly SMD remains within the permitted monthly SMD in any other month(s) of the same financial year.

Over Drawl Charges

20. The Charges for Overdrawal of Energy payable by DISCOM Utilities are presently billed on month-to-month basis (at the corresponding OERC approved applicable BSP in terms of the Judgment dated 07.05.2018 of the APTEL passed in Appeal No.55 of 2015, till intra-State DSM Regulations is pronounced by OERC and implemented in the State). GRIDCO propose that this practice may be continued till Deviation Settlement Mechanism (DSM)

Regulation is pronounced. Further, GRIDCO requests the Commission to reduce the existing monthly drawl limit from 110 % to 105 % of the monthly approved SMD for the DISCOMs for recovery of charges on account of any excess drawl of energy during a month over the approved quantum.

Fuel and Power Purchase Adjustment Surcharge (FPPAS)

21. FPPAS is the increase in cost of power supplied to the Distribution Licensee(s), due to increase in fuel cost, fixed cost, year-end charges, transmission charges, etc. with respect to cost of power purchase approved by the Commission in the ARR of the respective financial year. Such Surcharge is to be computed and raised by GRIDCO, if actual cumulative average monthly power purchase cost per unit (Rs/kwh) exceeds 3% of the approved average Power Purchase Cost per unit (Rs/kWh) in the ARR order of the Commission for the corresponding year. GRIDCO shall raise the bill for FPPAS on the Distribution Licensee(s) in the nth month at a uniform rate and in any month shall not be more than Rs 0.20/kWh (20 paise /unit). The unrecovered FPPAS in any month shall be considered at the time of truing up.

Rebate

22. GRIDCO has proposed that on payment of the current monthly bills, the Distribution and Retail Supply licensees (DISCOMs) shall be entitled to:
- a. A rebate of 1.5 %, in case the DISCOMs make payment within 5 working days of serving of the BSP invoice by GRIDCO.
 - b. A rebate of 1%, in case DISCOMs make payment on any day after five (5) working days and within a period of twenty-five (25) days of serving of the BSP invoice by GRIDCO.
 - c. No rebate, if the DISCOMs have not paid the current month's BSP dues in full within a period of 25 days of serving of the BSP invoice by GRIDCO.

Delayed Payment Surcharge (DPS)

23. For delayed payment of Bulk Power Supply Bills i.e., payment after the period of 30 days from the date of submission of bills, the surcharge is to be levied @ 1.50% per month.

Duty and Taxes

24. The Electricity Duty levied by the Government of Odisha and any other statutory levy/ Duty/ Tax/ Cess / Toll etc. imposed under any law from time to time shall be charged over and above the Bulk Supply Price.

Prayer

25. GRIDCO has prayed before the Commission to approve the following for FY 2024-25 and make the same effective from 1st April, 2024:
- (a) Consider all reasonable and uncontrollable costs as proposed in the Petition and accordingly, approve the ARR and Bulk Supply Price (BSP) for FY 2024-25 and make the same effective from 1st April 2024;
 - (b) Approve monthly Simultaneous Maximum Demand (SMD) and monthly quantum of energy for sale to each of the DISCOMs on realistic basis in lieu of the prevailing practices on annual basis;
 - (c) Approve the Capacity Charges mandatorily payable by the Petitioner GRIDCO to the different generating stations i.e. for all existing and new stations with whom it has long term PPAs notwithstanding that the energy is not fully scheduled from stations based on Merit Order Dispatch (MoD) principles and change in demand trend of the State. Such uncontrollable costs/charges need to be recovered through BSP;
 - (d) Allow the carrying cost on Regulatory Assets and amortization of the Regulatory Asset through BSP;
 - (e) Allow recovery of the additional cost/s due to over-drawal of energy, Fuel Price Adjustment/Surcharge Adjustment, on account of any other statutory increase/s, reimbursement of Electricity Duty/ Water Cess levied by the Government of Odisha and any other Statutory levy/ Duty/ Taxes, etc. if any, be passed on to GRIDCO;
 - (f) Allow recovery of costs on account of the orders issued by OERC / CERC / APTEL / Hon'ble Apex Court/Hon'ble High Court / Impact due to any Change In Law/Dispute Resolution/Tariff revision/Truing Up, etc. on quarterly basis;
 - (g) Allow the Petitioner GRIDCO for recovery of charges on account of any excess drawl of energy by Distribution Companies (DISCOM) during a month over and above the monthly approved energy quantum at additional power purchase cost incurred for excess drawl or market price whichever is higher;
 - (h) Formulate suitable monthly controlling measures by revising the existing limit of drawal of SMD i.e. from 110% to 105% of the approved monthly SMD for

DISCOMs for recovery of charges on account of any excess drawl of energy during a month over and above the monthly approved energy quantum.

- (i) Consider to amend the TOD Tariff in the State as proposed by the petitioner so as to incentivize the industries and other consumers for use of power during off peak hours and curb the consumption during peak hours for optimal utilization of the state's share of power within the costs approved by the Hon'ble Commission in the ARR;
- (j) Approve the proposed TOD tariff (RST) in the State so as to incentivize the industrial and commercial tariff for electricity consumption during the off peak hours and with a higher tariff during peak hours as per the guidelines issued by Govt. of India so as to manage the State peak demand without resorting to availing power from DSM pool and the Power exchanges at high cost;
- (k) Direct the DISCOMs to undertake proactive measures to collect the outstanding dues from the defaulting consumers and pay GRIDCO's share of past arrear collection on monthly basis and also to submit monthly MIS reports;
- (l) Formulate a suitable mechanism to recover the shortfall towards erstwhile DISCOMs' receivable of **Rs. 6,707.41 Cr.** as on **30.09.2023**, arising out of sale of utilities of CESU, WESCO, NESCO and SOUTHCO through regulatory process preferably in the next two to three years;
- (m) Approve the finance cost on loans availed by GRIDCO as per the Hon'ble Supreme Court of India's Order in C. A. No. 414 of 2007 dated 05.10.2023;
- (n) Consider the submission as per the directives of Hon'ble Commission and allow the uncontrollable costs towards the disallowances made by the Hon'ble Commission in Case No. 68 of 2023 in respect of the review of ARR & BSP order for FY 2023-24 and the Truing up order for FY 2021-22.
- (o) Consider to apportion the premium on sale of green power by DISCOMs to the consumers in the ratio of 80:20 between the petitioner and the DISCOMs towards Green Consumer Certificate for 100% consumption of RE power.
- (p) Allow the petitioner to make additional submissions pertaining to this petition;

- (q) Pass such order which are necessary to meet the above prayers and allow the Petitioner GRIDCO to amend / modify the application as necessary and make further submissions if any, during the course of hearing; and
- (r) Consider to condone any inadvertent omissions/ errors/ shortcomings/ delays and allow to make further submissions, as may be required at a future date to support this Petition in terms of modification / clarification (if any).
