



अखिल भारतीय विद्युत सांख्यिकी
All India Electricity Statistics

सामान्य पुनर्विलोकन 2023
(2021-22 के आंकड़े समाविष्ट)

General Review 2023
(Containing Data for the Year 2021-22)

भारत सरकार
विद्युत मंत्रालय
केंद्रीय विद्युत प्राधिकरण
नई दिल्ली
जून 2023

Government of India
Ministry of Power
Central Electricity Authority
New Delhi
June 2023

(अधिनियम 2003 की धारा 73 (आई) एवं (जे) के तहत के. वि. प्रा. के दायित्व के पालन हेतु प्रकाशित)
(Published in fulfilment of CEA's obligation under Section 73(i) & (j) of the Electricity Act 2003)

घनश्याम प्रसाद
अध्यक्ष तथा पदेन सचिव भारत सरकार
GHANSHYAM PRASAD
Chairperson & Ex-officio Secretary
To the Government Of India



केन्द्रीय विद्युत प्राधिकरण
भारत सरकार
विद्युत मंत्रालय
सेवा भवन, आर.के, पुरम
नई दिल्ली-110066

Central Electricity Authority
Ministry of Power
Sewa Bhawan, R. K. Puram
New Delhi-110066




FOREWORD

In fulfilment of its statutory obligations under the Electricity Act, 2003, Central Electricity Authority makes public the statistics concerning generation, transmission, trading, distribution and utilization of electricity by different sectors in the country. The publication "All India Electricity Statistics - General Review 2023" is a step in this direction, which is based on data for the year 2021-22. The information contained in this publication would be useful in working out the various growth rates and consumption trends to facilitate sectoral planning and for assessment of the achievement of various sectors of electricity in the country.

The data for this publication has been collected from various organizations of the Indian Electricity Sector. The General Review contains a wealth of data, including Installed capacity, Electrical Energy Generation, Transmission and Distribution Network, Captive Power Plants and Electricity Consumption etc. It contains data on various categories of Electricity Consumption like domestic, agriculture, industrial power, street lighting, water pumping schemes, traction etc., and also details about the number of consumers and the connected load.

As per the available data, the installed capacity including captive plants during the year 2021-22 has increased by 3.38 % over the previous year and the total electricity generated in the country including that from captive plants during the year 2021-22 has registered a growth of 5.99 % over the previous year. The share of renewable energy resources (Utilities and non-utilities) (excluding Hydro above 25MW) in total installed capacity has increased from 21.74% to 24.54 % and the share of generation from these sources in total generation has increased from 9.66% to 10.49 % in the country during the year 2021-22.

The cooperation of all utilities/organizations who have timely furnished the requisite information, making this publication possible, is highly appreciated. I hope that "All India Electricity Statistics - General Review 2023" will fulfill the expectations of all stakeholders who are involved in the development of electricity sector in India.


(Ghanshyam Prasad)



A. BALAN
MEMBER (PLANNING)

दूरभाष (का०)
TELEPHONE (O)
TELEFAX (O)

सदस्य
तथा पदेन अपर सचिव भारत सरकार
केन्द्रीय विद्युत प्राधिकरण
सेवा भवन, रामाकृष्णा पुरम्

MEMBER
& EX-OFFICIO ADDL. SECRETARY TO THE GOVERNMENT OF INDIA
CENTRAL ELECTRICITY AUTHORITY
SEWA BHAWAN, R. K. PURAM

नई दिल्ली - 110066

NEW DELHI-110066

PREFACE

Collection, scrutiny, compilation of annual electricity statistics has been an important task being accomplished by CEA in fulfillment of its obligation under the Electricity Act, 2003. The General Review incorporates important statistics/ data on installed capacity, electric energy generation and utilization of electric energy along with the transmission and distribution losses, per capita consumption. This publication also contain energy utilization by various categories of electricity consumers like domestic, commercial, irrigation, industries (LV /MV, HV /EHV), public lighting, public water works, etc. The various Chapters/Tables of the publication indicate the above Information State wise/ Sector wise/ Category wise/ Mode wise etc.

Data pertaining to utility sources and Captive Power Plants in Industries having demand of 0.5 MW and above have also been included in the Report. The non-availability of complete data/information in respect of certain utilities for the year 2021-22 is a major constraint and so I request the Utilities to provide the requisite input data on priority so that General Review could be finalized in time.

