Platforms, Portals and Tools





Smart Grid & Renewable Integration

Thinking outside the box

- Smart grid and demand response
- Techno-commercial studies for grid integration of variable renewable energy sources
- Resilient system planning

DHENCY TRANSPOSS Home Results Downloads About us Power Sector Modelling for 2030 are available are summarized in the table below. Further information and detailed No Name Transmission Flexibility BCS_Baseline_Flex Baseline Capacity Scenario Expanded Transmission Scenario Baseline Flexibility Scenario BCS_Low_Flex Baseline Capacity Scenario Expanded Transmission Scenario Low Thermal Flexibility BCS_Trans_Flex Baseline Capacity Scenario Unconstrained Transmission Baseline Flexibility Scenario HRES_Baseline_Flex High Renewable Energy Expanded Transmission Scenario Baseline Flexibility Scenario

Power Sector Modelling for 2030 http://103.11.86.171/home





Capacity Building and **Knowledge Sharing**

Creating a talent pool to make a difference

- Capacity building across the value chain of power sector-generation, transmission and distribution
- Secretariat of Distribution Utilities Forum (DUF)
- Anchoring interactive platform for Just Transition dialogue



JUST TRANSITION HTTPS://JUSTTRANSITION.IN/

Our Clients





DISTRIBUTION UTILITIES FORUM (DUF) HTTP://DUFINDIA.COM/



To know more, Contact us

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https://www.teriin.org/electricity-fuels









ELECTRICITY & FUELS DIVISION

About TERI

The Energy and Resources Institute (TERI) is a leading think tank dedicated to conducting research in the areas of energy, environment and sustainable development. TERI was established in 1974 as an information centre on energy issues. Over the following decades, it evolved into a research institute, whose policy and technology solutions transformed people's lives and the environment.

About Electricity ad Fuels Division (EFD)

Electricity is a crucial sector for the development of a modern, prosperous and sustainable economy. Sustainable development of electricity sector with primary focus on reduction of carbon footprint by using the available or in-house developed tools for modeling forms core of division's work. We carry out utility/ corporate centric and thematic research and analytical studies in conventional as well as emerging areas leading to techno-economic analysis, policy and regulatory insights.

Collaborative research in partnership with academia, utilities and national as well as international peer organizations; pilot implementations promoting cross-learning and dissemination of best practices and stakeholders perspective through the platforms created by us or through focused group interactions, etc., are integral part of our work.

During the last three decades, we have achieved several milestones in the power sector, and our focus during the last few years has been on Energy Transition, Just Transition, Energy Storage Systems, E-mobility, Demand Side Management, Smart Grid, Green Hydrogen, etc.



Thrust Areas of the Division





Energy Transitions

Committed to fostering deployment of low carbon pathways

- Identify key challenges and suggest actions, policies and finance requirements to achieve the targets in the medium and long term
- Focus on the decarbonisation and low-carbon pathway studies at the national and state level
- Integrated Resource Planning



Smart Distribution with Storage

Stretching our focus towards greener choices

- Strategy for deployment of grid-scale battery energy storage systems
- Battery storage technology option to integrate variable renewables into the power system, in particular solar

Just Transition

Aspire to promote an inclusive worldview & build resilience

- Socio-economic analysis of moving away from coal
- Promotion of Just Transition dialogue
- Planning for a post coal future





E-Mobility

Peeping into the future

- Adoption of electric vehicles and charging infrastructure
- Grid integration and smart controlled charging



Demand Side Management

Comprehending energy ecosystem through a new lens

- Load research and DSM Action Plan based on emerging technologies
- Water-Energy-Food nexus
- Direct benefit transfer (DBT) for electricity



Emissions Control in Therna Power Stations: Issues, Power Stations: Issues, Power Stations: Issues, Porward



Fuel & Emission Control

Decoding the unseen to leap into the future

- Emission control strategies and technological options for thermal power stations
- Environmental and economic impacts
- Green hydrogen