

GOVERNMENT OF INDIA
MINISTRY OF POWER

RAJYA SABHA
STARRED QUESTION NO.21
ANSWERED ON 20.07.2021

STRENGTHENING OF DISCOMs

21# **SHRI MAHESH PODDAR:**

Will the Minister of **POWER**
be pleased to state:

- (a) whether it is a fact that a five year improvement based outcome scheme for power distribution companies has been recently approved under which DISCOMs will be funded to strengthen their system;
- (b) whether any condition has also been laid down for DISCOMs under the scheme, if so, the details thereof;
- (c) whether Government has reviewed the assistance and of the outcome thereof provided to States and DISCOMS under the Ujwal Discom Assurance Yojana (UDAY) scheme; and
- (d) if so, the provisions of the new scheme for poorly performing States or DISCOMs under UDAY scheme?

A N S W E R

THE MINISTER OF POWER AND NEW & RENEWABLE ENERGY

(SHRI R.K. SINGH)

(a) to (d) : A Statement is laid on the Table of the House.

STATEMENT REFERRED TO IN REPLY TO PARTS (a) TO (d) OF STARRED QUESTION NO. 21 ANSWERED IN THE RAJYA SABHA ON 20.07.2021 REGARDING STRENGTHENING OF DISCOMs

(a) : The Central Government has recently approved the Revamped Distribution Sector Scheme – A Reforms-Based and Results-Linked Scheme with an outlay of Rs.3,03,758 crore and a Gross Budgetary Support of Rs.97,631 crore from Government of India over a period of five years from FY 2021-22 to FY 2025-26. The scheme allows the Distribution Companies (DISCOMs) the flexibility to draw up their modernization plans keeping in view their own specific requirements. The other difference is that the assistance is conditional to reforms being carried out. The scheme seeks to improve the operational efficiencies and financial sustainability of all DISCOMs / Power Departments (excluding Private Sector DISCOMs) by providing financial assistance to DISCOMs for strengthening of supply infrastructure based on meeting pre-qualifying criteria as well as upon achievement of basic minimum benchmarks of Reforms by the DISCOM evaluated on the basis of agreed evaluation framework. The Scheme aims to reduce the AT&C losses to pan-India levels of 12-15% and ACS-ARR gap to zero by 2024-25.

(b) : Under the scheme, eligible DISCOMs would be provided financial support for upgradation of the Distribution Infrastructure and Smart Metering Systems for the network as well as prepaid smart metering systems for consumers. The funding against the works other than prepaid Smart Metering and System Metering, would be contingent upon DISCOMs meeting the pre-qualifying criteria and achieving at least 60% marks on the result evaluation matrix formulated on the basis of action plans for loss reduction and work plans of DISCOMs agreed upon by the Government of India. The details of the pre-qualification conditions and the Results evaluation matrix are given at **Annexure-I**.

(c) : Government of India have assessed the performance of the participating States under the UDAY. The Aggregate Technical & Commercial (AT&C) losses at all India level have reduced from 23.70% in FY 2015-16 to 21.83% in FY 2019-20. The Gap between Average Cost of Supply (ACS) and the Average Revenue Realized (ARR) has also reduced from Rs. 0.47 per Unit in FY 2015-16 to Rs. 0.28 per Unit in FY 2019-20. State-wise details of AT&C losses and ACS-ARR gap are given at **Annexure-II** and **Annexure-III** respectively.

(d) : All State-owned Distribution companies and State /UT Power Departments (referred to as DISCOMs collectively) excluding private Sector power companies will be eligible for financial assistance under the Revamped Distribution Sector Scheme. A DISCOM which is making losses will not be able to access funds under this Scheme unless it draws up a plan to reduce the losses, lists out the steps it will take to reduce such losses and the timelines thereof and get their State Government's approval on it, and file the same with the Central Government. The scheme does not follow a one-size-fits-all approach, and allows the participating DISCOMs to formulate their own Action Plans for reforms and results as well as their infrastructure creation work plans based on their specific need assessments and problems. Under the scheme, loss reduction works would be prioritized and trajectories for reduction of losses, both operational and financial, would be mutually agreed between the States, DISCOMs and the Government of India. If the DISCOMs, including the poorly performing ones, achieve the mutually agreed targets & trajectories for improvement, they would be able to avail financial assistance under the scheme from the Government of India.

ANNEXURE REFERRED TO IN PART (b) OF THE STATEMENT LAID IN REPLY TO STARRED QUESTION NO. 21 ANSWERED IN THE RAJYA SABHA ON 20.07.2021 REGARDING STRENGTHENING OF DISCOMs

Pre-qualification criteria and Results evaluation matrix under the Revamped Reforms-Based Results-Linked Scheme

Pre-Qualification Conditions:

- I. DISCOMs would publish quarterly un-audited accounts within 60 days of the end of each quarter during the first two years of operation of the Scheme (i.e. for FY 2021-22 and FY 2022-23) and thereafter audited quarterly accounts within 45 days from 3rd year onwards.
- II. DISCOMs would publish audited annual accounts by end of December of the following year during the first two years of operation of the Scheme (i.e. for FY 2021-22 and FY 2022-23) and thereafter audited annual accounts by end of September of the following year from 3rd year onwards.
- III. DISCOMs will have ensured that no new Regulatory Assets have been created in latest tariff determination cycle.
- IV. State Government to ensure 100% payment of subsidy for the previous year and advance payment of subsidy up to current period in line with section 65 of Electricity Act (EA) 2003 and wipe out the remaining subsidy amount by the end of the project period.
- V. All Government Departments/Attached Offices/Local Bodies have made 100% payment of current electricity dues for the year under evaluation.
- VI. Progress commensurate to commitment in putting Govt. Offices on prepaid meters.
- VII. No. of days Payables to Creditors for the year under evaluation is equal to or less than the projected trajectory as per results evaluation framework.
- VIII. Tariff order for the current year in which evaluation is being done and true up of penultimate year has been issued and implemented w.e.f. 1st April of current FY.

Utilities clearing the pre-qualifying criteria would be eligible for evaluation against the result evaluation matrix, which would determine their eligibility for release of funds for a particular year. The result evaluation framework would be different for each DISCOM and would be fixed for each year depending on the cumulative performance as well as the annual performance.

Results Evaluation matrix

Four basic categories of Results Parameters have been identified and weightage has been assigned to each of the category as under:

Sr. No.	Category	Weightage for Evaluation
1.	Financial Sustainability	60
2.	Outcome of infrastructure Works	20
3.	Infrastructure Works	10
4.	Policy & Structural Reforms, Capacity Building and IT/OT Enablement	10
	Total	100

Under each of the categories above, there would be result parameters in the matrix, which will be assigned maximum marks on the basis of agreed priority/ significance towards achieving the objectives of the Scheme. The maximum marks and targets for individual parameters may differ for each of the evaluation years.

The funds for a particular year will be released only if the Utility clears the pre-qualifying criteria and the total weighted score is more than 60 marks on the evaluation matrix.

ANNEXURE-II

ANNEXURE REFERRED TO IN PART (c) OF THE STATEMENT LAID IN REPLY TO STARRED QUESTION NO. 21 ANSWERED IN THE RAJYA SABHA ON 20.07.2021 REGARDING STRENGTHENING OF DISCOMs

SL No.	States	Gap (Rs. /kWh) on Tariff Subsidy Booked basis	
		2015-16	2019-20
1	Andhra Pradesh	0.79	0.02
2	Arunachal Pradesh	0.49	4.92
3	Assam	0.13	(0.19)
4	Bihar	0.46	0.93
5	Chhattisgarh	(0.01)	0.29
6	Delhi	(0.10)	(0.38)
7	Goa	0.71	0.60
8	Gujarat	(0.03)	(0.06)
9	Haryana	0.16	(0.06)
10	Himachal Pradesh	0.01	(0.01)
11	Jammu & Kashmir	3.00	1.85
12	Jharkhand	0.93	0.89
13	Karnataka	0.06	0.28
14	Kerala	0.30	0.10
15	Madhya Pradesh	0.88	0.24
16	Maharashtra	0.29	(0.03)
17	Manipur	0.02	0.08
18	Meghalaya	0.82	1.80
19	Mizoram	2.06	1.21
20	Nagaland	0.20	5.62
21	Odisha	0.39	0.34
22	Puducherry	(0.03)	0.95
23	Punjab	0.34	0.21
24	Rajasthan	1.61	(0.36)
25	Sikkim	2.09	0.50
26	Tamil Nadu	0.67	1.27
27	Telangana	0.68	0.96
28	Tripura	0.42	0.29
29	Uttar Pradesh	0.29	0.34
30	Uttarakhand	0.10	0.38
31	West Bengal	(0.00)	(0.13)
	National	0.47	0.28

ANNEXURE-III

ANNEXURE REFERRED TO IN PART (c) OF THE STATEMENT LAID IN REPLY TO STARRED QUESTION NO. 21 ANSWERED IN THE RAJYA SABHA ON 20.07.2021 REGARDING STRENGTHENING OF DISCOMs

SL No.	States	AT&C Loss (%)	
		2015-16	2019-20
1	Andhra Pradesh	10.36	10.77
2	Arunachal Pradesh	54.58	45.71
3	Assam	26.02	23.37
4	Bihar	43.30	40.38
5	Chhattisgarh	22.10	27.93
6	Delhi	12.44	10.30
7	Goa	19.77	13.99
8	Gujarat	16.23	11.95
9	Haryana	29.27	18.19
10	Himachal Pradesh	9.68	11.68
11	Jammu & Kashmir	58.75	60.46
12	Jharkhand	33.34	36.96
13	Karnataka	17.13	17.59
14	Kerala	12.40	14.47
15	Madhya Pradesh	27.37	30.38
16	Maharashtra	21.74	19.92
17	Manipur	31.72	20.27
18	Meghalaya	45.98	34.32
19	Mizoram	35.18	20.66
20	Nagaland	33.44	52.93
21	Odisha	38.60	28.94
22	Puducherry	22.43	20.00
23	Punjab	15.88	14.35
24	Rajasthan	31.59	29.70
25	Sikkim	43.89	28.88
26	Tamil Nadu	16.83	15.00
27	Telangana	14.01	23.94
28	Tripura	32.68	37.85
29	Uttar Pradesh	39.76	30.05
30	Uttarakhand	18.01	20.35
31	West Bengal	28.08	20.40
	National	23.70	21.83

GOVERNMENT OF INDIA
MINISTRY OF POWER

RAJYA SABHA
STARRED QUESTION NO.23
ANSWERED ON 20.07.2021

PROTECTING POWER GRID FROM CYBER ATTACKS

23. SHRI AKHILESH PRASAD SINGH:

Will the Minister of **POWER**
be pleased to state:

- (a) whether Government has conducted any study to identify the vulnerabilities of the energy supply grid in the country to cyber attacks, if so, the details thereof and, if not, the reasons therefor;
- (b) the number and details of cyber attacks on the power grid and the cases and sources of malware found in the energy supply system during the last two years and the current year;
- (c) whether some States faced electricity blackout or massive power outage due to the said cyber attacks; and
- (d) whether Government has carried out any investigation in this regard along with the measures taken or being taken, especially in Bihar?

