

INDIAN INSTITUTE OF TECHNOLOGY, ROORKEE
(Name of Dept./Centre)

Dated: 23/9/2025

ADVERTISEMENT TO FILL UP PROJECT POSITIONS*

Applications are invited from Indian nationals only for project position(s) as per the details given below for the consultancy/research project(s) under the Principal investigator (Name: Prof. Sneha Singh), Dept./Centre **Department of Mechanical and Industrial Engineering, Indian Institute of Technology, Roorkee.**

1. Title of project: **6G Short Range Underwater Acoustic Communication based on Meta Learning**
2. Sponsor of the project: Department of Telecommunications, (Ministry of Communications, Government of India)
3. Project position(s) and number: **JRF (Junior Research Fellow), 1**
4. Qualifications: B.Tech. (in Engineering or Sciences) with minimum 60% cumulative marks or minimum 6.0 CGPA, and M.Tech. (in Engineering or Sciences) with minimum 60% cumulative marks or minimum 6.0 CGPA.
5. Emoluments: (i) **Rs. 37000/- per month + HRA for first 2 years, and (ii) Rs 42000/- per month + HRA for remaining period**
6. Duration: 2 years 6 months, or upto the completion of the project, whichever is sooner.
7. Job description:

This is a novel project that will target at developing a sub-system for 6th generation underwater acoustic communication, as part of the initiative by the Ministry of Communications. The research idea is extremely new and has immense potential in the field of deep learning, communication technology and acoustics. The JRF will be involved in the research and development of this new technology. The specific job role involves that the JRF:

- Assist the PI in the development of Deep Meta Learning model for underwater acoustic signal classification and decoding
- Assist the PI in the development of a new 6G working prototype for Underwater Acoustic Transmitter and Underwater Acoustic Receiver.
- Assist the PI in conducting underwater experiments for testing the prototype.
- Simulation of datasets for Model training and classification.
- Write the reports and publications, arising out of this research work.
- Conduct and attend workshops/ seminars with the stakeholders.
- Assist the PI in other operational activities related to the project.

1. Candidates before appearing for the interview shall ensure that they are eligible for the position they intend to apply.
2. Candidates desiring to appear for the Interview should submit their applications with the following documents to the Principal Investigator through email only.
 - **Detailed CV** including chronological discipline of degree/certificates obtained
 - **Attested copies of degrees/certificates**
 - Experience certificate, and details of experience including research, industrial field and others (**optional**).
3. Candidate shall bring along with them the original degree(s)/certificate(s), experience certificate(s) and Score Cards at the time of interview for verification.
4. Preference will be given to SC/ST candidates on equal qualifications and experience.

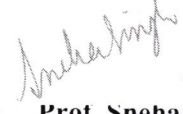
5. Please note that no TA/DA is admissible for attending the interview.

The last date for application to be submitted to office of Principal Investigator is **29 September by 11:30 PM.**

Tel: 01332 284907

Mobile: 9304468815

Email: sneha.singh@me.iitr.ac.in

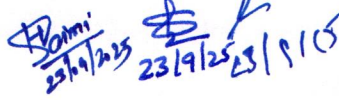

Digitally signed by Sneha Singh
DN: cn=Sneha Singh, o=IIT
Roorkee, ou,
email=sneha.singh@me.iitr.ac.in,
c=IN
Date: 2025.09.23 10:36:32 +05'30'
Prof. Sneha Singh
Name and signature
of Principal Investigator

*To be uploaded on IIT Roorkee website and copy may be sent to appropriate addresses by PI for wider circulation.

Approved



डीन (सिक)/(Dean SRIC)
भा. प्रौ. सं. रुड़की/IIT Roorkee


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