





Two-day International Conference on Multidisciplinary Research on Sustainable Future



Hybrid Mode 28th Feb - 1st March, 2025

#### Organized by Board of Professional Activities, SMVDU in collaboration with Jammu & Kashmir Science, Technology and Innovation Council (JKSTIC) Udhampur

# About the Host

Shri Mata Vaishno Devi University (SMVDU) is a prestigious institution located near Katra, UT of Jammu and Kashmir, India. Established in 1999 and inaugurated by Dr. A.P.J. Abdul Kalam, the university is situated in a serene environment near the Trikuta Hills and offers a unique blend of academic pursuits and spiritual ambiance. The institution provides undergraduate, postgraduate, and doctoral programs in diverse disciplines such as engineering, sciences, management, architecture, humanities, and social sciences. By engaging in projects of national and international significance, SMVDU has emerged as a notable educational hub in the region, fostering innovation and professional growth among students, while also promoting the cultural and ethical values inspired by the ethos of the Mata Vaishno Devi Shrine.

# About the Conference

The Annual conference, ICMRSF-2025 is a dynamic interdisciplinary event organized by the Board of Professional Activities, Shri Mata Vaishno Devi University (SMVDU) as a part of the University Annual Festival '25, *Ekatva*. It serves as a platform for scholars, researchers, students, and professionals from diverse disciplines, including sciences, engineering, literature, linguistics, business, economics, and more, to engage in meaningful discussions on the pressing need for sustainability in today's world. This conference, on "Multidisciplinary Research for Sustainable Future" reflects the critical relevance of sustainability in addressing the escalating challenges of environmental degradation, economic disparities, and social injustices. With the world grappling from the consequences of climate change, resource depletion, and unequal growth, the event underscores the urgent need for sustainable practices that balance ecological health, social equity, and economic progress. By providing a forum for the exchange of ideas and dissemination of research, SMVDU aims to foster critical engagement and warmly invites all those committed to the vision of a sustainable future to contribute to this significant discourse through submissions of their research abstracts in this Two-day International Conference scheduled to be held from 28th February - 1st March, 2025 in a hybrid mode.

# Concept Note

Vasudha

As we stand on the cusp of an era filled with both opportunity and challenge, the pursuit of sustainable futures emerges as a beacon of hope, offering a critical path to address global issues such as climate change, resource depletion, and social inequality. It envisions a world where human progress aligns with the planet's ecological limits, ensuring prosperity for both current and future generations.

The origins of sustainable development can be traced back to the 1987 Brundtland Report, which emphasized the idea of "meeting the needs of the present without compromising the ability of future generations to meet their own needs." The subsequent introduction of the United Nations Sustainable Development Goals (SDGs) in 2015 further cemented sustainability as a central focus of global governance and cooperation. These goals address a wide range of issues, from eradicating poverty and hunger to promoting clean energy, good health, and education. Amidst these pressing challenges, India demonstrates its commitment to sustainability through initiatives such as the National Action Plan on Climate Change and a robust emphasis on renewable energy, with a goal of achieving 500 GW of renewable capacity by 2030. The country is actively engaged in advancing the UN's Sustainable Development Goals, striving to harmonize economic growth with environmental conservation, thereby reflecting a comprehensive strategy to combat climate change while promoting social and economic progress for its citizens. The past few decades have underscored the urgency of adopting sustainable practices, prompting a re-evaluation of traditional development models. As such, the call for sustainable futures is not merely a theoretical ideal, but a practical necessity for ensuring both human survival and equity. Henceforth, embracing sustainability is a pivotal step toward navigating the complexities of an era defined by innovation and interconnectedness.

# Keynote Speakers



## **Prof. Filipe Samuel Silva** Professor, University of Minho, Portugal

#### **CEO & Founder of Extremater Dental Solutions**

Prof. Samuel earned his MSc and PhD, both from Minho University, Portugal. Recognized among the "World's Top 2% Scientists 2021" by Stanford University and Elsevier, he specializes in Materials Science Engineering, Dentistry, Oral Surgery & Medicine, Metallurgy, and Mechanics.

# Prof. Anil Kaul

#### Acting Vice-Chancellor, IIPH-Hyderabad Director – Dr. Cyrus Poonawalla Centre for Infectious Diseases

Prof. Kaul, a physician-scientist and public health professional, has over 35 years of experience in infectious diseases and women's health. He holds formal education in Medicine from Madras Medical College, Dentistry from King George's Medical College (Lucknow), and Public Health Administration from the University of Minnesota. His expertise lies in translational and operational research, aimed at enhancing patient health and reducing healthcare costs.





# Prof. Anuj Kumar

#### Head of Research, Rushford Business School, Switzerland

Prof. Kumar completed his M.Sc. at University College Dublin, Ireland, and earned his PhD from Aligarh Muslim University, India. He was also honored with the Outstanding Achiever award at MAHSA University, Malaysia. He is associated with INTI International University, Malaysia as a Research Fellow (Honorary Role). His primary areas of expertise include marketing, international business, and general management.