A N S W E R

THE MINISTER OF POWER AND NEW & RENEWABLE ENERGY

(SHRI R.K. SINGH)

(a) to (d) : A Statement is laid on the Table of the House.

STATEMENT

STATEMENT REFERRED TO IN REPLY TO PARTS (a) TO (d) OF STARRED QUESTION NO. 23 ANSWERED IN THE RAJYA SABHA ON 20.07.2021 REGARDING PROTECTING POWER GRID FROM CYBER ATTACKS

(a) : As per the Information Technology Amendment Act 2008, Indian Computer Emergency Response Team (CERT-In) has been designated as the National Agency to collect, analyse and disseminate information on cyber incidents in the country. CERT-In also issues alerts and advisories regarding latest cyber threats/vulnerabilities and counter measures to protect computers and networks on a regular basis. Further, as per the provisions of section 70A of the Information Technology (IT) Act, 2000, Government has established National Critical Information Infrastructure Protection Centre (NCIIPC) for protection of critical information infrastructure in the country. Ministry of Power (MoP) has established Sectoral Computer Emergency Response Teams (CERTs)- viz. CERT-Thermal, CERT-Hydro, CERT-Distribution, CERT-Trans, CERT-Grid Operation, CERT-RE, to identify the vulnerability of the power system in the country to cyber attacks.

(b) : Some unsuccessful cyber attempts were reported from various agencies in the recent past. On receipt of such information immediate measures are taken for isolation and other compliance measures by the respective organization. For instance, cyber incidents have been reported at Southern Regional Load Despatch Center (SRLDC), Western Regional Load Despatch Center (WRLDC), Northern Regional Load Despatch Center (NRLDC) and North Eastern Regional Load Despatch Center (NERLDC) of Power System Operation Corporation (POSOCO), NTPC Kudgi and Telangana State Transco. Necessary isolation and other protective measures have been taken by these organizations.

(c) : No Sir

(d) : Yes Sir

An incident of power outage had occurred in Mumbai, Maharashtra on 12 October, 2020. As per the direction of Ministry of Power, a committee was formed to conduct a fact finding exercise on the cyber sabotage angle. As per the report of the committee, no conclusive evidence was observed to attribute the Mumbai Grid incident of 12.10.2020 to a cyber-attack. Government has been taking various measures to enhance the cyber security posture and prevent cyber-attacks in power sector across the country including Bihar as follows:

- i Government of India have set up the National Cyber Coordination Centre (NCCC) to generate necessary situational awareness of existing and potential cyber security threats.

- ii. Ministry of Power issued an Order No. 25-11/6/2018-PG dated 02-07-2020 wherein all equipment, components, and parts imported for use in the Power Supply System and network shall be tested in the country to check for any kind of embedded malware/trojans/cyber threats and for adherence of Indian Standards.
- iii. Ministry of Power has formed Computer Emergency Response Team(CERT) for Thermal, Hydro, Transmission, Grid Operation, Distribution and Renewable Energy sub-sector.
- iv. Alerts and advisories are regularly being issued to key organizations and sectoral CERTs by CERT-In and NCIIPC, IB and MHA for taking countermeasures and to pre-empt emerging cyber-attacks.
- v. Cyber security mock drills in co-ordination with CERT-In are being conducted regularly in utilities of Power Sectors.
- vi. CERT-In conducts regular training programmes for network/system administrators and Chief Information Security Officers (CISOs) of all utilities of Power Sectors for securing the IT and OT infrastructure and mitigating Cyber-attacks.
- vii. All Utilities of Power Sector have been directed by Ministry of Power to be on-board Cyber Swachhta Kendra (Botnet Cleaning and Malware Analysis Centre) of CERT-In.
- viii. All Utilities of Power Sector have been asked to formulate and implement the Cyber Crises Management Plan (CCMP) for countering Cyber-Attacks.

GOVERNMENT OF INDIA
MINISTRY OF POWER

RAJYA SABHA
STARRED QUESTION NO.28
ANSWERED ON 20.07.2021

RURAL ELECTRIFICATION

28. PROF. MANOJ KUMAR JHA:

Will the Minister of **POWER**
be pleased to state:

- (a) the definition of an 'electrified village';
- (b) whether Government plans to amend this definition to include the electrification of 100 per cent of the households in a village;
- (c) the data on the number of houses that do not have uninterrupted power availability or 24-hour power supply, State-wise;
- (d) the State-wise average of the number of hours of power supply received by households; and
- (e) whether the above-mentioned data meets the targets set forth by the Deendayal Upadhyaya Gram Jyoti Yojana (DDUGJY)?

A N S W E R

THE MINISTER OF POWER AND NEW & RENEWABLE ENERGY

(SHRI R.K. SINGH)

(a) to (e) : A Statement is laid on the Table of the House.

STATEMENT REFERRED TO IN REPLY TO PARTS (a) TO (e) OF STARRED QUESTION NO. 28 ANSWERED IN THE RAJYA SABHA ON 20.07.2021 REGARDING RURAL ELECTRIFICATION

- (a) & (b) : According to Rural Electrification Policy 2006, a village is reported as electrified, if
- (i) basic infrastructure such as Distribution Transformer and Distribution Lines are provided in the inhabited locality as well as the locality inhabited by weaker sections of the society/hamlet where it exists;
 - (ii) electricity is provided to public places like Schools, Panchayat Office, Health Centres, Dispensaries, Community Centres etc.; and
 - (iii) the number of households electrified should be at least 10% of the total number of households in the village.

However, the above definition of village electrification is not relevant any more, after the launch of Pradhan Mantri Sahaj Bijli Har Ghar Yojana-Saubhagya on 11.10.2017. The scheme was launched with the objective to achieve universal household electrification for providing electricity connections to all willing un-electrified households in rural areas and all willing poor households in urban areas in the country by March, 2019. All the States have reported 100% household's electrification as on 31.03.2021. A total of 2.817 crore households have been electrified since the launch of Saubhagya, up to 31.03.2021.

(c) to (e) : Electricity is a concurrent subject and supply/distribution of electricity & management of associated functions is carried out by concerned State Government/Distribution utility. All the States and Union Territories (UTs) have signed MoUs with the Central Government to ensure 24x7 power supply to all households, industrial & commercial consumers and adequate supply of power to agricultural consumers.

Deen Dayal Upadhyaya Gram Jyoti Yojana (DDUGJY) was launched in December, 2014 for the rural areas with the objective of strengthening and augmentation of sub-transmission & distribution infrastructure in rural areas, including construction of HT and LT lines, metering at distribution transformers, feeders and consumers; and feeder segregation. This and other schemes of Government of India like Integrated Power Development Scheme (IPDS), Pradhan Mantri Sahaj Bijli Har Ghar Yojana-Saubhagya and Ujjwal Discom Assurance Yojana (UDAY) have helped the States in achieving the objective of providing uninterrupted power supply to all households. Many States and UTs claim to supply 24x7 power other than the planned outages and interruptions due to unforeseen events. The State-wise details of power supply in the rural and urban areas as per National Power Portal (NPP) are given at **Annexure-I & II**, respectively.

**ANNEXURE REFERRED TO IN PARTS (c) TO (e) OF THE STATEMENT LAID IN
REPLY TO STARRED QUESTION NO. 28 ANSWERED IN THE RAJYA SABHA ON
20.07.2021 REGARDING RURAL ELECTRIFICATION**

Sl. No.	States/Union Territories	Average duration of Power Supply in a day in Rural Areas during the month of May 2021 (HH:MM)
1	Andhra Pradesh	23.58
2	Arunachal Pradesh*	20.00
3	Assam	21.00
4	Bihar	22.14
5	Chhattisgarh	22.70
6	Goa	24.00
7	Gujarat	24.00
8	Haryana	20.41
9	Himachal Pradesh	24.00
10	Jharkhand	19.62
11	Karnataka	20.26
12	Kerala	24.00
13	Madhya Pradesh	23.50
14	Maharashtra	24.00
15	Manipur	21.05
16	Meghalaya	22.38
17	Mizoram	17.06
18	Nagaland	21.00
19	Odisha	22.82
20	Punjab	24.00
21	Rajasthan	22.00
22	Sikkim*	17.50
23	Tamil Nadu	24.00
24	Telangana	24.00
25	Tripura	23.50
26	Uttar Pradesh	17.43
27	Uttarakhand	23.90
28	West Bengal	24.00
29	Andaman & Nicobar*	22.40
30	Chandigarh	24.00
31	Dadra & Nagar Haveli	24.00
32	Jammu & Kashmir	15.00
33	Ladakh	23.00
34	New Delhi	24.00
35	Puducherry	24.00
36	Lakshadweep	24.00

Note: *Data was not provided for the month of May hence, the earlier provided data is incorporated

ANNEXURE-II

**ANNEXURE REFERRED TO IN PARTS (c) TO (e) OF THE STATEMENT LAID IN
REPLY TO STARRED QUESTION NO. 28 ANSWERED IN THE RAJYA SABHA ON
20.07.2021 REGARDING RURAL ELECTRIFICATION**

