

## DST-JSPS Results 2024

Under the Indo-Japan Cooperative Science Programme (IJCSP)-2024, a Joint Call for Proposals was issued by the Department of Science and Technology (DST), Ministry of Science & Technology, Government of India and Japan Society for the Promotion of Science (JSPS), Japan for inviting joint research projects and workshops carried out by Indian and Japanese researchers on the mutually agreed areas of i) Physical Sciences ii) Chemical Sciences iii) Life Sciences and Agriculture iv) Mathematics and Computational Science v) Astronomy and Earth Science vi) Materials and Engineering.

2. The last date for submitting the proposals 3<sup>rd</sup> September, 2024. A total of 245 joint research project proposals and 15 workshop proposals were received against the call. After judicious assessment based on scientific strength, technical aspects, project objectives and national priorities of both the countries, Department of Science and Technology (DST), India and Japan Society for the Promotion of Science (JSPS), Japan have jointly decided to support the following 3 Workshop proposals and 20 Research Project proposals. The India side PI will be emailed to submit security sensitivity clearance and bank details to process further for release of grant.

### List of Selected Joint Research Workshops: -

S.no.	TPN No.	Project Title	Indian PI/Institute	Japanese PI/Institute
1.	115283	Recent advances in spectroscopy and simulations of complex molecular systems: Structure, dynamics, and functions.	<b>Prof. Amalendu Chandra,</b> IIT Kanpur Nagar Uttar Pradesh 208016	<b>Prof. Tetsunari Kimura,</b> Kobe University Japan
2.	115314	A joint workshop on fundamentals and application of fine bubble technologies	<b>Dr. Neelkanth Nirmalkar,</b> IIT Ropar Punjab 140001	<b>Dr. Yoshikatsu Ueda,</b> Kyoto University Japan
3.	114718	Seminar cum workshop on Single-molecule imaging technologies for life science research	<b>Dr. Gunjan Mehta,</b> IIT Hyderabad Telangana 502285	<b>Prof. Masahiro Ueda,</b> Osaka University Japan

### List of Selected Joint Research Projects: -

S.no.	TPN No.	Project Title	Indian PI/Institute	Japanese PI/Institute
1.	114712	Design and Modelling of Self Sustainable, Power Generating Johkasou System to Suit Diverse Indian Environmental and Operational Conditions	<b>Dr. K Govardhan,</b> VIT Vellore Tamil Nadu 632014	<b>Dr. Ichiro Suzuki,</b> Yokohama National University Japan
2.	114799	Development of 2D porphyrin metal-organic frameworks PMOFs for efficient hydrogen generation	<b>Prof. Nagaraja Mallaiah,</b> IIT Ropar Punjab 140001	<b>Prof. Hiroshi Kitagawa,</b> Kyoto University Japan
3.	115118	Exploring the sculptors of plasma membrane in Entamoeba histolytica BAR proteins	<b>Dr. Somlata,</b> Jamia Milia Islamia, Central University Jamia Nagar New Delhi 110025	<b>Prof. Tomoyoshi Nozaki,</b> The University of Tokyo Japan