#### Dr. Sayantan Mandal Senior Assistant Professor. IIT Jammu

Dr. Mandal graduated from the Aarhus University, Denmark; and completed his PhD with Cum Laude from the University of Deusto. Previously, he worked at NIEPA and University of Delhi, while coordinating a large-scale study on Teaching and Learning in Indian Higher Education system and co-authored the Indian Higher Education Report 2017 on Teaching, Learning, and Quality.



# Call for Abstracts

# We invite thought-provoking and innovative contributions on the following themes, including but not limited to:

#### **Green management**

- · Sustainable Leadership, Partnerships & Organizations
- Marketing & the Emerging Tech
- · Pollution & Waste Management
- · Circular Economy
- Augmenting Finances
- Sustainable Tourism

# Ecosophy

- Cli-fi Narratives
- Poetry & Graphic Novelties
- · Anthropocene & Literature
- Cinema for a Better Tomorrow
- · Linguistic Strategies
- · Dharma and Righteousness
- · Minimalism & Vedic Sustainability
- Indigenous Knowledge Systems
- · Spiritual Ecologies

### Sciences

- · Geochemistry & Environmental Chemistry
- Sustainable Geophysics & Mining
- Biodiversity Conservation
- · Hydrology and Water Resources
- · Ocean Sciences
- · Sustainable Agriculture and Food Practices
- · Geology, Glaciology, Paleontology, Volcanology, Petrology & Mineralogy

## Architecture

- Sustainable Architectures
- · Green roofs, & carbon-neutral designs
- · Standardized Materials
- · Sustainable Urban Planning & Integration · Biophilia & Biopolymers
- and Others

#### Engineering **Computer Science**

 Green Computing and Climate Modelling ·Robotics, Automation & AI for **Environmental Monitoring** ·IoT & Intelligent Interface for Smart Cities ·Data Analytics for Sustainability Storage ·Energy Efficient Data Storage ·Cybersecurity in Renewable Energy **Systems** 

Blockchain for Safe Futures

# Mechanical

·Energy-Efficient Machines, Devices ·Advanced Solar Thermal Systems ·Electric and Hybrid Vehicles **3D** Printing Technologies •Sustainable Refrigeration Systems Robotics for Environmental Cleanup ·Carbon Capture Technologies ·Sustainable Manufacturing Materials and Designs ·Waste Heat Recovery Systems

#### **Electrical and Electronics**

•Electric Vehicle Charging Infrastructure Energy-Efficient Power Electronics & Manufacturing •Smart Grids Wireless Power Transmission ·Battery Management & E-waste ·IoT-Based Smart Home Systems ·Sustainable Lighting Systems Energy Harvesting Systems

# Civil

- · Green Designs & Urban Spaces · Resilient Infrastructure for Transportation
- · Wastewater Treatment and Recycling
- •Sustainable Software Development & Data Stormwater Management & Geotechnical Foundations
  - Energy-Efficient HVAC Systems
  - · Life Cycle Assessment and Circular
  - **Economy Construction**
  - · Geotechnical Engineering

### **Energy Management**

 Smart Metering and Energy Auditing ·Energy Storage Systems & Microgrid for Renewables ·Carbon Footprint Measurement and Reduction Energy Efficiency in Industrial Processes Integration of Electric Vehicles in Energy **Systems ·Distributed Generation Systems** 

# **Please Note**

- The Deadline for Abstract Submission is 22nd February, 2025. The selected participants will be informed in due course of time.
- The conference will take place in a hybrid mode, facilitating both in-person and virtual participation to ensure global inclusivity.
- The ICMRSF-2025 Abstract Booklet will be published as an E-book with an ISBN number.
- The university shall provide twin-sharing accommodation on a first-come, firstserved basis. Additionally, participants will be offered a working lunch and tea.
- Best Paper Awards will be presented for exceptional contributions in each category.



Please write to us at vasudha@smvdu.ac.in



# **Registration Details**

Rank	Online Presentation	<b>Offline Presentation</b>
Student	300/-	3000/-
Research Scholar	400/-	4000/-
Faculty	500/-	5000/-
Industry Personnel	600/-	6000/-

Bank A/C no.: 0477040100000023 Name: Registrar, SMVDU, Kakryal (J&K Bank)

Guidelines

- All abstracts are to be submitted in MLA 9 format, Font-Times New Roman 12, double-spaced and centre-justified text.
- Abstracts should be submitted in MS Word format to **vasudha@smvdu.ac.in** as per the submission guidelines.
- Abstracts should be within 150 250 words, followed by 4-5 relevant keywords.
- Previously published papers, plagiarism and AI content are strictly prohibited. Failure to comply will result in the rejection of the abstract and cancellation of the presentation.
- Please include a bio note at the end of the abstract that should mention your name, affiliation, position/rank, and other important institutional details. Please note that these details will be used for certification purposes.

Registration Link: https://forms.gle/r1hHJh12C1uxGf3v6

> Websites to follow https://smvdu.ac.in https://ekatva-fest.smvdu.ac.in

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- Dr. Ankush Raina, Assistant Professor, SoME, SMVDU
- Mr. Rishav Bali, Research Scholar, SoLL, SMVDU
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