Sl. No.	States	Average duration of Power Supply in a day (HH:MM) in Urban Areas during the month of March, 2021
1	Andhra Pradesh	23:54
2	Arunachal Pradesh	23:00
3	Assam	23:27
4	Bihar	23:42
5	Chhattisgarh	23:51
6	Goa	23:49
7	Gujarat	23:57
8	Haryana	23:41
9	Himachal Pradesh	23:51
10	Jammu and Kashmir	21:46
11	Jharkhand	23:56
12	Karnataka	23:52
13	Kerala	23:52
14	Madhya Pradesh	23:55
15	Maharashtra	23:56
16	Manipur	23:40
17	Meghalaya	23:50
18	Mizoram	23:54
19	Nagaland	23:27
20	Punjab	23:43
21	Rajasthan	23:51
22	Telangana	23:55
23	Tripura	23:54
24	Uttar Pradesh	23:38
25	Uttarakhand	23:45
26	West Bengal	23:51

GOVERNMENT OF INDIA
MINISTRY OF POWER

RAJYA SABHA
UNSTARRED QUESTION NO.303
ANSWERED ON 20.07.2021

SCHEMES/PROGRAMMES IN POWER SECTOR

303. SHRI IRANNA KADADI:

Will the Minister of **POWER**
be pleased to state:

- (a) the details of schemes/programmes introduced/ launched in the power sector in various States, State/Union Territory-wise including Karnataka;
- (b) the quantum of funds allocated, sanctioned, released and utilized thereunder during the last three years and the current year, State/Union Territory-wise;
- (c) the number of households deprived of power facility in the rural and urban areas of the country, category-wise, including Scheduled Castes/Scheduled Tribes and others; and
- (d) the total number of villages electrified in the country during the last two years and the current year?

A N S W E R

THE MINISTER OF POWER AND NEW & RENEWABLE ENERGY

(SHRI R.K. SINGH)

(a) & (b) : The following schemes / programmes have been introduced / launched in the Power Sector in various States:

- I. Integrated Power Development Scheme (IPDS):** Ministry of Power (MoP), Government of India notified "Integrated Power Development Scheme" (IPDS) on 3rd December'14 for strengthening the power sub transmission and distribution networks in urban areas. Further, the R-APDRP (Restructured Accelerated Power Development & Reforms Programme) scheme was carried forward and subsumed under IPDS.
- II. Deen Dayal Upadhyaya Gram Jyoti Yojana (DDUGJY):** Government of India launched Deen Dayal Upadhyaya Gram Jyoti Yojana (DDUGJY) in December, 2014 for rural electrification works including separation of agriculture and non-agriculture feeders, strengthening and augmentation of sub-transmission & distribution infrastructure, metering at distribution transformers / feeders / consumers and electrification of villages across the country.
- III. Pradhan Mantri Sahaj Bijli Har Ghar Yojana (Saubhagya):** Government of India had launched Pradhan Mantri Sahaj Bijli Har Ghar Yojana – "Saubhagya" in October, 2017 to achieve universal household electrification by providing last mile connectivity and electricity connections to all households in rural areas and all poor households in urban areas across the country.

- IV. There is no upfront allocation of funds for any State/District under Saubhagya scheme. Funds are released for sanctioned projects in instalments based on the reported utilization of the amount released in the previous instalments and fulfilment of stipulated conditions.

The total value of the schemes sanctioned (Including State share, Central share and loan), the value and No. of projects completed, including the State of Karnataka, and Central share released are furnished as below:

- a) IPDS and subsumed R-APDRP at **Annexure-I**
- b) DDUGJY and SAUBHAGYA at **Annexure-II**

- V. The MoP has been working with States by implementing schemes relating to energy efficiency and energy conservation, namely, Perform Achieve and Trade (for large industries); Energy Efficiency in Small and Medium Enterprises (SMEs); Energy Efficiency in Appliance Sector; Energy Efficiency in Building Sector; Strengthening of State Designated Agency (SDA). Details of funds released to various States under these schemes are furnished at **Annexure-III**.

- VI. Central Government has recently approved the Revamped Distribution Sector Scheme- A Reforms-based and Results-linked Scheme with an outlay of Rs.3,03,758 crore and a Gross Budgetary Support of Rs.97,631 crore from Government of India over a period of five years from FY 2021-22 to FY 2025-26. The Scheme seeks to improve the operational efficiencies and financial sustainability of all DISCOMs/ Power Departments excluding Private Sector DISCOMs by providing conditional financial assistance to DISCOMs for strengthening of supply infrastructure based on meeting pre-qualifying criteria as well as upon achievement of basic minimum benchmarks by the DISCOM evaluated on the basis of agreed evaluation framework tied to financial improvements. The Scheme aims to reduce the AT&C losses to pan-India levels of 12-15% and ACS-ARR gap to zero by 2024-25.

- VII. The LED Programme has two components, namely, (i) Unnat Jyoti by Affordable LEDs for All (UJALA) to provide LED bulbs to domestic consumers; and (ii) Street Lighting National Programme (SLNP) for replacement of conventional street lights with smart and energy efficient LED street lights. The LED Programme is being implemented by Energy Efficiency Services Limited (EESL), a joint venture company of four power sector PSUs viz. NTPC, PFC, REC & PGCIL, without any budgetary allocation from Government of India.

(c) : All the States have reported 100% household's electrification as on 31.03.2021. A total of 2.81 crore households have been electrified since the launch of Saubhagya, up to 31.03.2021, including households of Scheduled Castes / Scheduled Tribes and other categories.

(d) : As reported by the States, all the inhabited un-electrified census villages stand electrified on 28th April, 2018.

ANNEXURE-I

ANNEXURE REFERRED TO IN REPLY TO PARTS (a) & (b) OF UNSTARRED QUESTION NO. 303 ANSWERED IN THE RAJYA SABHA ON 20.07.2021

All amount in Rs Cr

IPDS (with R-APDRP subsumed)										
SI No.	States/UTs	No. of Projects	Sanction Cost			Disbursement	Completed Project Detail			
			Total Value of Scheme (Sanction Cost)	Central share	Loan Component by State	State share	Central share disbursed	Projects completed	Value of Projects completed	Central share released against Completed projects
1	A&N	1	18	11	5	2	10	0	0	0
2	AP	71	1386	829	469	87	763	67	1255	725
3	Arunachal Pradesh	5	196	172	16	8	103	3	115	57
4	Assam	91	1433	1271	125	37	1149	88	1382	1144
5	Bihar	86	4139	2267	1561	311	1748	76	3365	1542
6	Chhattisgarh	39	1435	677	697	62	587	36	1333	566
7	Delhi	1	198	119	59	20	90	1	198	90
8	Goa	5	164	131	25	8	105	3	113	96
9	Gujarat	94	2284	1217	955	112	1110	94	2284	1110
10	Haryana	25	667	489	134	45	408	21	631	405
11	HP	32	567	510	48	9	466	28	500	438
12	J&K + Ladakh	51	2342	2105	214	24	1047	9	276	195
13	Jharkhand	47	1940	797	1066	76	703	45	1814	653
14	Karnataka	123	2401	1388	875	137	1308	115	2224	1265
15	Kerala	74	1966	924	975	67	842	71	1895	827
16	Maharashtra	138	5118	2416	2448	254	2217	133	5087	2201
17	Manipur	173	562	503	53	7	464	172	444	382
18	Meghalaya	18	302	270	27	5	172	15	275	165
19	Mizoram	19	367	327	35	6	257	17	346	252
20	MP	14	3762	1778	1811	172	1630	11	3611	1600
21	Nagaland	5	162	142	14	7	117	3	144	113
22	Odisha	41	1577	920	542	115	753	30	1187	556
23	Puducherry	3	116	43	70	2	34	2	94	26
24	Punjab	71	2190	918	1227	45	854	68	2065	795
25	Rajasthan	134	3530	1790	1583	158	1322	126	3352	1297
26	Sikkim	10	241	210	23	8	114	3	80	73
27	Tamil Nadu	128	4639	1905	2550	184	2067	127	4546	2051
28	Telangana	61	2096	958	1062	75	913	59	2088	912
29	Tripura	27	399	350	38	11	287	23	299	230
30	UP	255	11821	5532	5725	564	4664	237	11108	4499
31	Uttarakhand	48	1243	1096	111	36	918	46	1128	878
32	West Bengal	82	3773	2166	1303	304	1897	76	3112	1592
Total		1972	63035	34232	25845	2958	29120	1805	56351	26736

Note -

IPDS - Central share is GOI grant, R-APDRP - Central share is GOI loan (convertible to grant)
 Full disbursement against completed project may not have been made since project is yet to be closed by Discom
 Disbursement is made as per guidelines as per project progress and Utilisation of earlier released funds

ANNEXURE-II

ANNEXURE REFERRED TO IN REPLY TO PARTS (a) & (b) OF UNSTARRED QUESTION NO. 303 ANSWERED IN THE RAJYA SABHA ON 20.07.2021

DDUGJY & Saubhagya - Status of Sanction & Release (as on 30.06.2021)

Sr. No.	State	Subsumed RE^				DDUGJY New				DDUGJY - Additional Infra for electrification of Hhs				Saubhagya				Rs. In crore Cost of Closed projects	
		Sanction Project Cost	Grant involved	State share and loan component	Fund Released (grant + Loan)	Sanction Project Cost	Grant involved	State share and loan component	Grant Released	Sanction Project Cost	Grant involved	State share and loan component	Grant Released	Sanction Project Cost	Grant involved	State share and loan component	Grant Released	No. of project closed	Cost of projects
1	Andhra Pradesh	78	70	8	59	941	565	376	477	-	-	-	-	-	-	-	-	16	563
2	Arunachal Pradesh	170	153	17	84	427	363	64	228	292	248	44	130	323	275	48	153	22	1,195
3	Assam	1768	1591	177	1640	1,535	1,305	230	1,024	1,494	1,270	224	1,082	973	827	146	684	27	3,333
4	Bihar	6402	5761	640	4266	7,301	4,381	2,920	3,753	-	-	-	-	926	555	370	468	60	7,682
5	Chhattisgarh	730	657	73	443	1,540	924	616	770	84	50	33	39	648	389	259	336	21	1,409
6	Gujarat	15	14	2	13	925	555	370	505	-	-	-	-	-	-	-	-	44	1,010
7	Haryana ^s	0	0	0		316	190	126	160	30	18	12	-	18	11	7	3	18	218
8	Himachal Pradesh ^s	35	31	3	19	159	135	24	105	9	7	1	-	6	5	1	4	12	343
9	J&K	109	98	11	27	1,046	889	157	213	875	744	131	435	133	113	20	53	11	421
10	Jharkhand	1537	1384	154	1199	3,918	2,351	1,567	2,033	1,078	647	431	414	887	532	355	217	18	2,792
11	Karnataka	217	195	22	163	1,755	1,053	702	934	127	76	51	68	79	47	31	39	36	1,115
12	Kerala	58	52	6	52	485	291	194	239	-	-	-	-	90	54	36	55	14	314
13	Ladakh	82	74	8	15	116	98	17	47	-	-	-	-	-	-	-	-		
14	Madhya Pradesh	2356	2120	236	1806	2,891	1,734	1,156	1,387	999	599	399	363	873	524	349	414	61	2,994
15	Maharashtra	85	77	9	69	2,175	1,305	870	1,071	369	221	148	165	406	244	162	198	35	853
16	Manipur	283	255	28	176	142	121	21	58	60	51	9	44	121	103	18	86	6	189

