

GOVERNMENT OF INDIA
MINISTRY OF SCIENCE AND TECHNOLOGY
DEPARTMENT OF SCIENCE & TECHNOLOGY

INDIA-JAPAN COOPERATIVE SCIENCE PROGRAMME (IJCSP)

CALL FOR PROPOSALS-2018

DEADLINE DATE FOR SUBMITTING PROPOSALS: 6th September, 2017

The Department of Science and Technology (DST), Ministry of Science & Technology, Government of India, New Delhi and the Japan Society for the Promotion of Science (JSPS) conduct the India-Japan Cooperative Science Programme (IJCSP) to promote bilateral scientific collaboration between Indian and Japanese scientists. Applications are invited from eligible Indian researchers /scientists to submit proposals for **Joint Research Projects** and **Joint Workshops/Seminars** under IJCSP.

Areas of cooperation: The support is available to the following scientific areas:

[A] Fundamental Sciences: Physical and Chemical Systems

1. Condensed Matter Physics
2. Molecules and Molecular Assembly Science
3. Interface Science and Catalysis

[B] Materials and System Engineering: Man-made Systems

1. Advanced Materials and Nanotechnologies (This keyword includes areas of metal ceramics, polymer science & engineering and materials processes)
2. Engineering Sciences (This keyword includes areas of manufacturing science and engineering and synthesis & analysis/optimization & simulation of engineering processes and systems)

[C] Natural Systems: Life Sciences and Bioengineering

1. Molecular and Chemical Biosciences
2. Biotechnology and Bioengineering
3. Medical Biosciences
4. Cognitive Science

[D] Astronomy, Space, Earth System and Sciences

1. Astronomy, Astrophysics, and Space & Planetary Science
2. Geosciences (Marine, Meteorology, Geology, Paleontology)
3. Geophysics and Geochemistry for Global Issues (Global warming and Natural Resource)

[E] Mathematics and Computational Science

1. Mathematical Science
2. Computational Science and Engineering
3. Big Data analytics
4. Machine Learning

Who can apply:

The joint application must include one Indian and one Japanese Principal Investigators, who would be responsible for technical as well as administrative co-ordination of the project and its periodic scientific and financial reporting to the DST/ JSPS respectively.

The Principal Investigator (PI) and other investigators in India should be scientists/ faculty members working in regular capacity in UGC recognized Universities/ Deemed Universities/ Academic Institutes and National Research & Development Laboratories/ Institutes. It is preferred that a member of the project team may be designated as Co-PI.

The Japanese PIs must be full time researchers employed at Universities or other research institutions recognized by JSPS. Further details in respect of Japanese participants JSPS website (www.jsps.gov.jp) may be referred to.

Kind of support available:

The sending side would provide the international travel cost and receiving side will provide local hospitality including accommodation charges, per-diem and local travel.

DST provides the following support under the Programme:

For Indian Researchers – Cost of International airfare to and from the designated research location, visa fee, air port taxes, overseas medical insurance premium for the approved visit duration and airport transfers in India.

For joint workshops/seminars to be organized in India, local travel cost of selected Indian participants and organizing expenses may also be considered for support as per DST norms.

For Japanese Researchers – Cost of accommodation in a guest house, per diem and domestic travel expenses in India including airport transfers as per DST norms.

Processing: The formats for joint research project/workshop/seminars proposals and other details is available at the websites www.dst.gov.in. Project proposal is to be submitted through e-mail to ujjwala@nic.in (preferably in **MS Word format in one file indicating file name as PI name & area code**) **as well as by Post (3 copies)** in the prescribed format on or before the given deadline (6th September, 2017), through proper channel to :

Ujjwala Tripti Tirkey
Scientist 'F'/Director
Room No. C-2, S&T Block II
International Cooperation (Bilateral)
Department of Science and Technology
Technology Bhavan, New Mehrauli Road,
New Delhi 110016

Tel: +91 (0)11 2659 0377
+91 (0)11 2686 4642

Email: ujjwala@nic.in

Japanese Principal Investigators need to submit proposals with a matching joint research project / seminars plan to JSPS simultaneously. Japanese Researchers are requested to contact JSPS for their application submission period, documents to be submitted etc.

