TAMIL NADU POWER DISTRIBUTION CORPORATION LTD.

ABSTRACT

Electricity - Trichy Region – Pudukottai EDC - Power evacuation of 4.8 MW from waste heat recovery based Co-gen power plant of 6 MW capacity of M/s.Sabari Industries Pvt. Ltd., by erecting a separate 11 kV feeder with Dog conductor from the plant to the existing T.Nallur 110/33-11 kV SS by the Generator - Administrative approval - Accorded.

TECHNICAL BRANCH

(Per). MD.TNPDCL Proceedings No.04 Dated: 23.01.2026.
Visuvaavasu Varudum,
Thai: 09,
Thiruvalluvar Aandu 2057.

READ: Chairman Cum Managing Director's approval dated 21.01.2026.

PROCEEDINGS:

1. The Tamil Nadu Power Distribution Corporation Limited hereby approves the proposal for power evacuation of 4.8 MW from waste heat recovery based Co-gen power plant of 6 MW capacity of M/s.Sabari Industries Pvt. Ltd., by erecting a separate 11 kV feeder with Dog conductor from the plant to the existing T.Nallur 110/33-11 kV SS by the Generator in Pudukottai EDC of Trichy Region and for collection of establishment & supervision charges along with GST amounting to Rs.7.47 Lakhs and applicable charges from the above Generator. The detailed estimate and report are annexed to these proceedings.

2. The expenditure is chargeable to the Generator is Rs.7.47 Lakhs which is to be collected and accounted under the Head 2090132 (Other deposit from Consumers) for Rs.6.33 Lakhs and 2090320 (SGST) for Rs.0.57 Lakh and 2090319 (CGST) for Rs.0.57 Lakhs.

3. The expenditure is chargeable to TNPDCL Rs (-2.62) Lakhs – Capital expenditure - Pudukottai EDC – A/c No.1070107.

4. By virtue of the provisions contained in sub-section (2) (a) of section 185 of the Electricity Act, 2003, the TNPDCL being the Licensee and successor entity of Tamil Nadu Electricity Board will exercise the powers of the Telegraph Authority under the

provisions of section 164 of the Electricity Act, 2003, which have already been conferred upon the Board under section 51 of the Indian Electricity Act, 1910.

// BY ORDER OF THE CMD//

J.PUSHPALATHA
CHIEF ENGINEER/PLANNING & RC

Encl: Report and detailed estimate.

To
The Chief Engineer/Distn./Trichy Region.

Copy to:

The Director/Distribution/TNPDCL/Chennai-2
The Director/Finance/TNPDCL/Chennai-2
The Chief Engineer/PPP/Chennai -2
The Superintending Engineer/Pudukottai EDC.
The Superintending Engineer/RE&I(D)/Chennai-2
The Company Secretary/TNPDCL/Chennai-2.
The Resident Audit Officer (AGO'S Unit) / Chennai –2
B.P.Section (Administrative Branch)
Stock file

//FORWARDED BY ORDER//

29/01/26

EXECUTIVE ENGINEER/MASTER PLAN II

Enclosure to (Per). MD.TNPDCL Proceedings No.04, dated: 23.01.2026.

REPORT TO ACCOMPANY THE ESTIMATE

This proposal envisages power evacuation of 4.8 MW from waste heat recovery based Co-gen power plant of 6 MW capacity of M/s.Sabari Industries Pvt. Ltd., by erecting a separate 11 kV feeder with Dog conductor from the plant to the existing T.Nallur 110/33-11 kV SS by the Generator in Pudukottai EDC of Trichy Region and for collection of establishment & supervision charges along with GST amounting to Rs 7.47 Lakhs and applicable charges from the above Generator.

NEED:

M/s.Sabari Industries Pvt. Ltd., is a HT consumer with a sanctioned demand of 600 KVA at 11 kV voltage level. At present, the supply is being extended to the above consumer through 11 kV Harihar feeder of T.Nallur 110/33-11 kV SS.

M/s. Sabari Industries Pvt. Ltd. was running their 6 MW generation power plant and their 11 kV grid connectivity sanctioned on 27.11.2006 was withdrawn in 2012 due to major technical issues and financial constraints.

Now, they has proposed to restart their 6 MW Co-gen Power plant and has requested new 11 kV grid connectivity for an initial maximum generation of 3.2 MW and evacuation of 2.5 MW after accounting for internal consumption, with a future increase upto 4 MW – 4.8 MW.