17	Meghalaya	39	36	4	23	303	258	45	189	381	324	57	254	276	234	41	187	7	467
18	Mizoram	106	96	11	101	52	45	8	29	32	27	5	15	46	39	7	41	16	394
19	Nagaland	120	108	12	104	137	116	20	72	28	24	4	18	64	54	10	39	11	270
20	Odisha	3784	3405	378	2989	1,750	1,050	700	833	509	305	203	253	525	315	210	245	34	3,924
21	Punjab					443	266	177	188	-	-	-	-	2	1	1	0	17	184
22	Rajasthan	1525	1372	152	1231	2,909	1,745	1,163	1,336	1,128	677	451	579	663	398	265	280	54	2,214
23	Sikkim	21	19	2	16	50	42	7	37	37	32	6	25	2	2	0	2	4	218
24	Tamil Nadu	51	46	5	36	924	554	370	456	-	-	-	-	-	-	-	-	29	489
25	Telangana	33	29	3	30	462	277	185	215	-	-	-	-	35	21	14	15	10	314
26	Tripura	317	285	32	253	74	63	11	40	359	305	54	197	418	355	63	260	9	411
27	Uttar Pradesh	10228	9205	1023	8775	6,946	4,168	2,779	3,321	6,290	3,774	2,516	2,469	6,188	3,713	2,475	1,465	141	14,433
28	Uttarakhand	107	97	11	58	845	718	127	614	-	-	-	-	149	127	22	43	13	760
29	West Bengal	899	809	90	678	4,262	2,557	1,705	2,008	-	-	-	-	259	155	104	123	32	3,029
30	Goa	-	-	-	-	20	12	8	10	-	-	-	-	-	-	-	-	-	-
31	D&N Haveli	-	-	-	-	5	3	2	1	-	-	-	-	-	-	-	-	-	-
32	Puducherry	-	-	-	-	20	12	8	10	-	-	-	-	-	-	-	-	-	-
33	Andaman Nicobar	-	-	-	-	21	13	8	3	-	-	-	-	-	-	-	-	-	-
Total		31156	28040	3116	24326	44896	28159	16737	22366	14179	9399	4780	6549	14109	9093	5016	5408	778	51538

Note: i) \$ The State of Haryana & Himachal Pradesh have incurred the expenditure under Additional Infra but since the amount involved is not significant, therefore, these States have decided to claim full amount at the time of closure.

ii) Under Saubhagya projects were not sanctioned for the States/UTs who already achieved 100% household electrification viz. Andhra Pradesh, Gujarat, Tamil Nadu, Goa, D&N Haveli and Andmanad Nicobar.

iii) States where no additional infrastructure was required for electrification of households under Saubhagya Scheme, no project was sanctioned under additional infrastructure

ANNEXURE-III

ANNEXURE REFERRED TO IN REPLY TO PARTS (a) & (b) OF UNSTARRED QUESTION NO. 303 ANSWERED IN THE RAJYA SABHA ON 20.07.2021

State / UT-wise Quantum of funds sanctioned and released during the last three years for energy efficiency programmes:

(in Cr.)

Sl. No.	States/Uts	Fund sanctioned and released during 2018-19	Fund sanctioned and released during 2019-20	Fund sanctioned and released during 2020-21
1	A&N Islands	0.00	0.6178	0.97
2	Andhra Pradesh	0.7384	3.0404	3.5583
3	Arunachal Pradesh	0.3700	2.3620	1.2385
4	Assam	1.2665	1.8508	1.6515
5	Bihar	0.20	2.9767	1.1489
6	Chandigarh	0.05	0.6900	0.3459
7	Chhattisgarh	1.3619	4.1297	1.4002
8	Delhi	0.00	1.3621	1.4327
9	DNH & DD	0.20	0.2300	2.05
10	Goa	0.00	0.85	0.00
11	Gujarat	2.4111	3.1121	1.8697
12	Haryana	0.7552	2.3518	2.5818
13	Himachal Pradesh	0.9952	1.8335	1.7004
14	Jammu & Kashmir	0.05	0.4050	0.1457
15	Jharkhand	0.8933	0.6428	1.6029
16	Karnataka	1.415	3.6391	2.3453
17	Kerala	1.5774	4.1917	2.8048
18	Ladakh	-	-	0.00
19	Lakshadweep	0.00	3.76	0.00
20	Madhya Pradesh	0.45	3.9785	1.9767
21	Maharashtra	0.3389	1.0752	4.4171
22	Manipur	0.4621	1.8119	2.5308
23	Meghalaya	0.63	1.3490	1.2475
24	Mizoram	0.09	1.865	0.5770
25	Nagaland	0.82	1.02	1.2850
26	Odisha	0.00	3.742	0.2468
27	Puducherry	1.0529	2.4705	2.8416
28	Punjab	1.3408	1.4675	4.8761
29	Rajasthan	0.6656	2.4134	1.8216
30	Sikkim	0.23	1.2725	0.9199
31	Tamil Nadu	0.4096	3.3675	2.0354
32	Telangana	1.4165	3.2775	1.4590
33	Tripura	0.6520	2.4250	1.00
34	Uttar Pradesh	1.8596	2.7868	2.9007
35	Uttarakhand	1.0294	3.18	1.9667
36	West Bengal	0.9247	1.6368	2.2701

GOVERNMENT OF INDIA
MINISTRY OF POWER

RAJYA SABHA
UNSTARRED QUESTION NO.304
ANSWERED ON 20.07.2021

HIGH LEVEL OF EFFICIENCY IN POWER PLANTS

304. SHRI SAMBHAJI CHHATRAPATI:

Will the Minister of **POWER**
be pleased to state:

- (a) whether Government has taken adequate measures to meet the much higher demand of energy in summer months and have asked power plants to introduce high level of efficiency;
- (b) if so, the details of measures taken by the power plants in the country;
- (c) the steps Government proposes to take to ensure that the cost of energy is not increased any more to ease the financial burden on the consumers; and
- (d) whether Government has any control over the cost of energy consumed by consumers as applicable in different States?

A N S W E R

THE MINISTER OF POWER AND NEW & RENEWABLE ENERGY

(SHRI R.K. SINGH)

- (a) & (b) :** To meet higher demand of energy in summer months and to ensure that power plants operate with maximum efficiency, the following measures have been taken by the Government:
- (i) All planned shutdowns of units (Thermal and Hydro) have been rescheduled to lean demand period.
 - (ii) There shall be periodic review of forced outage by Central Electricity Authority and Power System Operation Corporation.
 - (iii) There shall be adequate capacity on bar and to achieve the same even gas based generation shall be synchronized during the period of high demand.
 - (iv) Regular coordination interactions will be held with Central Generating Companies, State Generating Companies, Independent Power Producers, coal companies, Railways and Ministry of Coal.

(v) To improve efficiency of Thermal Power Plants, Perform, Achieve and Trade (PAT) scheme, which is designed to reduce Specific Energy Consumption, is being implemented.

(c) & (d): As per the Electricity Act 2003, the reasonability of cost of energy is ensured by the respective Appropriate Commissions. Cost of energy and electricity rates for consumers are different in different States as determined by the respective State Commissions depending upon the various factors like power purchase cost, Aggregate Transmission and Commercial (AT&C) loss, operation and maintenance (O&M) expense, consumer mix etc., which varies from State to State.

The Government is promoting to deepen the power markets with a view to increase efficiency in procurement of energy. Tariff based bidding has been promoted to ensure most competitive rate of bulk power and transmission services. Also introducing flexibility in use of coal in power plants and merit order despatch at national level has helped in controlling cost of generation.

GOVERNMENT OF INDIA
MINISTRY OF POWER

RAJYA SABHA
UNSTARRED QUESTION NO.305
ANSWERED ON 20.07.2021

ACCESS TO POWER SUPPLY UNDER SAUBHAGYA

305. SHRI DEREK O' BRIEN:

Will the Minister of **POWER**
be pleased to state:

- (a) the progress of the aim to provide energy access to all households under Pradhan Mantri Sahaj Bijli Har Ghar Yojana (SAUBHAGYA) and the details thereof;
- (b) whether there are any measures being taken to address the problem for the power generators, that have come up due to decline in power consumption due to COVID lockdowns, if so, the details thereof; and
- (c) whether there is any data about the electricity consumption patterns across different sections after the projections for the same, if so, the details thereof?

A N S W E R

THE MINISTER OF POWER AND NEW & RENEWABLE ENERGY

(SHRI R.K. SINGH)

(a) : Government of India launched the Pradhan Mantri Sahaj Bijli Har Ghar Yojana – Saubhagya in October, 2017 with the objective to achieve universal household electrification for providing electricity connections to all willing un-electrified households in rural areas and all willing poor households in urban areas in the country by March, 2019. All households were reported electrified by the States, except 18,734 households in Left Wing Extremists (LWE) affected areas of Chhattisgarh as on 31.03.2019. Subsequently, seven States namely Assam, Chhattisgarh, Jharkhand, Karnataka, Manipur, Rajasthan and Uttar Pradesh had reported that around 19.09 lakh un-electrified households, identified before 31.03.2019, which were unwilling earlier but have expressed willingness to get electricity connection. All these seven States have reported 100% household's electrification as on 31.03.2021. A total of 2.817 crore households have been electrified since the launch of Saubhagya, up to 31.03.2021.