INDIA-JAPAN COOPERATIVE SCIENCE PROGRAMME
PROPOSAL FOR DST-JSPS JOINT RESEARCH PROJECT FOR 2017-2018

(to be used by the Indian Scientists/ Researchers)

Project Ref No. _____
 (to be given by DST)

A. PROJECT IDENTIFICATION

1. Area Code & Key Words (Please tick the appropriate box and also write sub theme/key words):

1.	Fundamental Sciences: Physical and Chemical Systems <ul style="list-style-type: none"> • Condensed Matter Physics • Molecules and Molecular Assembly Science • Interface Science and Catalysis 	(FS)	
2.	Materials and System Engineering: Man-made Systems <ul style="list-style-type: none"> • Advanced Materials and Nanotechnologies (Including metal ceramic, polymer science & engineering and materials processes) • Engineering Sciences (Including manufacturing science and engineering and synthesis & analysis/ optimization & simulation of engineering processes and systems) 	(MS)	
3.	Natural Systems: Life Sciences and Bioengineering <ul style="list-style-type: none"> • Molecular and Chemical Biosciences • Biotechnology and Bioengineering • Medical Biosciences • Cognitive Science 	(NS)	
4.	Astronomy, Space, Earth System and Sciences <ul style="list-style-type: none"> • Astronomy, Astrophysics, and Space & Planetary Science • Geosciences (Marine, Meteorology, Geology, Paleontology) • Geophysics and Geochemistry for Global Issues (Global warming and Natural Resource) 	(ASESS)	
5.	Mathematics and Computational Science <ul style="list-style-type: none"> • Mathematical Science • Computational Science and Engineering • Big Data Analytics • Machine Learning 	(MCS)	

2. **TITLE OF THE PROJECT** :
3. **PROPOSED DURATION OF THE PROJECT** : _____ **Months**
4. **PROJECT INVESTIGATORS & COLLABORATING INSTITUTIONS :**

INDIAN PRINCIPAL INVESTIGATOR (PI)

Name			
Designation			
Department			
Institution			
Postal Address			
	Contact Phone No. (O) & (M) :	Fax:	
E-mail			
Date of Birth :	Age as on 6 th Sept. 2017:		

JAPANESE PRINCIPAL INVESTIGATOR

Name			
Designation			
Department			
Institution			
E-mail			

5. **INDIAN CO-PRINCIPAL INVESTIGATOR (CO-PI)**

Name			
Designation			
Department			
Institution			
Postal Address			
	Contact Phone No. (O) & (M) :	Fax:	
E-mail			
Date of Birth			

6. **OTHER MEMBERS OF THE INDIAN PROJECT TEAM :**

S. No.	Name & Designation	Department & Institute	Academic Qualification & Specialization

7. **OTHER MEMBERS OF THE JAPANESE PROJECT TEAM :**

S. No.	Name & Designation	Department & Institute	Academic Qualification & Specialization

Brief Bio-data of Indian and Japanese PIs and other Indian team members highlighting the expertise in the proposed field of work alongwith list of publications highlighting those relevant to the proposed project.

8. **ONGOING / COMPLETED PROJECTS WITH THE INDIAN PRINCIPAL INVESTIGATOR :**

National Projects:

S. No.	Project Title	Sponsoring Agency	Budget	Status

International Projects:

S. No.	Project Title	Name of the Colloborating Scientist & Institiute	Sponsoring Agency	Budget	Status

B. TECHNICAL INFORMATION

- Objectives (*in bullet form*) :
- Necessity and the significance of the proposed research exchange with Japan:
(whether the proposed work could be done without the collaboration, if not please mention the complementary aspects including benefits of the collaboration)
- Past research activities in the relevent area including those with Japan and history of correspondence with the Japanes PI.
- National & International scenario in the proposed topic/theme of research (*in about 200 words*), Please provide key bibliographic references.
- Scientific & technical description of the project including methodology
- Plan of proposed research and six monthly milestones
(please describe the project's colloborative framework, division of work between Indian and Japanese sides, number of exchange visits planned with duration of each visit during each financial year from each side, up to 2 visits per year from each side)
- Expected results of the Cooperation (*for example: joint publications, patents etc.*). Are any of the expected results are likely to have commercial value? How do you propose to share it ?
- Duly filled in Check list in the prescribed format.**
- Any other relevant information:

C. FINANCIAL AND ADMINISTRATIVE INFORMATION

TOTAL COST OF THE PROJECT :

Generally limited to the extent of expenditure on approved exchange visits viz. international airfare for Indian scientists and local hospitality to the Japanese scientists as per approved norms. Major items of expenditure should be met from internal resources of the Implementing Institution or any other sources.