Load flow study was conducted for the network condition for the year 2025-26 for evacuation of 4.8 MW Power generation from M/s. Sabari Industries Pvt. Ltd. and it is observed that the line/transformer loadings are found to be normal. It has been suggested that 4.8 MW power can be evacuated from M/s.Sabari Industries Pvt. Ltd. to TANTRANSCO Grid through the proposed dedicated feeder from their plant to T.Nallur 110/33-11 kV SS.

Subsequently, grid connectivity approval was accorded by CE/PPP vide Lr.No.CE/PPP/SE/IPP/EE/CPP/AEE2/F.M/s.Sabari CF.vol 1/D.282/25, dt.11.08.25 to erect 11 kV Separate/dedicated feeder/line for a distance of 4.3 kms. from their plant to T.Nallur 110/33-11 kV SS with certain specific conditions as per TNERC's Regulation.

Accordingly, the company had executed Power Evacuation Scheme Agreement towards the same with TNPDCL.

Now, the proposal towards the erection of 11 kV line with Dog conductor from the plant to the existing T.Nallur 110 kV SS for a distance of 4.3 kms. with necessary metering arrangements, data communication system etc., by the Generator has been evolved to determine the establishment & Supervision charges.

In this regard, it is to be stated that the 11 kV bay extension & allied works at T.Nallur 110/33-11 kV SS is to be executed by TANTRANSCO since T.Nallur 110/33-11 kV SS being a TANTRANSCO Sub-Station.

The Chief Engineer/Distribution/Trichy may be requested to ensure the collection of applicable charges as per grid connectivity approval accorded and as per the TNERC norms/ existing rules in TNPDCL from M/s.Sabari Industries Pvt. Ltd.

Further, it has to be ensured by the concerned field officials that the civil and electrical works are executed by the company as per TNPDCL standards adopting all safety measures.

The Chief Engineer/Distn./Trichy Region has reported that the proposed 11 kV dedicated feeder will be linked with the existing main & check metering structure. However, the existing metering set in the main and check metering point at plant end is to be enhanced from 40/5A to 300/5A and provision towards replacement of the same has been made in the estimate.

Further, the Chief Engineer/Distn./Trichy Region has made provision towards Main & Check meter at Generator end and Main, Check & standby meter at T.Nallur 110 kV SS end. Since, both Main & Check meters are proposed to be provided at both Generator end & Substation end for energy accounting, provision of standby meter along with metering set at SS end is not necessary. Hence, the same has been deleted from the scope.

In this regard, it is to be stated that the CE/D/Trichy Region has evolved the estimate on DCW basis chargeable to Capital Expenditure. As the proposed 11 kV line is to be erected by the Generator under section 10(1) and the ownership of the same lies with the Generator, the estimate has been evolved as improvement works and establishment & supervision charges to be collected has been arrived based on the same.

Details of work:

Scope of the company:

- Erection of 11 kV feeder with Dog conductor from the plant to T.Nallur 110/33-11 kV SS for a distance of 4.3 kms.
- Provision of Metering set, Main & Check meter at Plant end.
- Provision of 11 kV DP structure, Metering set, Main & Check meter at T.Nallur 110 kV SS end.
- Provision of communication system.

Scope of TNPDCL:

- Dismantling of existing 11 kV metering set, HT TOD meters and portion of the 11 kV OH line presently feeding to M/s.Sabari Industries Pvt. Ltd. for a distance of 30 mtrs.

29/01/26

EXECUTIVE ENGINEER/MASTER PLAN II

ESTIMATE FOR POWER EVACUATION OF 4.8 MW WASTE HEAT RECOVERY CO GEN POWER PLANT OF CAPACITY 6 MW OF M/s.SABARI INDUSTRIES PVT. LTD. IN PUDUKOTTAI EDC OF TRICHY REGION

Part I : New Asset Chargeable to Capital — **Rs.in Lakhs** | **Rs in Lakhs**

Sl No	Description	Quantity		Rate	Per	Company execution	Chargable to consumer
1	Erection of 11 kV OH line with Dog conductor from Generator end to the extg. T.Nallur 110/33-11 kV SS (Ann - I)	4.3	kms.			33.617	
2	Main & Check meter with metering set at T.Nallur 110 kV SS end (Ann-II)					2.578	
3	Main & Check meter with metering set at Plant end (Ann-III)					3.417	
4	DP structure at SS end (Ann IV)	1	Loc			1.730	
5	**Sub Total**					41.342	
6	Add dismantling charges						0.131
7	Estt & Supervision charges @15%						6.201
8	Sub Total						6.333
9	GST @18%						1.140
10	**Total Gross**						**7.47**
11	**Credt to TNPDCL**						**2.62**

