



BITS Pilani

*Diamond Jubilee Celebrations 2024
International Conference on*

Renewable & Sustainable Energy Sources: The Science and Technology for Clean & Green Future

Feb 10-12, 2025

**First Announcement and Call for
Papers**

Organized by

**Department of Physics, BITS Pilani,
Pilani, Hyderabad, Goa & Dubai
Campuses**

📍 Conference Venue

Birla Institute of Technology & Science, Pilani
(Rajasthan) – 333 031, INDIA



ABOUT THE CONFERENCE

The RSES 2025 conference is being jointly organized by the Department of Physics, BITS Pilani Pilani Campus, Hyderabad Campus, Goa Campus and Dubai Campus. The Physics Department at BITS Pilani currently has faculty members and research scholars working in broad areas of Physics. The conference is a part of the Diamond Jubilee Celebrations of BITS Pilani. RSES 2025 conference is scheduled from 10th to 12th February 2025 at BITS Pilani, Pilani Campus, India. The RSES 2025 conference emphasizes the highly interdisciplinary nature of modern energy research, bridging multiple scientific and engineering disciplines to address pressing global energy challenges. Scientists and engineers working in the areas of renewable and sustainable energy will converge to discuss how fundamental principles belonging to various fields, such as thermodynamics, quantum mechanics, and electromagnetism, are driving innovations in clean energy technologies. This includes innovations in photovoltaic cells, bioenergy, cutting-edge energy storage systems, and many more, including non-conventional energy technologies. The development of high-efficiency solar panels and microgrids rely on the interplay of quantum physics and materials science, while energy storage advancements, such as batteries and supercapacitors, require a deep understanding of electrochemical and thermodynamics principles. The conference will provide a platform for engineers and scientists from mechanical, electrical, electronics, environmental science, and device physics to develop a common language to address the problem and find a solution for efficient and resilient energy grids and power systems. By fostering collaboration across these diverse fields, the conference aims to propel the development of sustainable technologies that harness the laws of physics to create greener, more sustainable energy solutions, underscoring the essential role of interdisciplinary approaches in shaping the clean energy future, i.e. multifaceted approach to reduce greenhouse gas emissions and also promote energy security and economic growth.

ABOUT BITS PILANI

BITS Pilani, an "Institute of Eminence" (IoE), is one of India's leading higher education institutes and a deemed university under Sec. 3 of the UGC act. BITS Pilani is ranked amongst the top institutes consistently, by both governmental and private ranking agencies for quality education and cutting edge research. It emerges as the best private science and engineering institute in India. Our main campus at Pilani (Rajasthan) was set up in technical collaboration with MIT (USA), under the Ford Foundation Grant in 1964. The Pilani campus offers fully residential programs with extensive facilities for students, faculty, and staff. The Dubai Campus, established in 2000, was the first offshore campus of any Indian university, providing quality technical education to students in the UAE and neighboring regions. The Goa campus was founded in 2004, blending beauty with modern facilities. The Hyderabad Campus, founded in 2008, features modern infrastructure, including well-equipped labs, classrooms, and a large auditorium, all set amidst scenic surroundings.

ABOUT THE PHYSICS DEPARTMENT

The Department of Physics, BITS Pilani is one of the leading centers of Physics education, and research in the country working in diverse areas of theoretical, experimental and computational physics. The department existed before 1964 as a part of Birla College of Science, Commerce and Pharmacy at Pilani, Rajasthan. It was transformed into its present form since the inception of BITS Pilani in 1964. The department offers M.Sc. (Physics) and Ph.D. programs. In addition, it also offers Minor programs in *Physics* and *Quantum Information and Technologies*. It is also listed nationally at 8th position as per the prestigious Nature Index ranking 2023 in Physical Sciences. As per the 2024 QS world ranking, we are the first Indian private Institute in the subject category of Physics & Astronomy. The department stands nationally among the top 15 departments of Physics and Astronomy and in the bracket of 450-500 as per the recent QS ranking.