1. List of equipment and other facilities available in the participating Institutes for implementation of the project :
(In case facilities of other institutes are utilised, a consent letter from the these institute(s) may be neclosed)

- 2.. Exchange visits and estimated expenditure:

Items of Expenditure	1st Year	2nd Year	Total
Visits from India to Japan			
Number of visits and duration for each visit			
International to & fro Airfare by lowest economy class including airport taxes			
Related local travel in India from city parent institute to nearest International Air Port			
Visa fee			
Overseas medical insurance			
Visits from Japan to India			
Number of visits and duration for each visit			
Accommodation in Guest House			
Per diem @ 1000 per day			
local travel in India between the host institute and the nearest International Air Port			
Total			

Note :i) The PI is required to submit periodic reports and its continuation in the second year would depend upon its progress assessed by DST. At the end of each financial year, the PI is also required to submit the Utilisation Certificates and Statement of Expenditure in prescribed format.

ii) Visit of one person is to be counted as one visit.

3. Designation and address of the Authorised official in Institute/ University to receive the grant
4. A letter from the Japanese Principal Investigator agreeing with the objectives, work plan including projected visits from both sides may be enclosed.

We hereby certify the statements above to be true and correct.

Signature with Date
Indian Principal Investigator

Signature with Date
Indian Co-Principal
Investigator

CERTIFICATE OF HEAD OF THE INDIAN INSTITUTION

It is certified that

- 1) The institution agrees to participate in this joint research project;
- 2) In the event of the Indian Principal Investigator (PI) leaving the Institute due to retirement or otherwise, the Co-PI would become the PI and be responsible for completing the project and submitting the periodic progress report and financial statements;
- 3) The institution shall provide infrastructure & available facilities as mentioned above, for implementing the joint project;
- 4) The institution assumes to undertake financial & other management responsibilities for part of the project work to be carried out in this institution;
- 5) The breakup funding for manpower, consumables etc. is available to this project;
- 6) All necessary formalities as per our institution have been completed.

Signature and seal of the Head of the institution

PROPOSAL FOR DST-JSPS JOINT WORKSHOPS/SEMINARS FOR 2017-2018

(to be used by the Indian Scientists/ Researchers)

1. BROAD SUBJECT AREA:
2. TITLE OF JOINT WORKSHOPS (WS)/ SEMINARS:
3. DATES : FROM : TO: NO. OF DAYS:
4. VENUE :
5. NAME AND ADDRESS OF WS / SEMINAR COORDINATORS:

	INDIAN COORDINATOR	FOREIGN ORGANIZER
NAME DESIGNATION: INSTITUTE CONTACT ADDRESS PINCODE CONTACT PHONE, MOBILE & FAX NOS E-MAIL:		

6. STATUS OF INDIAN ORGANISING INSTITUTE
(PLEASE TICK OUT THE APPROPRIATE ITEM)
Professional Body State Govt.
Registered Society Central Govt.
Pvt. Industry Pvt. College
University Others
7. DESIGNATION OF OFFICIAL EMPOWERED TO RECEIVE FINANCIAL GRANTS *(GRANTS WILL BE RELEASED ONLY IN FAVOUR OF HEAD/ REGISTRAR OF INSTITUTION OR SOCIETY)* :
8. MAIN TOPICS TO BE COVERED AND PROPOSED PROGRAM SCHEDULE
9. EXPECTED OUTCOME:
10. BROAD DETAILS OF ESTIMATED EXPENDITURE (IN RUPEES)

Item of Expenditure	Estimated Expenditure	Grant being requested from DST
FOR WS/SEMINARS BEING ORGANISED IN INDIA:		
TA for Indian Scientists/ Invited Speakers (No. of persons may also be indicated)		
Local Hospitality for Other Participants (No. of persons x days and rate for each item may also be indicated)		
Organizational Expenses including Food, Pre-conference Printing, Typing, Stationary, transport		

etc.		
Local Hospitality for Foreign Scientists - accommodation, per diem, local travel/ transport in India etc (No. of persons x days and rate for each item may also be indicated)		
Misc (please specify)		
FOR WS/SEMINARS BEING ORGANISED ABROAD		
- International to & fro Airfare including airport taxes - related local travel in India - visa fee - Overseas medical insurance		
TOTAL		

11. DETAILS OF PARTICIPANTS IN THE EVENT :

- a) No. of Foreign scientists:
b) No. of Indian scientists:

(A list of expected participants may be enclosed. A list of foreign participants along with their passport particulars - Name, Citizenship, Passport number, Date of issue, Place of issue, and Expiry date is to be sent at a later stage but about 2 months before the event)

12. IN CASE OF WS/SEMINAR IN INDIA, INDICATE WHETHER CLEARANCE FOR PARTICIPATION OF FOREIGN SCIENTISTS HAVE BEEN OBTAINED FROM *(PLEASE TICK OUT THE APPROPRIATE ITEM)*

	<u>Received</u>	<u>Applied</u>
Administrative Ministry of the Organizer		
External Affairs Ministry		
Home Affairs Ministry		