(b) : To mitigate the liquidity problems in power sector due to low power consumption during the lockdown imposed due to COVID-19, Government of India announced a Liquidity Infusion Scheme as part of Aatma Nirbhar Bharat Abhiyan on 13th May 2020. Under the scheme, Power Finance Corporation (PFC) Ltd. and REC Ltd. extended special long-term transition loans at concessional rates to Power Distribution Companies (DISCOMs) to clear their outstanding dues towards purchase of power from Central Public Sector Undertaking (CPSU) Generation (Genco) & Transmission Companies (Transcos), Independent Power Producers (IPPs) and Renewable Energy (RE) generators, as existed on 30.06.2020. As on 30.06.2021, REC & PFC have sanctioned Rs.1,35,537 crore and disbursed Rs.79,678 crore respectively to States under Liquidity Infusion Scheme.

.....2.

(c) : The Category-wise data of electricity consumption is collected & compiled by Central Electricity Authority (CEA) on an annual basis. Electricity consumption and their annual growth data for the years 2017-18, 2018-19 and 2019-20 are as under:

Category	2017-18		2018-19		2019-20	
	In MUs	Growth %	In MUs	Growth %	In MUs	Growth %
Domestic	273545	6.93	288243	5.37	308745	7.11
Commercial	93755	4.38	98228	4.77	106047	7.96
Industrial Power	468613	6.45	519196	10.79	532820	2.62
Public Lighting	9669	2.87	9676	0.07	9432	-2.52
Traction	17433	11.16	18837	8.06	19148	1.65
Agriculture	199247	4.24	213409	7.11	211295	-0.99
Public Water Works & Sewage Pumping	20872	7.52	22334	7.01	22987	2.93
Miscellaneous	40294	1.54	40048	-0.61	37612	-6.08
Total Energy Sold	1123427	5.87	1209972	7.70	1248086	3.15

GOVERNMENT OF INDIA
MINISTRY OF POWER

RAJYA SABHA
UNSTARRED QUESTION NO.306
ANSWERED ON 20.07.2021

THERMAL POWER ALLOCATION OF KUDGI AND VALLUR PLANTS

306. SHRI PARIMAL NATHWANI:

Will the Minister of **POWER**
be pleased to state:

- (a) whether Government is considering the proposal sent by the State Government of Andhra Pradesh of APDISCOMs to surrender the thermal power allocation of Kudgi and Vallur plants of around 300 MW;
- (b) if so, the details thereof;
- (c) if not, the reasons therefor; and
- (d) the details of proposed measures to be taken by Government for improving the condition of power sector in the country?

A N S W E R

THE MINISTER OF POWER AND NEW & RENEWABLE ENERGY

(SHRI R.K. SINGH)

(a) to (c): Power Projects are highly capital intensive and they are set up by companies only after getting long term commitments by beneficiaries to purchase power. These commitments are made through signing of Power Purchase Agreements (PPAs). The investment decision for Kudgi & Vallur Thermal Power Plants of NTPC was taken based on the PPAs signed by the utilities of beneficiary States including Andhra Pradesh. The investment made by the generating company is to be serviced during the useful life of the project as per the tariff recovery mechanism decided by Central Electricity Regulatory Commission (CERC).

In case any beneficiary does not wish to avail the capacity at any time during the operation of the long term PPA, the surrendered power is offered to other needy States and allocated to State(s) willing to utilize this power. The obligation of the beneficiary who wishes to surrender the power i.e. payment of fixed charges pertaining to the quantum of electricity allocated continues till such time the re-allocation is made and another beneficiary assumes the obligation to take electricity and pay for the fixed charges.

(d) : Government of India has approved a Reforms-based and Results-linked, Revamped Distribution Sector Scheme. The Scheme seeks to improve the operational efficiencies and financial sustainability of all Distribution Companies (DISCOMs)/Power Departments excluding Private Sector DISCOMs by providing conditional financial assistance to DISCOMs for strengthening of supply infrastructure. The assistance will be based on meeting pre-qualifying criteria and upon achievement of basic minimum benchmarks by the DISCOM evaluated on the basis of agreed evaluation framework tied to financial improvements. Implementation of the Scheme would be based on the action plan worked out by each State.

The Scheme will have an outlay of Rs.3,03,758 crore with an estimated Gross Budgetary Support (GBS) of Rs.97,631 crore from Central Government. The Revamped Distribution Sector Scheme aims to improve operational efficiencies and financial sustainability, by providing result-linked financial assistance to DISCOMs for strengthening of supply infrastructure based on meeting pre-qualifying criteria and achieving basic minimum benchmarks. The Scheme would be available till the year 2025-26. Rural Electrification Corporation (REC) and Power Finance Corporation (PFC) have been nominated as nodal agencies for facilitating implementation of the Scheme.

The objectives of the Scheme are as under:

- i. Reduction of AT&C losses to pan-India levels of 12-15% by 2024-25.
- ii. Reduction of ACS-ARR gap to zero by 2024-25.
- iii. Developing Institutional Capabilities for Modern DISCOMs.
- iv. Improvement in the quality, reliability, and affordability of power supply to consumers through a financially sustainable and operationally efficient Distribution Sector.

GOVERNMENT OF INDIA
MINISTRY OF POWER

RAJYA SABHA
UNSTARRED QUESTION NO.307
ANSWERED ON 20.07.2021

CAPACITY OF THERMAL POWER PLANTS

307# **SHRI MAHESH PODDAR:**

Will the Minister of **POWER**
be pleased to state:

- (a) the number and capacity of thermal power plants established by private/public sector in the country during last five years along with the number of plants whose capacity has been enhanced;
- (b) the extent of increase achieved in thermal power generation capacity of the country due to these efforts;
- (c) the extent of increase achieved in power generation by other sources of power generation during said period;
- (d) the target set with regard to increase in power generation by various sources for the period 2021-22 and 2022-23; and
- (e) the quantity of electricity generated by the public sector power generation companies like NTPC and NHPC through the means other than the areas of their specialisation during above period along with the per unit cost of the electricity generated by them?

A N S W E R

THE MINISTER OF POWER AND NEW & RENEWABLE ENERGY

(SHRI R.K. SINGH)

(a) : A total of 47 thermal power projects with a capacity of 37733 Megawatt (MW) were established by private/public sector in the country during the last five years i.e. 2016-17 to 2020-21. Out of these 47 projects, 10 projects were expansion/extension with capacity of 7255 MW.

(b) : The installed thermal power generation capacity has increased from 210675 MW (as on 31.03.2016) to 234728 MW (as on 31.03.2021) during the last five years.

The thermal power generation has increased from 994230 Million Units (MU) (FY 2016-17) to 1032513 MU (FY 2020-21) during the last five years.

(c) : The installed generation capacity from other sources has increased from 94487 MW (as on 31.03.2016) to 147423 MW (as on 31.03.2021) during last five years.

The power generation from other sources has increased from 165910 MU (FY 2016-17) to 202094 MU (FY 2020-21) during the last five years.

.....2.

(d): The target for generation of power from various sources in the country during the year 2022-23 has not been set but the targets for the year 2021-22 is as under:

Category	Programme Generation (MU)
Thermal	1155200
Nuclear	43020
Hydro	149544
Total (Conventional)	1347764
Renewable	165000
Grand Total (Conventional & Renewable)	1512764

(e): (i) For NTPC, the quantity of electricity generated by it through the means other than the areas of its specialization during the above period along with the per unit cost of the electricity generated by them is given below:

	Average tariff of NTPC Stations (Rs./kwh) for FY 20-21	2020-21 (MUs)	2019-20 (MUs)	2018-19 (MUs)	2017-18 (MUs)	2016-17 (MUs)
Solar	5.67	1453.38	1371	1425	1268	531
Hydro	5.24	3221.40	3450	3014	3314	3225
Wind	4.19	83.94	103	98	42	-
Small Hydro	5.04	19.32	13	14	3	-
Total		4778.04	4937	4550	4627	3756

(ii) For NHPC, the quantity of electricity generated by it through the means other than the areas of its specialization during above period along with the per unit cost of the electricity generated by them is given below:

	Per unit Cost (Rs./kWh)	2020-21 (MUs)	2019-20 (MUs)	2018-19 (MUs)	2017-18 (MUs)	2016-17 (MUs)
Wind	3.40 [Power Purchase Agreement (PPA) tariff on Renewable Energy Certificate (REC) mechanism]	62.22	53.22	67.52	70.15	18.17
Solar	4.41 (PPA Tariff)	89.49	96.8	82.89	4.19	Nil
Total		151.71	150.02	150.41	74.34	18.17

GOVERNMENT OF INDIA
MINISTRY OF POWER

RAJYA SABHA
UNSTARRED QUESTION NO.308
ANSWERED ON 20.07.2021

POWER EQUIPMENT MANUFACTURING SCHEME

308# SHRI MAHESH PODDAR:

Will the Minister of **POWER**
be pleased to state:

- (a) the specific selection criteria prescribed for States to be selected as manufacturing sector under power equipment manufacturing scheme;
- (b) whether the eligible States will be selected through the auction process;
- (c) the steps to be taken to ensure transparency of the entire process; and
- (d) whether the cost of power supply in a particular State would affect the process of selection?

A N S W E R

THE MINISTER OF POWER AND NEW & RENEWABLE ENERGY

(SHRI R.K. SINGH)

(a) to (d) : In order to reduce import dependence with regard to power and renewable energy equipment and to promote the Atmanirbhar Bharat initiative, a “Scheme for Setting up Manufacturing Zones for Power and Renewable Energy Equipment” has been proposed.

It is proposed to set up three Manufacturing Zones over a period of three years. Assistance will be given to these Manufacturing Zones for the purpose of setting up of the Common Infrastructure Facilities (CIF) and Common Testing Facilities (CTF).

The selection criteria for these Manufacturing Zones is yet to be finalized.

