

# Science and Heritage Research Initiative (SHRI)

## Call for Proposals

India is one of the oldest civilisations that is rich in heritage and traditional knowledge systems in diversified areas. The Science and Heritage Research Initiative (SHRI) of the Department of Science and Technology (DST) intends to utilise modern tools and techniques of Science & Technology for preserving, protecting and presenting Indian heritage on the global platform using a multidisciplinary approach.

The proposals are invited in the following areas:

- i. **Conservation Engineering:** tools, techniques, equipment and new material development etc
- ii. **3D Digitization of Heritage Sites/Practices:** virtual, augmented, metaverse & mixed reality and gigapixel image technologies etc
- iii. **Geospatial Mapping:** cultural infrastructure development and heritage management
- iv. **Risk Assessment:** diagnosis, monitoring, and survey of heritage sites in earthquake-prone zones etc
- v. **Documentation of Folklore and Culture:** traditional dance forms, folk/classical music, musical instruments, medicinal practices, ancient rituals and traditions etc.
- vi. **Development of Heritage Clusters:** Integrated socio-economic revival of heritage practices by creating backward & forward linkages for sustainability.
- vii. **Centre of Excellence:** Centre of Excellence for cultural heritage protection and research
- viii. **Protection of Indigenous Languages:** to mainstream linguistic diversity in India towards sustainable development in alignment with Indigenous Language Decade (2022-2032)
- ix. **Science and Technology for Yoga and Meditation (SATYAM):** development and standardisation of protocols, scientific validation of Yoga and Meditation on physical, mental health and overall well-being, and studies reflecting its role in the prevention of non-communicable diseases.
- x. **Any other area related to Science & Heritage**

The last date for submission of the proposal is 31<sup>st</sup> March 2023, and the proposals should be submitted through the Electronic Project Management System (e-PMS) [www.onlinedst.gov.in](http://www.onlinedst.gov.in)

### Contact Persons:

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For details, please see the submission guidelines and format at <https://dst.gov.in>

## **Science and Heritage Research Initiative (SHRI) Guidelines and Format**

### **Who Can Apply?**

Depending on the thematic areas specified under the call for proposal, the proposal could be submitted by a Project Investigator (PI)

- (a) Government Academic Institutions (Central and State Government)/Government S&T bodies/R&D Labs working in the Heritage sector.
- (b) Private Academic Institutions (Universities/ Colleges/ Institutions and Government Aided Colleges recognised or regulated by UGC/AICTE/MCI/DCI/PCI etc.) would be considered as Non-Government Organizations (NGOs). They shall use the NGO/VO option to submit the proposal online.
- (c) S&T-based Voluntary Organizations (NGOs) with legal status or as a society registered under the Societies Registration Act 1860 or a Trust registered under the Indian Trusts Act 1982 or Charitable or Religious Act 1920 or under the corresponding State Act with at least three years of existence after registration as Society/Trust etc. Field-level experience in technology development, dissemination, delivery and management. Experience in handling projects focusing on S & T with support from Scientific Departments of the Government of India.

Any organisation blacklisted by any Central or State Government Department need not apply. In addition, Private Academic Institutions and NGOs have to submit the following documents while submitting the full proposal online on the DST Electronic Project Management System (e-PMS), <https://onlinedst.gov.in/>.

- Copy of valid registration certificate/Trust Deed
- Memorandum of Association,
- Rules and Byelaws of the Society.
- Audited Statement of Accounts
- Annual Activity Reports for the last three financial years.
- Unique ID of organisation in NGO Darpan Portal

### **Note:**

A network of individuals/institutions will be considered favourably where the project activities require multi-disciplinary, multi-institutional participation.

In the case of Heritage Practices and products, stakeholder participation is essential. The PI who are already having ongoing projects under the SHRI Programme are advised not to apply without the essential logical conclusion of the previous project.

The proposals received will be evaluated and scrutinised in phases based on the availability of funds during the current and next financial year.

The proposals will be evaluated based on its relevance to the program's mandate and its scientific and innovative content.

Only the proposals submitted to DST through the e-PMS will be considered. Submissions made through any other means (hard copies or e-mails) and proposals with incomplete information will not be considered.

#### **REVIEW PROCESS AND CRITERIA FOR SELECTION**

The proposals submitted through online portal will be evaluated by an Expert Committee (EC) constituted by the Department of Science and Technology (DST), Government of India, based on merit and compliance with the eligibility conditions. All the EC members are bound by the DST's guidelines and conflict of interest policy. The panel would recommend the proposals demonstrating the potential deliverables in processes or products, interdisciplinary research, and academia-industry-social interface. The recommendations of EC will be considered final and binding. DST reserves the right to modify the review process at any point in time. Applicants will be notified of any relevant modification to the procedure. The criteria to evaluate the received proposal are as follows, however, the weightage of each criterion will depend on the anticipated output, outcome, impact and significance to the beneficiaries.