4.	115171	Elucidation of molecular mechanisms underlying membrane dynamics during autophagy	<b>Prof. Ravi Manjithaya,</b> Jawaharlal Nehru Centre for Advanced Scientific Research (JNCASR) Bangalore Bengaluru Karnataka 560064	<b>Dr. Hitoshi Nakatogawa,</b> Tokyo Institute of Technology Japan
5.	114894	Creation of the Chiral Meso-Space for Organic Reaction	<b>Dr. Dibyendu Das,</b> IISER Kolkata Mohanpur Campus, West Bengal 741246	<b>Dr. Shiki Yagai,</b> Institute of Advanced Academic Research IAAR, Chiba University Japan
6.	115055	Understanding the molecular mechanism of KAT5/Tip60 mediated acetylation of chromatin protein PC4 in nucleolar organization and DNA repair A story of self-crosstalk	<b>Prof. Tapas Kumar Kundu,</b> Jawaharlal Nehru Centre For Advanced Scientific Research (JNCASR) Bangalore Bengaluru Karnataka 560064	<b>Prof. Kazuhiko Igarashi,</b> Tohoku University School of Medicine, Japan
7.	115223	Development of Cultured Corneal Endothelial Cell Sheets Using 3D Printing Technology for Treating Corneal Endothelial Dysfunction	<b>Dr. Narayanan,</b> Vision Research Foundation, Sankara Nethralaya, Chennai Tamilnadu 600006	<b>Dr. Naoki Okumura,</b> Doshisha University, Address- faculty of life and medical sciences, Doshisha university, kyoto Japan
8.	115287	Floquet engineering and non-linear response in propagating waves- Application to topological materials	<b>Dr. Kush Saha,</b> School of Physical Sciences, National Institute of Science Education and Research Jatni Orissa 752050	<b>Prof. Takashi Oka,</b> University of Tokyo Japan
9.	115289	Multi-Phase Reference Sampling Phase-Locked Loop with Sub-Sampling Technique for Future Millimeter-Wave Communication	<b>Prof. Bishnu Prasad Das,</b> IIT Roorkee, Uttarakhand, 247667	<b>Prof. Kenichi Okada,</b> Tokyo Institute of Technology, Japan
10.	115303	Physics-based seismic hazard for North-East India using Hierarchical slip-weakening Patch Model	<b>Dr. Maheshreddy Gade,</b> IIT, Mandi Mandi Himachal Pradesh 175075	<b>Prof. Hiroyuki Goto,</b> Kyoto University Japan
11.	115339	Efficient protocols for distribution and utilization of entanglement in the quantum internet	<b>Prof. Siddhartha Santra,</b> IIT Bombay Powai, Mumbai Maharashtra 400076	<b>Prof. David Elkouss Coronas,</b> Okinawa Institute of Science and Technology Japan
12.	114459	Optogenetic Illumination of Toxoplasma Lytic Cycle	<b>Prof. Nishith Gupta,</b> BITS Pilani, Hyderabad Telangana 500078	<b>Prof. Masahiro Yamamoto,</b> Osaka University Japan
13.	114881	Chemistry and oxygenation history of the Mesoproterozoic Era hydrosphere Geochemical and geochronological approaches	<b>Dr. Partha Pratim Chakraborty,</b> University of Delhi, New Delhi 110021	<b>Dr. Kaushik Das,</b> Hiroshima university, Japan
14.	114904	L-functions and multiple zeta functions	<b>Prof. Sanoli Gun,</b> Institute of Mathematical Sciences (Autonomous Institution under DAE, Govt. of India) Chennai Tamilnadu 600113	<b>Prof. Maki Nakasuji,</b> Sophia Universit Japan

15.	114641	Quantum Materials for Generation and Detection of Spin Current	<b>Dr. Shrawan Kumar Mishra,</b> Indian Institute of Technology, (BHU) Varanasi Uttar Pradesh 221005	<b>Dr. Shinji,</b> National Institute for Materials Science NIMS, Japan
16.	114975	Spin Current Driven by Microwave excitation and Thermal Gradients at 2D PtSe <sub>2</sub> /Zn-Ferrite Interfaces	<b>Prof. Murtaza bohra,</b> Mahindra University Hyderabad Telangana 500043	<b>Prof. Yuki Shiomi,</b> University of Tokyo Japan
17.	114588	Combined mechanochemistry and synchrotron diffraction for structure elucidation of pharmaceutical cocrystals their physicochemical property and pharmacological activity study	<b>Dr. Ranjit Thakuria,</b> Gauhati University, Guwahati Jalukbari Assam 781014	<b>Dr. Toshiyuki Sasaki,</b> Japan Synchrotron Radiation Research Institute JASRI, Japan
18.	114801	Development of analog proton devices for energy-efficient biomonitors	<b>Dr. Satya Prakash Pati,</b> North-Eastern Hill University Umshing Mawkyroh Shillong Meghalaya 793022	<b>Prof. Takeaki Yajima,</b> Kyushu University Japan
19.	114946	Cell-type specific transcriptional and translational mechanisms involved in social isolation stress in Drosophila.	<b>Dr. Pavan Kumar Agrawal,</b> Kasturba Medical College, Manipal, Madhav Nagar Karnataka 576104	<b>Dr. Toshiharu Ichinose,</b> Tohoku University Japan
20.	115123	Development of robust conductive MOF electrode by post-metal doping using solution process for high-performance supercapacitor device	<b>Dr. Chanchal Chakraborty,</b> BITS Pilani, Hyderabad Telangana 500078	<b>Dr. Osamu Oki,</b> University of Tsukuba, Japan