GOVERNMENT OF INDIA
MINISTRY OF POWER

RAJYA SABHA
UNSTARRED QUESTION NO.309
ANSWERED ON 20.07.2021

POWER PROJECTS IN ANDHRA PRADESH

309. SHRI Y. S. CHOWDARY:

Will the Minister of **POWER**
be pleased to state:

- (a) the details of the ongoing power projects along with the power produced by them within the country including Andhra Pradesh;
- (b) the fund sanctioned, allocated and utilised under these projects during the last two years across the country;
- (c) whether some of the projects are facing huge cost/time overrun, if so, the details thereof and the reasons therefor; and
- (d) the action taken by Government for timely completion of these projects in future?

A N S W E R

THE MINISTER OF POWER AND NEW & RENEWABLE ENERGY

(SHRI R.K. SINGH)

(a) to (d) : At present 37 Hydro Electric Projects (HEPs) (above 25 MW) aggregating to 12,763.5 MW are under construction in the country including Andhra Pradesh.

The details of fund sanctioned, allocated & utilised, along with details of cost/time overrun in respect of the under-construction Hydro-electric projects are given at **Annexure-I**. These projects are under construction, so no generation is taking place in these power projects.

In respect of Thermal Power Projects, as per Section 7 of the Electricity Act, 2003, "any generating company may establish, operate and maintain a generating station without obtaining a license/permission under this Act, if it complies with the technical standards relating to connectivity with the grid. Accordingly, sanction of the Government is not required for setting up of thermal power projects."

At present 56 Thermal Power Projects aggregating to 56,650 MW are under construction in the country including Andhra Pradesh. Out of these, 13 projects aggregating to capacity of 8,575 MW are partially commissioned and generated electricity (from April-2020 to June-2021) aggregating to 44,647 BU. The details of funds sanctioned, allocated & utilised under these projects during the last two years, along with details of cost/time overrun are given at **Annexure-II**.

The main reasons for delay in completion of Hydro and Thermal projects are as under:

- Work slowed due to COVID pandemic
- Contractual Issues
- Lack of readiness of railway line / Railway sidings
- Delay in supply by equipment manufacturers
- Delay in land acquisitions
- Disruption of work due to Local issues
- Litigations
- Delay due to change in design
- Delay in getting coal mines, coal linkages
- Geological surprises (in case of Hydro projects).

The following action/steps are taken by the Ministry of Power (MoP)/Central Electricity Authority (CEA) to ensure timely completion of Power Projects:

- MoP/ CEA monitor the progress of under-construction power projects through frequent site visits and interaction with the developers & other stakeholders. CEA holds review meetings periodically with the developers and other stakeholders to identify and resolve issues critical for commissioning of Projects.
- Regular reviews are also undertaken in MoP to identify the constraint areas to facilitate faster resolution of inter-Ministerial and other outstanding Issues.
- In case of Central Power Sector Undertakings (CPSUs) projects, the project implementation parameters/ milestones are incorporated in the annual MoU signed between respective CPSUs and Ministry of Power and the same are monitored during the quarterly performance review meetings of CPSUs and other meetings held in MoP/CEA.
- Various matters related with project implementation are being taken up with State Government/District Administration for facilitating the support in resolving the issues to the project implementing agencies.
- Matters are taken up with State Government/District Administration for extending help to the project implementing agencies in resolving Right of Way (ROW) issues.
- As and when required, issues are also reviewed in the PRAGATI portal of PMO for proactive governance and timely implementation.

ANNEXURE REFERRED TO IN REPLY TO PARTS (a) TO (d) OF UNSTARRED QUESTION NO. 309 ANSWERED IN THE RAJYA SABHA ON 20.07.2021

DETAILS OF UNDER CONSTRUCTION HYDRO ELECTRIC PROJECTS (ABOVE 25 MW)

Sl. No.	Project Name/(I.C.)/ Executing Agency	Unit No.	Cap. (MW)	Org. Comm. Sched.	Ant. Comm. Sched.	Time over run (months)	Org. Cost (Rs. in Crore) (Price Level)	Latest/Ant. Cost (Rs. in Crore) (Price Level)	Cost over run (Rs. in Crore) (%)	Expenditure Incurred (Rs. in Crore)	
										2019-20	2020-21
Andhra Pradesh											
1	Polavaram (12x80 = 960 MW) APGENCO / Irr. Deptt., A.P.	1 2 3 4 5 6 7 8 9 10 11 12	80 80 80 80 80 80 80 80 80 80 80 80	2016-17 2016-17 2016-17 2016-17 2016-17 2016-17 2017-18 2017-18 2017-18 2017-18 2017-18 2017-18	2024-25 2024-25 2024-25 2024-25 2024-25 2024-25 2025-26 2025-26 2025-26 2025-26 2025-26 2025-26	} 96 } 96	3013.68 (2010-11 PL) (Power Component)	5338.95 (2016-17 PL) (Power Component)	2325.27 (77.15)	6.84	36.63
Arunachal Pradesh											
2	Subansiri Lower (8x250 = 2000 MW) NHPC	1 2 3 4 5 6 7 8	250 250 250 250 250 250 250 250	2009-11 2009-11 2009-11 2009-11 2009-11 2009-11 2009-11 2009-11 (Sep'10)	2023-24 2023-24 2023-24 2023-24 2023-24 2023-24 2023-24 2023-24 (Aug'23)	} 155	6285.33 (12/02)	19992.43 (04/17)	13707.10 (218.08)	1407.67	1380.72

	Assam										
3	Lower Kopili (2x55+2x2.5+1x5 =120MW)	1 2 3 4 5	55 55 5 2.5 2.5	2024-25 2024-25 2024-25 2024-25 2024-25 (Jun'24)	2024-25 2024-25 2024-25 2024-25 2024-25 (Jun'24)	NIL	1115.91 (01/15)	1719.12 (2020)	603.21 (54.05)	#	#
	Himachal Pradesh										
4	Parbati - II (4x200 = 800 MW) NHPC	1 2 3 4	200 200 200 200	2009-10 2009-10 2009-10 2009-10 (Sept'09)	2022-23 2022-23 2022-23 2022-23 (Mar,23)	} 162	3919.59 (12/01)	9897.59 (04/18)	5978 (152.51)	599.16	989.94
5	Uhl-III (3x33.33 = 100 MW) BVPCL	1 2 3	33.33 33.33 33.33	2006-07 2006-07 2006-07 (Mar'07)	2022-23 2022-23 2022-23 (Dec,22)	189 189 189	431.56 (09/02)	1281.52 (12/12)	849.96 (196.95)	352.22	156.87
6	ShongtomKarcham (3x150 = 450 MW) HPPCL	1 2 3	150 150 150	2016-17 2016-17 2016-17 (Mar'17)	2024-25 2024-25 2024-25 (Mar,25)	} 92 94 96	2807.83 (07/11)	2807.83 (07/11)	Nil	172.15	230.12
7	Bajoli Holi 3x60= 180 MW M/s GMR Bajoli Holi	1 2 3	60 60 60	2018-19 2018-19 2018-19 (May'18)	2021-22 2021-22 2021-22 (Sept,21)	} 40	1696.93 (12/11)	3094.00 (6/20)	1397.07 (82.33)	293	588
8	Sorang (2x50 = 100 MW), HSPPL	1 2	50 50	2011-12 2011-12 (Nov'11)	2021-22 2021-22 (Jul'21)	} 116	586.00 (04/2005)	586.00 (04/2005)	NIL	91.08	177.83
9*	Tangnu Romai-I (2x22 = 44 MW) TRPGPL	1 2	22 22	2014-15 2014-15 (Jun'14)	2024-25 2024-25 (subject to re-start of works(4 years))	} 129	255.00 (01/07)	641.89 (2018)	386.89 (151.72)	@	@

10	Tidong-I 2x50 =100 MW NSL Tidong (w.e.f. 04.09.2018 Statkraft India Pvt. Ltd. Has acquired the 100% equity in the project)	1 2	50 50	2013-14 2013-14 (Dec'13)	2022-23 2022-23 (Jun 22)	} 102	543.15 (01/07)	1472.00 (09/18)	928.85 (171.01)	616.26	78
11	Kutehr 3x80=240 MW JSW Energy (Kutehr) Ltd	1 2 3	80 80 80	2024-25 2024-25 2024-25 (Nov'24)	2025-26 2025-26 2025-26 (Nov'25)	12	1798.13 (09/2011)	2750 (03/2019)	951.87 (52.93)	#	413
12	Luhri-I 2X80+2X25=210 MW (SJVN)	1 2 3 4	80 80 25 25	2025-26	2025-26	-	-	-	-	178.18	239.77
13	Dhauasidh (SJVN) 2x33=66 MW	1 2	33 33	2025-26	2025-26	-	-	-	-	#	#
Govt. of UT of J&K											
14	PakalDul (4x250= 1000 MW) CVPPL	1 2 3 4	250 250 250 250	2020-21 2020-21 2020-21 2020-21 (Apr'20)	2025-26 2025-26 2025-26 2025-26 (July'25)	} 63	8112.12 (03/13)	8112.12 (03/13)	Nil	251.04	429.55
15	Parnai 3x12.5= 37.5 MW JKSPDC	1 2 3	12.5 12.5 12.5	2017-18 2017-18 2017-18 (Jan'18)	2022-23 2022-23 2022-23 (Mar,23)	} 62	640.86 (Completion cost)	640.86 (Completion cost)	Nil	32.07	17.95
16*	Lower Kalnai 2x24= 48 MW JKSPDC	1 2	24 24	2017-18 2017-18 (Sep'17)	2025-26 2025-26 (subject to re-start of works (4 years))	} 102	576.87 (12/12) (Completion cost)	576.87 (12/12) (Completion cost)	Nil	@	@
17	Kiru (4x156=624 MW) CVPPL	1 2 3 4	156 156 156 156	2023-24 2023-24 2023-24 2023-24 (Aug,23)	2024-25 2024-25 2024-25 2024-25 (Aug,24)	} 12	4287.59 (09/14)	4287.59 (09/14)	Nil	177.25	185.68