- i. Relevance of the proposal with the Call and mandate of the program
- ii. Relevance of the objectives with the proposal
- iii. Need for proposed interventions/research
- iv. Identification of problem-based gap analysis
- v. The improvement scope over existing alternatives
- vi. Methodology and the expected outputs and outcomes
- vii. Clear delineation of roles and responsibilities of collaborators
- viii. Credibility, Track Record and Commitment of Project Team/Institute in implementing S&T-based projects

**Last date of submission: 31<sup>st</sup> March 2023**

## FORMAT FOR SUBMISSION OF PROPOSALS

### Science and Heritage Research Initiative (SHRI)

(To be filled by Project Investigator)

1. **Title of the Proposal:**

.....  
.....  
.....

Key Words

.....

2. State: .....

3. **Thematic Areas: - (Please tick mark (√))**

- i. **Conservation Engineering**
- ii. **3D Digitization of Heritage Sites/Practices**
- iii. **Geospatial Mapping**
- iv. **Risk Assessment**
- v. **Documentation of Folklore and Culture**
- vi. **Development of Heritage Clusters**
- vii. **Centre of Excellence**
- viii. **Protection of Indigenous Languages**
- ix. **Science and Technology for Yoga and Meditation (SATYAM)**
- x. **Any other area related to Science & Heritage**

4. Proposed Duration of the Project: (number of months)

5. **Total Cost: Rs./-**

Recurring Cost: Rs./-

Non-recurring Cost: Rs./-

Contribution by Host Institute (if any)

6. **Principal Investigator:**

6.1.Name:

6.2.Department:

6.3.Designation:

6.4.Organization/ Institution Name:

6.5.Address (Including Telephone (Off & Res, E-mail, Fax)

Pin:

6.6.Date of Birth:

6.7.Sex (M/F):

6.8.E-mail ID:

7. **Co-Investigator:**

7.1 Name:

7.2 Designation:

- 7.3 Department:
- 7.4 Organization/Inst. Name:
- 7.5 Address: (Including Telephone (Off & Res), E-mail, Fax), Pin:
- 7.7 Date of Birth
- 7.7 Sex (M/F):
- 7.8 E-mail ID:

**8. Capability of the Organization (s):**

- (a) Expertise available:
- (b) List of on-going and completed projects giving the following details:

Project Title	Start Date	Completion Date	Project cost	Sponsoring organization

**B. TECHNICAL DETAILS**

**1. Background**

- 1.1. Description of problem
- 1.2. Review of work already done
- 1.3. Rationale for taking up the project
- 1.4. Relevance to Heritage Science.
- 1.5. Financial resources committed at Host Institute/Industry (if any)

**2. Challenge & Constraints**

(Please identify strengths and weaknesses of the implementers vis-à-vis current project in terms of technical expertise, team building, past record etc. Also list the perceived opportunities and threats and describe how PI/Organization proposes to capitalize on them or avert them.).

**3. Description of Proposal**

- 3.1. Objectives of the project. (precise and in bullet form)
- 3.2. Preliminary Investigations or Initial work done by PI and team.
- 3.3. S&T component in the project (precise and in bullet form)
- 3.4. Novelty/uniqueness of the proposal.
- 3.5. Linkage with S&T Instts./NGO, s/resource persons/ R&D organization/ Industry for technical backup.
- 3.6. Other organizations working in this area
- 3.7. Methodology detailing stepwise activities and sub-activities.

**4. Work Plan**

(Phase-wise plan of action up to post-project activities detailing time schedule, and milestones may clearly be indicated. PERT/GANTT chart may be attached.)

**5. Expected outcome of the Project**

(Attempt may be made to quantify output in measurable parameters)

6. Deliverables of the project (precise and in bullet form).
7. Likely impact (Please quantify)
8. Parameters for monitoring effectiveness of project
9. Suggested post-project activities

**C. BUDGET ESTIMATES: SUMMARY**

<b>BUDGET</b>					
<i>(amount in rupees)</i>					
S.No	Item	1 <sup>st</sup> Year	2 <sup>nd</sup> Year	3 <sup>rd</sup> Year	Total
<b>A.</b>	<b>Recurring</b>				
1.	Manpower				
2.	Consumables				
3.	Contingency				
4.	Travel				
<b>B.</b>	<b>Non-Recurring</b>				
5.	Permanent Equipment				
6.	OverheadCharges				
<b>Grand Total (A+B)</b>					

- Financial Year: April to March.
- Count six months from submission of the proposal to arrive at expected time point for commencement of the project.
- Please provide brief justification for each head (100 words for each).