Part I (a) : Dismantling Charges

1 Dismantling Charges **0.131** **Lakhs**

Part II: Accumulated Depreciation Charges

Sl. No	Description	Qty	Original cost of asset in lakhs	Full life period	useful life period	Acc.Dep = 0.9*(col.4*col.6/col.5)
1	3 phase 4 wire HT static tri vector meter 110 V/5A with TOD - DLMS , 0.2 S accuracy with ABT future (Main & Check meters) *	2	0.800	25	1	0.029
2	11 kV Metering set 40/5A	2	1.802	25	1	0.065
3	Dog Conductor	0.03	0.022	35	19	0.011
4	**Total**		2.624			0.104

ESTIMATE FOR POWER EVACUATION OF 4.8 MW WASTE HEAT RECOVERY CO GEN POWER PLANT OF CAPACITY 6 MW OF M/s.SABARI INDUSTRIES PVT. LTD. IN PUDUKOTTAI EDC OF TRICHY REGION

Part III Devolution of old equipment to store

Part III = Part IV - Part II = 2.624 - 0.104 = **2.52** lakhs

Part IV Removal of old assets Charges

Sl. No	Description	Qty	Original cost in lakhs	Original erection charges 10%	Original centage 15%	Original cost of asset in lakhs
1	3 phase 4 wire HT static tri vector meter 110 V/5A with TOD - DLMS , 0.2 S accuracy with ABT future (Main & Check meters) *	2	0.633	0.063	0.104	0.800
2	11 kV Metering set 40/5A *	2	1.425	0.142	0.235	1.802
3	Dog Conductor **	0.03	0.017	0.002	0.003	0.022
4	Total					**2.624**

* Rate as per cost data 2024-25 has been adopted
** 50% of present cost data rate has been adopted.

Abstract

	Rs. In Lakhs
Part I: Chargeable to Generator	**7.47**
Part I (a):Dismantling charges Charges	0.13
Part II: Accumulated Depreciation Charges	0.10
Part III :Devolution of old equipment to store	2.52
Part IV :Removal of old assets Charges	2.62

29/01/26

Executive Engineer/Master Plan II

ANNEXURE I

EXTENSION OF 11 KV LINE WITH ACSR 6/4.72 MM AND 7/1.57 MM DOG CONDUCTOR FROM PLANT TO THE EXISTING T.NALLUR 110 kV SS FOR A DISTANCE OF 4.3 KMS.

Sl.No	Quantity	Description	Rate	Per	Amount
1	110	9.0 M PSC pole 300 kg WL	3,995.48	E	439502.80
2	110	Base Plates	318.60	E	35046.00
3	328	11 KV Polymer composite pin insulators with pin	155.76	E	51089.28
4	92	1068 mm (3'-6") V cross arms	1,456.12	E	133963.04
5	124	Back Clamps 9 m	199.42	E	24728.08
6	109	HT Top insulator fittings	434.24	E	47332.16
7	35	Tapping channel cross arm for 11 KV	1,779.44	E	62280.40
8	108	11 KV strain disc insulator (including metal parts)	574.66	Set	62063.28
9	34	Stay set complete incl. GI wire (5kg), stay plate & stay clamp (pair)	1,557.60	Set	52958.40
10	34	11 KV Guy insulators	100.30	E	3410.20
11	13.095	Dog conductor ACSR 6/4.72 mm & 7/1.57 mm	1,14,415.16	Km	1498266.52
12	110	Pole Concreting	1,919.86	Loc	211184.60
13	110	Pole Earthing (Coil)	1,509.22	Loc	166014.20
14	110	Bolts, Nuts and Binding wire etc.	849.60	loc	93456.00
15	1	Guarding arrangement (Guarding X arm, Back clamps, stay set complete with guy shackle, GI wire, Bolts & Nuts	12,974.73	loc	12974.73
16		**Cost of materials**			**2894269.69**
17		Contingencies 1%			28942.70
18		Sub total			2923212.38
21		Labour & Transport @15%			438481.857
22		Total			3361694.240
23		**Or say Rs.33.617 lakhs**			