18*	Ratle (4x205+1x30) = 850 MW RHPPL / NHPC	1 2 3 4 5	205 205 205 205 30	2017-18 2017-18 2017-18 2017-18 2017-18 (Jan,18)	2025-26 2025-26 2025-26 2025-26 2025-26 (subject to re-start of works (5 years)	} 96	5281.94 (11/18)	5281.94 (11/18)	NIL	@	@
	Kerala										
19	Pallivasal 2x30 = 60 MW KSEB	1 2	30 30	2010-11 2010-11 (Mar'11)	2021-22 2021-22 (Dec,21)	} 129	222.00 (1999)	550.00 (2018)	328.00 (147.74)	53.31	39.25
20	Thottiyar (1x30+1x10)= 40MW KSEB	1 2	30 10	2012-13 2012-13 (Apr'12)	2021-22 2021-22 (Dec,21)	} 116	136.79 (2007)	280 (2018)	143.21 (104.69)	13.59	47.04
	Madhya Pradesh										
21*	Maheshwar (10x40 = 400 MW) SMHPCL	1 2 3 4 5 6 7 8 9 10	40 40 40 40 40 40 40 40 40 40	2001-02 2001-02 2001-02 2001-02 2001-02 2001-02 2001-02 2001-02 2001-02 2001-02 (Mar'02)	2023-24 (subject to re-start of works(Two years)	264	1569.27 (96-97)	8121.00 (2016-17)	6551.73 (417.50)	@	@
	Maharashtra										
22*	Koyna Left Bank PSS 2x40 = 80 MW WRD, Maha	1 2	40 40	2014-15 2014-15 (Oct'14)	2025-26 (subject to re-start of works (4 years)	} 137	245.02 (1999)	379.78 (2014)	134.76 (54.99)	@	@

	Punjab										
23	Shahpurkandi 3x33+3x33+1x8 =206 MW, Irrigation Deptt. &PSPCL	1 2 3 4 5 6 7	33 33 33 33 33 33 8	2015-16 2015-16 2015-16 2015-16 2015-16 2015-16 2015-16	2023-24 2023-24 2023-24 2023-24 2023-24 2023-24 2023-24 (Dec, 23)	93	1835.50 (04/08) (Power Component)	1938.74 (02/18) (Power Component)	103.24 (5.62)	332.85	1019.49
	Sikkim										
24	Teesta Stage VI (4x125 = 500 MW) Lanco Teesta Hydro Power Ltd. (LTHPL) (Project taken over by NHPC w.e.f. 08.03.2019)	1 2 3 4	125 125 125 125	2012-13 2012-13 2012-13 2012-13 (Jul'12)	2023-24 2023-24 2023-24 2023-24 (Mar,24)	140	5748.04 (07/2018)	5748.04 (07/2018)	NIL	@	@
25*	Bhasmey (2x25.5 =51 MW) Gati Infrastructure	1 2	25.5 25.5	2012-13 2012-13 (Jun'12)	2024-25 2024-25 (subject to re-start of works (3 years)	153	408.50 (2012-13)	746.01 (03/18)	337.51 (82.62)	@	@
26*	Rangit-IV HE Project (3X40 = 120 MW) JPCL	1 2 3	40 40 40	2011-12 2011-12 2011-12 (Jan'12)	2025-26 2025-26 2025-26 (subject to re-start of works(3-½ year)	170	726.17 (2011-12)	1692.60 (06/16)	966.43 (133.08)	@	@
27*	Rangit-II 2x33= 66 MW Sikkim Hydro Power Ltd.	1 2	33 33	2015-16 2015-16 (Apr'15)	2024-25 2024-25 (subject to re-start of works(2-½ years))	119	496.44 (2011-12)	496.44 (2011-12)	Nil	@	@
28*	Panan 4x75= 300 MW Himagiri Hydro Energy Pvt. Ltd.	1 2 3 4	75 75 75 75	2018-19 2018-19 2018-19 2018-19	2025-26 2025-26 2025-26 2025-26 (subject to re-start of works(4-½ years)	84	1833.05 (2009)	2675.00 (2020)	841.95 (45.93)	@	@

	Tamil Nadu										
29	KundahPSP (Phase-I, Phase-II & Phase-III) (4x125=500 MW) TANGEDCO	1 2 3 4	125 125 125 125	2021-22 2021-22 2021-22 2021-22 (Aug,21)	2023-24 2023-24 2023-24 2023-24 (April,23)	} 20	1216.59 (2007-08)	1831.29 (2014)	614..7 (50.52)	79.39	42.13
	Uttarakhand										
30*	Lata Tapovan (3x57 = 171 MW) NTPC	1 2 3	57 57 57	2017-18 2017-18 2017-18 (Aug'17)	2025-26 2025-26 2025-26 (subject to re-start of works(4 years))	} 103	1527.00 (07/12)	would be calculated when works re-start.	NA	@	0.30
31	TapovanVishnughad (4x130 = 520 MW) NTPC	1 2 3 4	130 130 130 130	2012-13 2012-13 2012-13 2012-13 (Mar'13)	2023-24 2023-24 2023-24 2023-24	} 132	2978.48 (03/04)	5867.38 (04/19)	2888.90 (96.99)	527.07	425.99
32	Tehri PSS (4x250 = 1000 MW) THDC	1 2 3 4	250 250 250 250	2010-11 2010-11 2010-11 2010-11 (July'10)	2022-23 2022-23 2022-23 2022-23 (Dec'22)	} 149	1657.60 (12/05)	5024.35 (02/19)	3366.75 (203.10)	582.46	565.59
33	Naitwar Mori (2x30 = 60 MW) SJVNL	1 2	30 30	2021-22 2021-22 (Dec'21)	2022-23 2022-23 (Jun'22)	6	648.33 (10/2016)	947.89 (12/2020)	299.56 (46.20)	156.97	214.15
34	VishnugadPipalkoti (4x111 = 444 MW) THDC	1 2 3 4	111 111 111 111	2013-14 2013-14 2013-14 2013-14 (Jun'13)	2023-24 2023-24 2023-24 2023-24 (Dec'23)	} 126	2491.58 (03/08)	4397.80 (02/19)	1906.22 (76.50)	332.63	270.96
35	Vyasi 2x60=120 MW, UJVNL	1 2	60 60	2014-15 2014-15 (Dec'14)	2022-23 2022-23 (Apr,22)	} 88	936.23 (02/10)	1581.01 (2019)	644.78 (68.86)	387.41	355.61

36*	Phata Byung (2x38 = 76 MW), LANCO	1 2	38 38	2012-13 2012-13 (Jun'12)	2024-25 2024-25 (subject to re-start of works(3 years))	} 153	520.00 (2013-14)	1132 (09/16)	612 (117.69)	@	@
	West Bengal										
37	Rammam-III (3x40= 120 MW)	1 2 3	40 40 40	2019-20 2019-20 2019-20 (Sep'19)	2022-23 2022-23 2022-23 (Nov,22)	} 38	1381.84 (09/14)	1381.84 (09/14)	NIL	70.11	142.20

Note:- It is to mention that cost overrun has been calculated as the difference between the Latest Cost (provided by the developer to CEA alongwith the Price Level) and the Original Cost approved by the Central Government / State Government. In most of the cases the Latest Cost at the current Price Level has not been provided by the developers.

*Construction is held-up.

@ No expenditure done during the year as construction is held-up

Project was not under construction during the year. Construction started in later years

ANNEXURE REFERRED TO IN REPLY TO PARTS (a) TO (d) OF UNSTARRED QUESTION NO. 309 ANSWERED IN THE RAJYA SABHA ON 20.07.2021

DETAILS OF UNDER CONSTRUCTION THERMAL PROJECTS													
Sl. No.	State	Implementing Agency	Project Name	Unit No.	Cap. (MW)	Org Trial run/ COD	Ant TR/ COD (given by Project Authority)	Original Cost	Latest Cost (cr)	EXPENDITURE DURING 2019-20	EXPENDITURE DURING 2020-21	Cost Over-run (%)	Time overrun (months)
A	B	C	D	E	F	G	H	I	J	K	L	(K-J)/J	(H-G)
CENTRAL SECTOR													
1	Bihar	NTPC	Barh STPP-I	U-1	660	Feb-10	Jul-21	8693	21312.1	1502.47	1123.15	145.16%	137.00
		NTPC		U-2	660	Dec-10	Mar-22						135.00
		NTPC		U-3	660	Oct-11	Jul-23						141.00
2	Bihar	NTPC & JV of RLY	Nabi Nagar TPP	U-4	250	Jun-14	Aug-21	5352.51	9996.59	399.42	356.48	86.76%	86.00
3	Bihar	NPGL	New Nabi Nagar TPP	U-3	660	May-18	Nov-21	13624.02	17304.3	1373.21	1243.28	27.01%	42.00
4	Jharkhand	NTPC	North Karanpura STPP	U-1	660	Jun-18	Dec-21	14367	15164.05	1762.62	1243.28	5.55%	42.00
		NTPC		U-2	660	Dec-18	Jun-22						42.00
		NTPC		U-3	660	Jun-19	Dec-22						42.00
5	Odisha	NTPC	Darlipalli STPP	U-2	800	Dec-18	Jul-21	12532.44	13740.53	1824.56	775.27	9.64%	31.00
6	Telangana	NTPC	Telangana STPP St- I	U-1	800	May-20	Mar-22	10599	11811	2599.45	1308.35	11.44%	22.00
		NTPC		U-2	800	Nov-20	Jul-22						20.00
7	UP	JV of NLC and UPRVUNL	Ghatampur TPP	U-1	660	May-20	Nov-21	17237.8	17237.8	3525.2	2253.18	0.00%	18.00
		JV of NLC and UPRVUNL		U-2	660	Nov-20	Mar-22						16.00
		JV of NLC and UPRVUNL		U-3	660	May-21	Jul-22						14.00
8	Rajasthan	NLC	Barsingar TPP ext	U-1	250			2112.59	2112.59	-	-	0.00%	0.00
9	Rajasthan	NLC	Bithnok TPP	U-1	250			2196.3	2196.3	-	-	0.00%	0.00
10	Jharkhand	JV of NTPC & Jharkhand Bidyut Vitran Nigam Ltd.	Patratu STPP	U-1	800	Jan-22	Aug-23	17112	18668	1391.99	1813.96	9.09%	19.00
		JV of NTPC & Jharkhand Bidyut Vitran Nigam Ltd.		U-2	800	Jul-22	Feb-24						19.00
		JV of NTPC & Jharkhand Bidyut Vitran Nigam Ltd.		U-3	800	Jan-23	Aug-24						19.00
11	Odisha	JV of NTPC & Steel Authority of India (SAIL)	Rourkela PP-II Expansion	U-1	250	Oct-18	Oct-21	1885.13	1885.13	354.67	249.47	0.00%	36.00
12	Uttar Pradesh	THDC	Khurja SCTPP	U-1	660	Jul-23	Jan-24	11089.42	11089.42	439.95	89.34	0.00%	6.00
		THDC		U-2	660	Jan-24	Jul-24						6.00
13	Bihar	SJVN	Buxar TPP	U-1	660	Jul-23	Jul-23	10439.09	10439.09	344.5	1100.05	0.00%	-1.00
		SJVN		U-2	660	Jan-24	Jan-24						-1.00
STATE SECTOR													
1	A.P	APGENCO	Dr.Narla Tata Rao TPS St-V	U-1	800	Apr-19	Oct-21	5515	7586	1032	585	37.55%	30.00
2	A.P	APGENCO	Sri Damodaran Sanjeevaiah TPP St-II	U-1	800	Jun-19	Aug-21	6034	7922.72	1062.04	885.35	31.30%	26.00
3	Rajasthan	RRVUNL	Suratgarh SCTPP	U-8	660	Nov-16	Jul-21	7920	10881.6	1102.71	1056.18	37.39%	56.00
4	Telangana	TSGENCO	Bhadradri TPP	U-4	270	Sep-17	Aug-21	5044	9962.32	1759.27	1066.95	97.51%	47.00