THEMES OF THE CONFERENCE

- Energy Conversion: Solar Cells, Thermoelectric, Photovoltaics
- Energy Storage: Fuel Cells, Batteries and Supercapacitors
- Advanced Nanomaterials for Energy and Environmental Applications
- Green Energy: Hydrogen energy, Water splitting, Pollution control
- Recent advancements in Bio-derived nanomaterials towards Green synthesis
- Renewable Energy: Wind Energy, Turbines
- Geo and Hydrothermal energy
- Energy from Biomass, Waste to Energy
- Sustainable Technologies and Policies
- Recycling Technologies: Batteries, Solar panels
- Economic Aspects in the Energy Sector
- Computational Aspects in any of the above areas

CALL FOR PAPERS – FIRST ANNOUNCEMENT

Extended Abstract

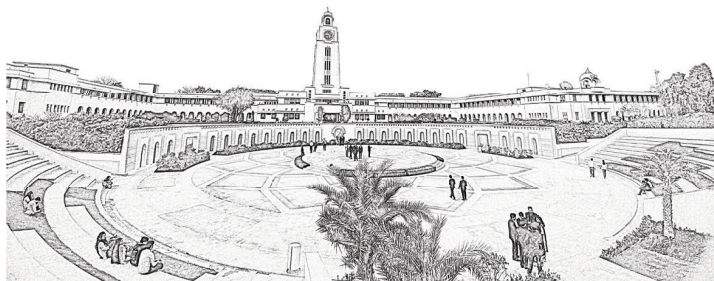
Prospective authors are hereby invited to submit an extended abstract of not more than 500 words on the conference website. Full contact information (name, affiliation, e-mail ID, and Tel/Fax number) of the corresponding author must be provided. Abstracts will be reviewed by the technical committee, and the acceptance of abstracts will be notified on the conference website.

Publications

Authors of the selected extended abstracts will be invited for full length paper submission. The manuscript would be peer-reviewed and authors would then be informed of the comments/reviews/suggestions through the review process for the subsequent submission of the revised manuscript. *It may be noted that all accepted papers will be published in Springer Nature Proceedings.*

LINK FOR EXTENDED ABSTRACT SUBMISSION

<https://forms.gle/KUGpLemAHrL8CT787>



IMPORTANT DATES

Submission Deadline for Abstracts	November 25 th , 2024
Notification of Acceptance of Abstracts	December 5 th , 2024
Deadline for Registration	December 20 th , 2024

REGISTRATION FEE

Category	Registration Fee
Ph. D. Students	₹2,000
Postdocs	₹3,000
Faculties	₹5,000
Industry Representative	₹8,000

REGISTRATION PAYMENT LINK:

Bank account details are given here
<https://www.bits-pilani.ac.in/rses2025/registration/>



Participants can also use the QR code for payment.

OFFICIAL LANGUAGE

English will be the official language of the conference.

ACCOMMODATION

Accommodation will be made available in the Institute Guest House (VFAST), Institute Hostels and guest houses/hotels at Pilani on Payment basis on prior request subject to availability. For conference participants accommodation will be provided in institute hostels.

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Private, semi-Government, and Government organizations involved with R&D, consultancy, manufacturing, and other areas related to the themes of the conference are requested to sponsor, co-sponsor, or support RSES 2025. Details of sponsorship are provided below.

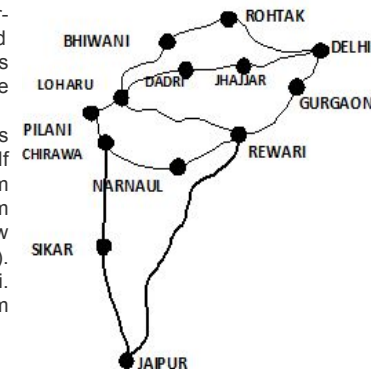
Category	Sponsorship amount	Entitlement
Platinum Sponsor	₹ 1,00,000	2 free delegates
Gold Sponsor	₹ 50,000	1 free delegates

Names of organizations in any one of the above categories will appear in the conference website & proceedings and their contributions would be duly acknowledged & displayed at the conference venue. Additionally, they would have the freedom to display their products and services at the conference website and venue. Organizations willing to come forward and financially support RSES 2025 are requested to get in touch with the organizing chairs and/or conveners.

LOCATION

Pilani can be reached either by road or by rail. Nearest railway stations are Chirawa on Western railway (16 Km) and Loharu on Northern railway (26 Km). There are regular bus services between Delhi and Pilani and Jaipur and Pilani.

The buses leave Delhi from Inter-State Bus Terminal (ISBT) and Kashmiri gate. From Jaipur buses leave from Rajasthan State Roadways bus stand, Sindhi camp. The BITS Pilani, Pilani Campus is very close to the Pilani bus stand. If you are travelling by train from Delhi, you can also take a train from Sarai Rohilla Railway Station in New Delhi (DLI) to Loharu Station (LHU). Loharu is 26KM away from Pilani. Buses and cabs are available from Loharu to Pilani.



CONFERENCE WEBSITE

The information will get updated periodically and will be accessible through the following website
<https://www.bits-pilani.ac.in/rses2025/>

CONTACT EMAIL

rses2025@pilani.bits-pilani.ac.in

