

# International Conference on Emerging Trends in Magnetism & Magnetic Materials (Online)

HARCOURT BUTLER TECHNICAL UNIVERSITY (HBTU), KANPUR, JULY 6-8, 2023

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## SCIENTIFIC SESSION

- **Magnetic Materials**
- **Theoretical Concept in Magnetism**
- **Biomagnetism**
- **Multiferroic**
- **Accelerator in Magnetism**
- **Superconductivity**
- **Spintronics**
- **Magnetic Dynamics**
- **Topological Insulators**
- **Magnetism of Non-Magnetism System**

### Abstract Submission

**Time line:** June 30, 2023

### Email:

[icetmmabstract2023@gmail.com](mailto:icetmmabstract2023@gmail.com)

**Length:** 500 words

### Registration Details (July 5, 2023)

<b>Students (M.Sc./B.Tech.):</b>	<b>INR 300</b>
<b>Research Scholar:</b>	<b>INR 500</b>
<b>Post-doc Researcher</b>	<b>INR 600</b>
<b>Faculty</b>	<b>INR 750</b>
<b>Foreigner:</b>	<b>USD 100</b>

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## PUBLICATION

Journal of Magnetism and Magnetic Materials  
 VSI: STAMMS  
 For synchrotron related study in magnetism

### AIP Advances\*

VSI: ETMS

\*APC Applicable and paid by participant (USD800)

## CONFERENCE

### SECRETARY

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UPES India

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## CONTACT INFORMATION

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## Speakers@ICEMRB

### 1. Title: Nanoscale Hybrid Magnonics

**Dr. Anjan Barman** is a Senior Professor and Dean (Faculty) at the S. N. Bose National Centre for Basic Sciences, Kolkata. There, he leads the ‘**Spintronics and Spin Dynamics**’ research group with world class laboratories equipped with indigenously built experimental setups. He has guided/graduated about 100 postgraduate students and postdoctoral scientists, including 29 PhD students. He has published more than 240 papers, reviews and chapters in international journals and books and a monograph titled ‘Spin Dynamics and Damping in Ferromagnetic Thin Films and Nanostructures’ from Springer. He has received about 6400 citations with h-index of 45. He serves in the Editorial Board of the journals ‘**Nanotechnology**’, ‘**Scientific Reports**’ and ‘**Pramana**’. He also serves in numerous national and international committees. He is a recipient of Materials Research Society of India Medal and elected Fellows of the Indian Academy of Sciences, Bangalore and Institute of Physics, UK.



### 2. Title: Interfacial spin transport and damping in ferromagnetic/non-magnetic spintronic systems

**Professor Del Atkinson** is the Sir Gareth Roberts Professor of Applied Physics at Durham University in the UK and a Fellow of the UK Institute of Physics. Del Atkinson is the Head of Condensed Matter Physics within the Department of Physics at Durham and recently completed a Royal Society Industry Fellowship. He has research experience in academia and industry extending over three decades and has published widely cited research involving work on bulk and thin-film magnetic materials, domain wall physics, spintronics and thin-film semiconductors for flexible electronics.



### 3. Title: $d^0$ Magnetism in Non-magnetic Element Doped Oxides

**Dr. Srivastava** is working as Associate Professor of Physics at CIT Kokrajhar, Assam India (a Deemed-to-be University under MoE, Gov. of India). Prior to joining CIT Kokrajhar, he worked in many reputed institutes such as; IIT Guwahati for PhD; Institute Neel, Grenoble France; UCL Belgium and NTU Taiwan. His main research interest lies in the area of experimental materials science with a special emphasis to the development of novel magnetic materials for a wide range of applications such as magnetic storage devices, spintronics, energy harvesting. He has received funding for three research projects sanctioned by DST-SERB and UGC-DAE, Gov. of India. Till date, he has published his research work in 65 international reputed journals and in around 50 conferences. He has delivered one key-note and invited talks at more than 10 international conferences. He has been advisory committee member and session-chair of few international conferences/Workshop. He is recipient of prestigious “Early Career Research Award 2016” given by DST-SERB, Government of India. Recently he received "Emerging Researcher Award" 2019 by CIT Kokrajhar.



Apart from research, he is actively involved in serving the institute in many administrative capacities. He served the CIT Kokrajhar in many administrative roles such as "Dean (Research and Development); Head, Department of Physics, International Affairs etc.

### 4. Title: Topological Aspects of non-Hermitian systems

**Dr. Manisha Thakurathi** obtained her master's degree in physics from G. B. Pant University of Agriculture and Technology, Pantnagar, followed by a Ph.D. from the Indian Institute of Science Bangalore, India, in 2016. She began her first postdoc in the department of physics at the University of Basel, Switzerland, in 2016, and second postdoc at the University of Waterloo, Canada, in 2019. Since 2020, she is an Assistant Professor at the Department of Physics, IIT Delhi. Her research interests include topological phases in equilibrium and non equilibrium systems, quantum transport, quantum phase transition, interaction, and disorder effects in quantum systems.