5	TN	TSGENCO	Ennore exp. SCTPP	U-1	660			4956	5421.38	-	-	9.39%	0.00
6	TN	TANGEDCO	Ennore SCTPP	U-1	660	Nov-17	Mar-23	9800	9800	710.6	407.38	0.00%	64.00
		TANGEDCO		U-2	660	Jan-18	Apr-23						63.00
7	TN	TANGEDCO	North Chennai TPP St-III	U-1	800	Apr-19	Feb-22	6376	8722.86	2090.62	928.95	36.81%	34.00
8	TN	TANGEDCO	Uppur Super Critical TPP	U-1	800	Feb-21	May-24	12778	12778	924.32	366.61	0.00%	39.00
		TANGEDCO		U-2	800	Feb-21	Jul-24						41.00
9	UP	UPRVUNL	Harduaganj TPS Exp-II	U-1	660	Jan-20	Sep-21	4826.49	5500.98	1339.22	775.91	13.97%	20.00
10	Karnataka	KPCL	Yelahanka CCPP	GT+ST	370	Jul-18	Nov-21	1571.18	2055.23	171.41	219.28	30.81%	40.00
11	UP	UPRVUNL	Jawaharpur STPP	U-1	660	Dec-20	Dec-22	10566.27	10566.27	2286	1211.45	0.00%	24.00
		UPRVUNL		U-2	660	Apr-21	Jun-23						26.00
12	UP	UPRVUNL	Obra-C STPP	U-1	660	Dec-20	Jan-23	10416	10416	1960	1560.21	0.00%	25.00
		UPRVUNL		U-2	660	Apr-21	May-23						25.00
13	Telangana	TSGENCO	Yadadri TPS	U-1	800	Feb-23	Feb-23	29965	29965	2935.56	4427.54	0.00%	0.00
		TSGENCO		U-2	800	Mar-23	Mar-23						0.00
		TSGENCO		U-3	800	Apr-23	Apr-23						0.00
		TSGENCO		U-4	800	May-23	May-23						0.00
		TSGENCO		U-5	800	Jun-23	Jun-23						0.00
14	UP	UPRVUNL	Panki TPS Extn.	U-1	660	Sep-21	Sep-22	3715	3715	837.26	1131.47	0	12.00
15	TN	TANGEDCO	Udangudi STPP Stage I	U-1	660	Mar-21	May-22	13076.705	13076.705	654.76	1778.57	0.00%	14.00
		TANGEDCO		U-2	660	May-21	Jul-22						14.00
16	Maharashtra	MAHAGENCO	Bhusawal TPS	U-6	660	May-22	Nov-22	4550.98	4550.98	584.06	2025.32	0.00%	6.00
17	West Bengal	WBPDC	Sagardighi Thermal Power Plant Ph-III	U-1	660	Jan-24	Jan-24	3862.65	4567.32	56.25	362.47	18.24%	0.00
PRIVATE SECTOR													
1	AP	East Coast Energy Ltd.	Bhavanapadu TPP Ph-I	U-1	660			6571.94	9343.15	-	-	42.17%	NA
		East Coast Energy Ltd.		U-2	660								NA
2	AP	Meenakshi Energy Pvt. Ltd.	Thamminapatnam TPP stage -II	U-3	350			5005	5414.4	-	-	8.18%	NA
		Meenakshi Energy Pvt. Ltd.		U-4	350								NA
3	Chhattisgarh	KSK Mahandi Power Company Ltd	Akaltara TPP	U-4	600			16190	27080	-	-	67.26%	NA
		KSK Mahandi Power Company Ltd		U-5	600								NA
		KSK Mahandi Power Company Ltd		U-6	600								NA
4	Bihar	(Jas Infra. TPP) / JICPL	Siriya TPP	U-1	660			11120	11120	-	-	0.00%	NA
		(Jas Infra. TPP) / JICPL		U-2	660								NA
		(Jas Infra. TPP) / JICPL		U-3	660								NA
		(Jas Infra. TPP) / JICPL		U-4	660								NA
5	Chhattisgarh	SKS Power Generation (Chhattisgarh) Ltd.	Binjkote TPP	U-3	300			5058	7940	-	-	56.98%	NA
		SKS Power Generation (Chhattisgarh) Ltd.		U-4	300								NA
6	Chhattisgarh	LAP Pvt. Ltd.	Lanco Amarkantak TPP-II	U-3	660			6886	10815.24	-	-	57.06%	NA
		LAP Pvt. Ltd.		U-4	660								NA
7	Chhattisgarh	Athena Chhattisgarh Power Ltd.	Singhitarai TPP	U-1	600			6200	8443.79	-	-	36.19%	NA
		Athena Chhattisgarh Power Ltd.		U-2	600								NA

8	Chhattisgarh	Vandana Vidyut	Salora TPP	U-2	135			1458.44	2386.89	-	-	63.66%	NA
9	Chhattisgarh	Visa Power Ltd.	Deveri (Visa) TPP	U-1	600			2618.7	3930	-	-	50.07%	NA
10	Jharkhand	Corporate Power Ltd.	Matrishri Usha TPP Ph-I	U-1	270			2900	3120	-	-	7.59%	NA
		Corporate Power Ltd.		U-2	270								NA
11	Jharkhand	Corporate Power Ltd.	Matrishri Usha TPP Ph-II	U-3	270			3182	3182	-	-	0.00%	NA
		Corporate Power Ltd.		U-4	270								NA
12	Jharkhand	Essar Power Ltd	Tori TPP Ph-I	U-1	600			5700	5700	-	-	0.00%	NA
		Essar Power Ltd		U-2	600								NA
13	Jharkhand	Essar Power Ltd.	Tori TPP Ph-II	U-3	600			2500	2500	-	-	0.00%	NA
14	Maharashtra	Ratan India Power Pvt. Ltd.	Amravati TPP Ph-II	U-1	270			6646	6646	-	-	0.00%	NA
		Ratan India Power Pvt. Ltd.		U-2	270								NA
		Ratan India Power Pvt. Ltd.		U-3	270								NA
		Ratan India Power Pvt. Ltd.		U-4	270								NA
		Ratan India Power Pvt. Ltd.		U-5	270								NA
15	Maharashtra	LVP Pvt. Ltd.	Lanco Vidarbha TPP	U-1	660			6936	10433	-	-	50.42%	NA
		LVP Pvt. Ltd.		U-2	660								NA
16	Maharashtra	Ratan India Power Pvt. Ltd.	Nasik TPP Ph-II / Ratan India Nasik Power Pvt. Ltd. BTG-BHEL	U-1	270			6789	6789	-	-	0.00%	NA
		Ratan India Power Pvt. Ltd.		U-2	270								NA
		Ratan India Power Pvt. Ltd.		U-3	270								NA
		Ratan India Power Pvt. Ltd.		U-4	270								NA
		Ratan India Power Pvt. Ltd.		U-5	270								NA
17	Maharashtra	Jinbhuvish Power Generation Pvt. Ltd	Bijora Ghanmukh TPP	U-1	300			3189	3450	-	-	8.18%	NA
		Jinbhuvish Power Generation Pvt. Ltd		U-2	300								NA
18	Maharashtra	Shirpur Power Pvt. Ltd	Shirpur TPP ,Shirpur Power Pvt. Ltd.-BHEL	U-2	150			2413	2413	-	-	0.00%	NA
19	MP	D.B. Power (MP) Ltd	Gorgi TPP	U-1	660			3941	3941	-	-	0.00%	NA
20	Odisha	Ind Barath	Ind Barath TPP (Odisha)	U-2	350			3150	4254	-	-	35.05%	NA
21	Odisha	KVK Nilanchal	KVK Nilanchal TPP	U-1	350			4990	6000	-	-	20.24%	NA
		KVK Nilanchal		U-2	350								NA
		KVK Nilanchal		U-3	350								NA
22	Odisha	Lanco Babandh	Lanco Babandh TPP	U-1	660			6930	10430	-	-	50.51%	NA
		Lanco Babandh		U-2	660								NA
23	Odisha	MPCL	Malibrahmani TPP	U-1	525			5093	6330	-	-	24.29%	NA
		MPCL		U-2	525								NA
24	TN	IBPIL	Tuticorin TPP	U-1	660			3595	3595	-	-	0.00%	NA
25	TN	SEPC	Tuticorin TPP St-IV	U-1	525	Oct-18	Jul-21	3514	3808.73	812.56	561.55	8.39%	33.00
26	WB	India Power corporation (Haldia)	Hiranmaye Energy Ltd	U-3	150			2656	3307	-	-	24.51%	NA
