## INSTITUTE OF CHEMICAL TECHNOLOGY, MUMBAI

Category I Deemed to be University (MHRD/UGC) Elite Status and Centre Excellence, Govt. of Maharashtra Public Funded University

NAAC A<sup>++</sup> CGPA 3.77/4.00 NBA Accredited Programmes

Website: www.ictmumbai.edu.in

## Advertisement

Applications are invited for the post of 'Project Scientist - I

No. of Positions

**Sponsor** 

: DBT

Project entitled

: "GMP Grade Microfluidic Nanoparticle Manufacturing

Platform for mRNA lipid nanoparticles (NanoMake)" Principle Investigator

: Dr. Ratnesh Jain

**Essential Qualifications** 

: Bachelor's or Master's degree in Mechanical Engineering.

Experience and Desirable

: 2+ years of experience in microfluidic device design and

abrication.

Remuneration Year1/Year 2

: 69,440/- (Consolidated)Incl.HRA and all benefits

Year 3

: 72,912/- (Consolidated)Incl.HRA and all benefits

Duration

: Initial Appointment for 6 Months and can be extended based

on performance and fund availability.

## **Job Description:**

Design and develop microfluidic systems, including channel layouts, fluidic interfaces.

Optimize fabrication processes for microfluidic devices using techniques such as soft lithography, injection molding, hot embossing, CNC milling and 3D printing.

- Work with external fabrication facilities and vendors to produce prototypes and scale-up production.
- Evaluate and select materials for microfluidic device fabrication, focusing on properties such as permeability, surface chemistry, thermal stability and biocompatibility.
- Conduct research and development on new materials and surface treatments to improve device performance.
- Perform characterization and testing of microfluidic devices, including fluid flow analysis, pressure testing, and chemical compatibility testing.
- Validate device performance in real-world applications, ensuring reliability and reproducibility of results.
- Troubleshoot and optimize designs based on test outcomes.
- Document design iterations, fabrication processes, and testing results in detailed reports.

The applications should reach on or before January 192025. Late Application will not be accepted. Interested candidates should apply filling this here: by form, Apply https://forms.gle/XKBEnjRZsG6tgP8A8

The selection of the candidate will be carried out through Online/Physical interview. If we receive a large number of applications, scrutiny for shortlisting of candidates for interview will be done. Only shortlisted candidates will be called for an interview and a link to attend the interview and a link to attend the interview will be sent to them only. The recommendation of the committee will be final.