5. Title: **Monolayer TMD field effect transistor with perpendicular magnetic anisotropic electrodes**

**Dr. Sachin Gupta** is currently working as an assistant professor at Bennett Uni. (Times of India Group), Greater Noida. Dr. Gupta did his Ph. D from department of Physics, IIT Bombay. After his PhD, He moved to Japan, where he did his first postdoc at Tohoku university, Japan. After that he joined Kyoto University Japan for his second postdoc. He also worked there as an assistant professor for a year. Before joining Bennett uni., Dr. Gupta was working as a research scientist at university of Leeds, UK. He has published 40+ research papers in leading peer reviewed international journals. Dr. Gupta has been awarded Ramanujan fellowship and DST INSPIRE faculty awards.



6. Title: **Defect-Induced Magnetism in Zinc Oxide**

**Dr. Parmod Kumar** has been working as an Assistant Professor at J. C. Bose University of Science and Technology, YMCA Faridabad since 2020. Dr. Kumar did his Masters in Physics from Kurukshetra University Kurukshetra in 2009 and Masters in Nanotechnology from NIT Kurukshetra in 2011. After that, he completed a Ph.D. in Physics from IIT Delhi in Dec. 2014. Dr. Kumar got an opportunity to work at University of Leipzig, Germany as a DAAD fellow during his doctoral degree. He served as Postdoctoral fellow at Inter University Accelerator Centre, New Delhi from Jan 2015 to March 2016. After that he received the prestigious DST-INSPIRE Faculty award and worked at DCRUST Murthal for a period of 3 years. He has completed 4 research project received from UGC/DST. He is the Co-coordinator of the ongoing PURSE project worth 7 crore awarded by DST, New Delhi. Dr. Kumar has published more than 65 research articles in reputed journals over 1500 citations. He is also the editor of 2 books in SPRINGER and ELSEVIER.



7. Title: **Fabrication of exchanged coupled SrFe<sub>12</sub>O<sub>19</sub>-a/g-Fe<sub>2</sub>O<sub>3</sub> nanocomposites for spintronic applications**

**Dr. Murtaza Bohra** (Mahindra University, Hyderabad) (Associate Professor): He pursued his Ph.D. in Physics department from IIT-Bombay, India in 2008. He was a postdoctoral fellow with University of Ecole des Mines des Nancy, France for 1 year from 2008 till 2009. Followed by that he was a Postdoctoral Research Fellow with National Sun-Yet Sen University, Kaohsiung from 2009 till 2012, after which he became a Researcher in Okinawa Institute of Technology, Okinawa, Japan, and worked from 2012 till beginning of 2014 before joining Mahindra Ecole Centrale, Hyderabad, India, as an assistant professor. His research interests mainly include nanotechnology and spintronics. Dr. Murtaza Bohra's nanomaterial research has garnered invited journal and conference publications, invited talks, and several ongoing publications in highly reputed peer reviewed: Nature, ACS and APS journals. He has led the efforts and co-authored a number of refereed articles and bilateral international projects of direct relevance to the proposed work.



8. Title: **Rare-earth doped ferrite nanoparticles**

**Dr. Ashok Kumar** has been working as an Assistant Professor since 2010 at Department of Physics, Deenbandhu Chhotu Ram University of Science and Technology, Murthal, India. Dr. Kumar did his Masters in Physics from Kurukshetra University Kurukshetra in 2008. After that, he completed a Ph.D. in Physics from National Physical Laboratory (NPL) New Delhi in 2015. Dr. Kumar is a member of Magnetic Society of India and Vigyan Bharti Haryana. He has Completed 2 research project funded by UGC, New Delhi and DCRUST, Murthal. Three students completed Ph.D under his guidance and four are perusing. Dr. Kumar has been awarded for best poster presentation at international conference on "Futuristic trends in engineering and management (2014)" and "5 NANO" during year 2021 and 2022. His research interest is mainly in novel synthesis and applications of Ferrites, Ferrofluids, CNT-Ferrites composites materials, Oxide Semiconductors, Dilute Magnetic Semiconductors and Defects-induced Magnetism. Dr. Kumar has published more than 63 research articles in reputed journals over 1263 citations. Recently he presented his work at International Conference "ICMF-2023" at Granada, Spain. )





**Title (Times new Roman Font Size 12)**

Authors <sup>1\*</sup>, and Authos<sup>2</sup>,

<sup>1</sup>*Affiliation*

<sup>2</sup>*Affiliation*

\**Corresponding Authors: [xxxxx@mru.edu.in](mailto:xxxxx@mru.edu.in)*

\*\* *Underline the presenting author*

**Abstract**

Abstract of 500 words highlighting the key results should be provided  
Abstract Submission: June, 30, 2023

(Font - Times new Roman: 11 ).

Abstract should be sent to following email address

Email: [icetmmabstract2023@gmail.com](mailto:icetmmabstract2023@gmail.com)

[icetmm2023@gmail.com](mailto:icetmm2023@gmail.com) (For speakers)

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