



Indian Institute of Technology Ropar
Department of Mechanical Engineering
Satish Dhawan Block (Permanent Campus),
IIT Ropar, Ropar, Punjab, India - 140001

Advertisement for JRF in SERB sponsored Project

Applications are invited from highly motivated and eligible candidates for the following SERB funded project:

Project

Title: Functionally graded materials: Thermoelastic analysis along with design framework using hybrid elements and deep learning: The project consists of the following two parts: i) Development of the FEM algorithm for the functionally graded materials ii) Development of the deep learning framework for the designing the functionally graded materials.

Project Number: SRG/2021/001594

PI: Dr. Manish Agrawal, Assistant Professor, Department of Mechanical Engineering, IIT Ropar, manish.agrawal@iitrpr.ac.in, <https://sites.google.com/iitrpr.ac.in/manish>

Number of posts: 01

It will also be possible for the selected candidate to apply for a PhD Program as per existing institute rules.

Essential Qualifications: The applicant must meet at least one of the following 2 criteria:

- i. Masters degree in Mechanical/ Civil/ Aerospace Engineering / Physics from a recognized institute and with an exceptionally good academic record with a minimum CGPA of 7.5 on a 10.0 point scale (or 70% marks) + good GATE/NET score.
- ii. Bachelor's degree in Mechanical/ Civil/ Aerospace Engineering / Physics from a recognized institute and with an exceptionally good academic record with a minimum CGPA of 7.5 on a 10.0 point scale (or 70%marks) + good GATE/NET score.

Desirable Qualifications: The candidate should have a good grasp of basic mechanical engineering subjects such as solid mechanics and engineering mathematics. Candidates having prior exposure to programming and basic knowledge of FEM will be given preference. The knowledge of deep learning is desirable but not a compulsory requirement.

Duration: Initial appointment will be for one year, which is extendable up to the duration of the project, solely based on performance.

Fellowship: As per DST guidelines.

How to apply: Fill-up and upload all the relevant documents in the Google form - <https://forms.gle/VdvFV5yaRjfhUAHe7>

Important Dates: The last date for applications: **31st January 2022, 5 PM IST.**

Selection Procedure: The shortlisted candidates will be informed through an email regarding the interview date (tentatively 1st week of February). Candidates will have an online-interview and selected candidates are expected to join by the end of February.