13. PURPOSE OF THE WS/SEMINAR *(PLEASE TICK OUT THE APPROPRIATE ITEM)*

- a. Review state of art
b. Formulate specific programme of action
c. Bring out proceedings/papers in the subject
d. Other (Please Specify)

14. BRIEF OBJECTIVE OF WS/ECM HIGHLIGHTING ITS IMPORTANCE IN NATIONAL CONTEXT

Signature of applicant/
Organizing Secretary

Signature of Head of Institution or
President/ Secretary of Society

Place:

Date:

CHECKLIST

1. Title of the Project :
2. Initiating Institute of project :
3. Sponsoring Agency/Ministry :
4. Total cost of the project :
Nature and Quantum of foreign
Collaboration sought
 - (i) Financial support: :
 - (ii) Equipment support :
 - (iii) Technical support :
 - (iv) Manpower training :
 - (v) Miscellaneous :
5. Is there any possibility, however :
remote of use of data, information
of result of the work which may
impinge on India's national security?
If yes, the nature of such a use may
be indicated. (In case the concerned
scrutinizing Ministry do not have clear
answer, the matter should be referred
to the DRDO and MHA for examination).

II. ORIGIN OF THE PROJECT AND ITS SPONSORS:

6. If the proposal is foreign-originated,
what is the background of the foreign
agency or organization which is sponsoring
the project? Information available, if any on
past collaboration by foreign agency with
Indian Institution.
7. Are the foreign agency, organization, scientists
concerned, known to have taken up any project of
military significance in the past or are known to be
associated with any military organization or project?
(if the above information is not known or if
there is definite information that there is no
such association, these should be clearly
indicated).
8. Is the proposer (Indian) known to the foreign
collaborator and his group for some time and has
this emerged naturally from the research work
done by the two sides?

III. FUNDING OF THE PROJECT

9. Is the foreign source know to have funded research into sensitive and national security areas in its own country or in other countries?
10. Are there reasons to believe that the foreign source is a cover name for some other sponsor?

IV. ADMINISTRATION AND CONTROL OF THE PROJECT

11. Give a list of the likely places of visit : within the country planned by the foreign collaborator. Also give a list of the institutions which the collaborator is likely to visit.
12. Will any sensitive source material be referred to during the course of the research?
13. (I) Does the collaboration involve
 - a) Transfer of biological material(s) :
 - b) Use of radioactive materials :
 - c) Use of environmentally or otherwise hazardous material(s) :
 - d) Use of Genetically Modified Organisms :
 - e) Field trials or testing :
 - f) Ethical issues :
 - g) Issues related to Intellectual Property Rights (IPR) :
14. If answer to any section of question 13 is yes, are the investigators/ proposers aware of the relevant regulations and have they agreed to abide by them?
15. Will the research be conducted in accordance not only with the country's own ethical and environmental standards, but with international standards as well?

Signature with date of the Principal Investigator

Signature with date and seal of Head of Department/ Institute

PROJECT SUMMARY

1. Project Title:
2. Total cost of the project (Indian side) (in Rs.):
3. Duration of the Project.
4. Project Investigators (PIs) and Co-Investigators:
 - 4.1 Indian PIs
 - 4.2 Foreign
5. Other Project participants:
 - 5.3 Indian
 - 5.2 Foreign
6. Implementing Agencies / Institutions:
 - 6.1 Indian
 - 6.2 Foreign
7. Sponsoring Agency / Department / Ministry
 - 7.3 Indian
 - 7.2 Foreign
8. Administrative Ministry in Government of India:
9. Has the Project been cleared by Secretary of the Administrative/
Sponsoring Ministry/Department from security/sensitivity angle?:
Yes/No
10. If answer to (9) above is 'No', then does the Administrative/
sponsoring Ministry/Department recommend the Project to
be considered by High Level Committee of Secretaries?
Yes/No

Signature of the concerned Officer
in the Administrative/Sponsoring
Ministry/Department

ECS Details for Electronic transfer of the grant

**International Cooperation Division
Department of Science & Technology
Bank details for transfer of DST fund electronically**

Agency name as registered with DST CPMS	
Agency Code as per CPMS	
Account Holders name/ designation	
Name of Bank and address	
Saving Bank Account Number	
IFSC Code	
MICR Code	

Sanction No.	DST/INT/	(for office use)
Name of Principal Investigator		
E-mail (Agency/PI)		
Mobile No. (Agency/PI)		

I do hereby certify that the above mentioned account is an **interest bearing account** and I take all responsibility for **declaring the interest** so accrued on the released grant from DST in the SE/UC to be furnished to DST.

Signature of Finance Authority with seal

(Please note that Agency name and Account holders name should be identical.)