ANNEXURE II

MAIN METER & CHECK METER WITH 11 kV METERING SET AT SS END						
Sl.No	**DESCRIPTION**	**QTY.**		**RATE**	**PER**	**AMOUNT**
1	11 kV Metering set 300/5A (0.2 S Class accuracy)	1	Nos.	72292.70	E	72292.70
2	3 phase 4 wire DLMS compliance 110V/5A Fully static four quadrant TOD Tri-vector ABT Energy Meters of class 0.2s Accuracy with Bi-directional features	2	Nos.	32133.76	E	64267.52
3	HT Metering box	2	Nos.	15222.00	E	30444.00
4	Test terminal Box	2	Nos.	3481.00	E	6962.00
5	Cables, wires, special type of Bolts & Nuts, cable glands etc.	2	Set	10000.00	LS	20000.00
6	GPRS Modem	2	Nos.	12873.80	E	25747.60
7	GPRS connection SIM data charges	2	Nos.	1100.94	E	2201.88
8	Cost of materials					**221915.70**
9	Contingencies 1%					2219.16
10	Sub Total					224134.86
13	Labour&Transport @15%					33620.23
14	Total					257755.09

Or say Rs.2.578 lakhs

ANNEXURE III

MAIN METER & CHECK METER WITH 11 kV METERING SET AT PLANT END						
Sl.No	**DESCRIPTION**	**QTY.**		**RATE**	**PER**	**AMOUNT**
1	11 kV Metering set 300/5A (0.2 S Class accuracy)	2	Nos.	72292.70	E	144585.40
2	3 phase 4 wire DLMS compliance 110V/5A Fully static four quadrant TOD Tri-vector ABT Energy Meters of class 0.2s Accuracy with Bi-directional features	2	Nos.	32133.76	E	64267.52
3	HT metering box	2	Nos.	15222.00	E	30444.00
4	Test terminal Box	2	Nos.	3481.00	E	6962.00
5	Cables, wires, special type of Bolts & Nuts, cable glands etc.	2	Set	10000.00	LS	20000.00
6	GPRS Modem	2	Nos.	12873.80	E	25747.60
7	GPRS connection SIM data charges	2	Nos.	1100.94	E	2201.88
8	Cost of materials					**294208.40**
9	Contingencies 1%					2942.08
10	Sub Total					297150.48
11	Labour & Transport @ 15%					44572.57
12	Total					341723.06

Or say Rs.3.417 lakhs

ANNEXURE IV

Detailed estimate for Erection of 11 KV DP Structure at T.Nallur 110 kV SS end						
Sl.No	**QTY**		**DESCRIPTION**	**Rate**	**PER**	**AMOUNT IN Rs**
1	2	Nos.	40 ' RSJ pole	27599.02	kg	55198.04
2	2	Nos	Base Plate	318.60	E	637.20
3	2	Nos	Back clamp for RSJ Pole	129.80	E	259.60
4	1	Set	Transformer structure materials inclusive of structure clamps	34074.86	E	34074.86
5	1	Set	11 kV AB Switch with PT insulator	20933.20	E	20933.20
6	1	Set	11 KV HG fuse set (with 6 Nos. pin & pin insulator) 1851+(77+73)*6	2361.18	E	2361.18
7	3	Nos.	11 kV LAs	795.32	E	2385.96
8	4	Set	Stay set complete without guy shackle	1557.60	Set	6230.40
9	4	Nos.	Guy shackle	100.30	E	401.20
10	1	Set	Jumpering materials	1427.80	Set	1427.80
11	2	Nos	Stay Clamp for RSJ pole	195.88	pair	391.76
12	2	Nos	1068 MM (3'-6") V Cross Arm	1456.12	E	2912.24
13	2	Nos	HT Top insulator fittings	434.24	E	868.48
14	6	Nos.	11 KV Polymer Composite pin isulator	155.76	E	934.56
15	0.100	Km	7/4.09 sq.mm ACSR	78533.72	km	7853.37
16	1	set	Concreting per structure	3839.72	E	3839.72
17	1	Loc	Structure Earthing along with MS Bolts & Nuts	8195.10	Loc	8195.10
19			**Cost of materials**			148904.67
20			Contingencies @1%			1489.05
21			Sub total			150393.72
22			Labour & Transport @15%			22559.06
23			Total			172952.78

or say Rs.1.73 lakhs