The "All India Electricity Statistics- General Review 2023" containing data for 2021-22 has been compiled based on the data/information received till March, 2023. I am sure that the information contained in the publication shall be of immense importance to all those associated with Power Sector of India for the planning of their activities.

June, 2023


(A. BALAN)



Irfan Ahmad
Chief Engineer (PDM)

फैक्स/Fax : 011-26197267
भारत सरकार
GOVERNMENT OF INDIA
केन्द्रीय विद्युत प्राधिकरण
CENTRAL ELECTRICITY AUTHORITY
विद्युत मंत्रालय
MINISTRY OF POWER
सेवा भवन, रामकृष्ण पुरम्
SEWA BHAWAN, RAMAKRISHNA PURAM

नई दिल्ली-110066, दिनांक :
New Delhi-110066, Dated:

ACKNOWLEDGEMENT

This publication “All India Electricity Statistics- General Review 2023” contains countrywide statistics relating to generation, transmission, distribution and consumption of electricity by different sectors/categories for the FY 2021-22. The annual electricity statistics of Indian Power sector has been important task being accomplished by CEA in fulfillment of its obligation under the Electricity Act, 2003. The data for this publication was collected from Power Utilities in public and private sectors, Electricity Departments and Non-Utilities of India and specific category consumers. With large number of organizations, the work of data collection has indeed become very complex.

The officers of PDM Division have put their sincere efforts in compilation of this publication through constant follow-up with power utilities for data collection. The contribution made by Smt. Kiran Meena, Deputy Director, Shri Akshay Singh, Deputy Director and Shri Lokendra Meena, Assistant Director is gratefully acknowledged. Other officers and staff of PDM Division have provided their valuable support in bringing out this publication. The vital inputs regarding Captive Power Plants (CPPs) provided by Regional Power Survey Offices (RPSOs) of CEA for preparation of this Review are duly acknowledged.

This compilation has been possible due to active co-operation of all central, state and private sector power utilities/organizations, who have furnished the requisite information. All efforts have been made to incorporate the data on electricity sector and maintain accuracy. Any discrepancy, if noticed in this review, may be brought to our notice which will be gratefully acknowledged and taken care of in the next issue of Electricity Statistics-General Review.

June, 2023


(IRFAN AHMAD)

GLOSSARY	
(Containing Definitions, Expansion of Abbreviations)	
A & W	As & When
APPGCL	Andhra Pradesh Power Generation Corporation Limited
APTRANSCO	Transmission Corporation of Andhra Pradesh Limited
BBMB	Bhakra Beas Management Board
CCGT	Combine Cycle Gas Turbine
Ckt.Kms.	Circuit kilometers
CSP	Central Sector Project
Deptt.	Department
DVC	Damodar Valley Corporation
E	Estimated
ER	Eastern Region
GRIDCO	Grid Corporation of Orissa Limited
GWh	Giga Watt Hour (equivalent to 1 Million Unit (MU) of Electrical Energy)
HPGCL	Haryana Power Generation Corporation Limited
HV	High Voltage
HVNL	Haryana Vidyut Prasaran Nigam Limited
IPGCL	Indra Prastha Generation Corporation Limited
KL	Kilo Litre
KPTCL	Karnataka Power Transmission Corporation Limited
kV	Kilo Volt
kVA	Kilo Volt Ampere
kW	Kilo Watt
kWh	Kilo Watt Hour
LSHS	Low Sulphur Heavy Stock
LV	Low Voltage
MMSCM	Million Metric Standard Cubic Metre
MPPGCL	Madhya Pradesh Power Generation Corporation Limited
MPPTCL	Madhya Pradesh Power Transmission Corporation Limited
MT	Metric Tonne
MV	Medium Voltage
MVA	Mega Volt Ampere
MW	Mega Watt(equivalent to 1000 Kilo Watt)
NA	Not Available
NEEPCO	North Eastern Electric Power Corporation Limited
NER	North- Eastern Region
NHDC	Narmada Hydro Development Corporation Limited
NHPC	National Hydro Electric Power Corporation Limited
NON-UTILITIES	Non-Utilities shall mean captive generating plant which means a power plant set up by any person to generate electricity primarily for own use and includes power plant set up by any Co-Operative society or association of persons for generating electricity primarily for use of members of such Co-Operative society or association.
NPCIL	Nuclear Power Corporation of India Limited
NR	Northern Region
NTPC	National Thermal Power Corporation Limited