**BUDGET FOR SALARIES/WAGES**

S.No.	Designation	Monthly emoluments	Number	1st Year	2nd Year	3rd Year	Total (Rs.)	Justification or Role of the Manpower
<b>Full Time</b>								
1								
2								
<b>Part Time</b>								
<b>Total (Rs.)</b>								

- man months to be given within brackets before the budget amount

### **BUDGET FOR CONSUMABLES**

(In Rupees)

S.No	Items	Qty.	Justification	1 Year	2 Year	3 <sup>rd</sup> Year	Total
Total							

### **BUDGET FOR TRAVEL**

(In Rupees)

S.No	Description	Justification	1 Year	2 Year	3 <sup>rd</sup> Year	Total
1.	Local					
2.	Outstation					
Total						

### **BUDGET FOR OTHER COSTS**

					(In Rupees)
Items	1st yr.	2nd yr.	3rd yr.	Total	BUDGET
a. Contingencies					
b. Others					
Total					

### **BUDGET FOR PERMANENT EQUIPMENT**

<b>BUDGET FOR PERMANENT EQUIPMENT</b>				
(In Rupees)				
Sl. No.	Name of equipment *	Qty	Estimated cost	Justification
1.				
2.				
Total				

- Please give justification for each equipment.

## D.PROFORMA FOR BIODATA OF INVESTIGATORS

- A. Name:
- B. Date of Birth:
- C. Institution:
- D. General/SC/ST:
- E. Academic Career:  
Professional Career:
- F. Award/prize/ certificate etc., won by the investigator:
- G. Publication (Numbers only):  
Books Research Paper, report General articles  
  
Patents Others (please specify)
- H. List of completed and ongoing projects

Sl. No.	Title of Project	Duration	Total Cost	Funding Agency	From-To

### I. Projects Submitted by PI

Sl. No.	Title of Project	Name of the Funding Agency	Status

(Name & Signature)

Date.....

Place.....



## Annexure-I

### UNDERTAKING FROM THE PRINCIPAL INVESTIGATOR

Project Title: “

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”

1. I have carefully read the terms and conditions of the Science and Heritage Research Initiative (SHRI) Programme and I agree to abide by them.
2. I have not submitted this or a similar Project Proposal elsewhere for financial support.
3. I have no any ongoing project under the Science and Heritage Research Initiative (SHRI) Programme.
4. I shall ensure that no item/equipment available in my Institute/ Organisation, shall be purchased under this Project.
5. I shall ensure that no parking of Government money will be done on the project. I shall take the responsibility of effective utilization of the fund.
6. I undertake that idle capacity of the permanent equipment procured under the Project will be made available to other users.
7. I have enclosed the following:
  - a. Endorsement from the Head of the Organization (*on letter head*)

Principal Investigator:

Name Signature Date:

Place:

## ENDORSEMENT FROM HEAD OF ORGANISATION

*(On the official letter-head)*

Project Title: “

”

Cost:

Duration:

1. Affirmed that the Organisation welcomes the participation of Dr./Mr./Ms. .... as the PI and Dr./Mr./Ms. .... as the Co-PI for the Project and that in the unforeseen and legitimate event of discontinuation by the PI, the Co-PI will assume full responsibility for completion of the Project. Information to this effect, endorsed by me, will be promptly sent to DST
2. Affirmed that the equipment and basic as well as other administrative facilities as per the terms and conditions of the award of the Project, will be made available to the Investigator(s) throughout the duration of the Project. All the equipment purchased under the projects will remain the administrative custody of the DST unless any order regarding the same issue by the DST.
3. The Organisation shall ensure that as per the rule of GFR 2017, purchase of the equipments may done through the Government e-Marketplace (GEM), to the extent available there as the project involves government funding.
4. The organization shall ensure that under any circumstances, parking of Government Fund will not be done. The Fund will be utilized only for the purpose it was granted.
5. The organization/ institute shall ensure to use Expenditure Advance & Transfer (EAT) module of PFMS.
6. The Organisation shall provide timely the Audited Statement of Expenditure and the Utilization Certificate of the Funds under the Grant as required by DST in the prescribed format and all interests and other earnings against released Grant shall be remitted to Consolidated Fund of India (through Non-Tax Receipt Portal (NTRP), i.e. [www.bharatkosh.gov.in](http://www.bharatkosh.gov.in)), immediately after finalization of accounts, as it shall not be adjusted towards future release of Grant.

(Head of Organisation)  
Seal/Stamp

Date:

Place: