

## School of Natural Sciences

### Department of Chemistry

#### Ph.D. Admissions Announcement: Monsoon 2020

The Department of Chemistry in the School of Natural Sciences at Shiv Nadar University (SNU) invites applications for admission in the Ph.D. program in Monsoon Semester 2020.

Opportunities for research in chemistry at SNU are available in the following broad areas:

- Bio-inorganic Chemistry
- Catalysis
- Chemical Biology
- Chemical & Biological Crystallography
- Cheminformatics
- Computational Quantum Chemistry
- Coordination Chemistry
- Green and Environmental Chemistry
- Materials Chemistry
- Medicinal Chemistry
- Metalloradical Chemistry
- Physical Chemistry
- Polymer Chemistry
- Protein Chemistry
- Supramolecular Chemistry
- Synthetic Organic Chemistry
- Ultrafast Spectroscopy and Chemical Dynamics

Please visit <https://chemistry.snu.edu.in/people/faculty> to know more about the faculty members and their specific research interests.

Chemistry Department @ Shiv Nadar University Has Been Ranked 21 Among the Chemistry Departments across Indian Institutions by Nature Index 2020

<https://snu.edu.in/news/newsroom/chemistry-department-shiv-nadar-university-has-been-ranked-21-among-chemistry>

<https://www.natureindex.com/annual-tables/2020/institution/academic/chemistry/countries-India>

**Eligibility:** A candidate should have a Master's degree in Natural Sciences or M.Tech. in relevant areas, with a minimum of 60% marks or an equivalent grade point. Students whose Master's results (final) are awaited can still apply if they secured at least 55% marks in their 1<sup>st</sup> year of Master's. However, such students must produce a proof of minimum of 60% marks or an equivalent grade point in M.Sc. / M.Tech. before taking admission in the Ph.D. program, if qualified.

**Selection Process:** Shortlisted candidates will be intimated for appearing in written test and interview. Candidates with CSIR-UGC NET-JRF, DST-Inspire & DBT-JRF etc. fellowships will directly appear for the onsite interview.

**Fees and Financial Assistance:** Detailed information about the fee structure and the nature of assistantships are available on the website.

All full-time Ph.D. students admitted into the program shall receive a **doctoral research and teaching assistantship consisting of 100% tuition-fee waiver and 70% hostel-fee waiver**. The student shall also receive a **monthly stipend of ₹50,000 for the first two years, and ₹55,000 for the next two years** subject to bench-marked performance. The assistantship is subject to satisfactory performance in the program evaluated continuously and compliance with all University regulations.

**Application Fees:** You will be required to pay a non-refundable application fees of Rs. 1,200 (Rupees One Thousand Two Hundred Only) online. Candidate may note that the University reserves the right to accept or reject any application based on its departmental screening criteria. Hence, not all application may be shortlisted for written examination. Therefore, no requests for refund of the application fee shall be entertained whether or not the candidates are called for written examination.

**Note:** If the written test/interview are held on campus, the University will provide local transport, shared accommodation at the campus hostel, if required, and food coupon on the day of written test/interview. Additionally, for the shortlisted candidates, a return train fare, equivalent to third-AC, will be reimbursed against their original tickets.

#### **Application Instructions:**

All interested applicant shall apply online from the link given below or on the website. Please follow the instructions carefully.

- Fill all the mandatory fields
- **Online upload** of following document is required
  - Passport size color photograph
  - Current CV
  - All Mark sheets/Degree Certificates (10<sup>th</sup> Standard onwards)
  - Standardized Examination certificate- CSIR, UGC, GATE etc. (If applicable)
  - A Statement of Purpose

**Additionally, you are requested to provide one reference letter, which the referee may send directly to [hod.chv@snu.edu.in](mailto:hod.chv@snu.edu.in).** The subject heading of the email should clearly mention, “Recommendation letter for the Ph.D. Programme in Chemistry: *Applicant’s name*”.

**Please note that the application will not be considered without all the necessary prescribed documents and application fee.**

**Online submission of application has been extended until Tuesday, 30 June 2020. The dates of written test and interview (by mid of July 2020) will be notified in due course.** The start date of the Semester will be guided by the State and Central Government guidelines in view of the COVID-19 pandemic.

For any queries related to the application and admission, you may contact:

Ms. Saritha Rajan,  
Executive Assistant to the HoD,  
Department of Chemistry,  
Email: [saritha.rajana@snu.edu.in](mailto:saritha.rajana@snu.edu.in),  
Telephone: +91 120 7170118

### **About Chemistry Department (<https://chemistry.snu.edu.in/>):**

The Department is committed to pursuing research on fundamental and applied problems through scientific inquiry, and to stimulating the development of innovative interdisciplinary research programs around key areas of excellence. The immediate mission of Chemistry Department is to:

- Contribute to the advancement and dissemination of chemical knowledge through educational programs, high quality publications in peer reviewed international journals and innovative patents.
- Devise robust and novel solutions to address the needs of society by promoting research into chemical and interdisciplinary projects.
- Train undergraduate, graduate students and research fellows to generate future independent scientists for serving the needs of society, academia and industries.

Our vision is to make our world a better place through societal-impact cutting-edge research and innovation at Shiv Nadar University.

### **Research Infrastructure**

Laboratories in the School of Natural Sciences (SoNS) have state-of-the-art research facilities including fume hoods, Analytical and Prep HPLC, FPLC, GPC, flash chromatography, GC, Electrochemical analyser, MALDI-TOF with imaging, LCMS-qToF, DSC, TGA, AFM, Spectrometers (UV-visible, FTIR, NMR, Raman), Single-Crystal and Powder X-ray Diffractometer, Fluorimeter, Thermal evaporator, Glove box, Microwave furnace, Polarization loop-tracer, Bio-safety cabinets (for mammalian, bacterial and plasmodium cultures), CO<sub>2</sub> Incubators, Shaker incubators, Flow cytometry, Inverted and Polarizing Microscope, Electrophoresis apparatus, Imaging systems, Confocal Microscope, Plate reader, Cell counter, Fluorescent microscope, PCR, RT-PCR, *etc.*

Computational facilities at SNS include a high performance IBM cluster (“*Magus*”) consisting of 63 compute nodes (1008 cores +2 nodes with GPU processors) with a theoretical peak performance of 30 TF, plus 8 nodes with high-end CPUs and memory for application-specific

needs. Additionally, several Linux workstations are used for teaching as well as research purposes. Software for bioinformatics and cheminformatics, molecular modeling, molecular dynamics, quantum chemistry, crystallographic analysis, data analysis and statistical learning are also available.

Please visit the following links to know more about our research laboratories and facilities.

<https://chemistry.snu.edu.in/research/laboratories>

<https://snu.edu.in/research/facilities>

### **About Shiv Nadar University**

Shiv Nadar University (SNU) is a comprehensive, multidisciplinary, research-focused and student-centric institution that is bringing a paradigm shift in higher education in India through its innovative curriculum, interdisciplinary focus, and cross-disciplinary thinking across a wide range of disciplines. The University is building an eco-system of knowledge to promote recognition of the inter-connectedness of ideas, systems, and environments in the world inside the campus, and those outside it. The University has 5 Schools, 18 Departments and 6 Research Centers engaged in teaching, practice, and research in disciplines as diverse as Engineering, Humanities & Social Sciences, Management, Natural Sciences, Art, Design, Performing Arts, Communication, and Extended Education & Professional Development. The Schools offer Bachelor, Master's, and Doctoral degrees along with multidisciplinary curriculum to enable students to explore subjects and disciplines that may be widely different from their chosen Majors.

- The University has recently been chosen as one of the select ten private “**Institutions of Eminence (IOE)**” by the Government of India.
- In the **NIRF** (Government's National Institutional Ranking Framework), SNU has been the youngest institution in the 'top 100' *Overall* list, and the score has been rising steadily. SNU ranked 52 in the *University* category, and 77 '*Overall*' in NIRF 2019.
- The University has been accredited with ‘**A**’ **Grade** by the National Assessment and Accreditation Council (**NAAC**), valid for a period of 5 years from 26 November 2019.
- SNU is also among a select group of green-field institutions in the country, which were awarded the prestigious **Atal Incubation Center** grant by the Niti Aayog, Government of India, in the very first round in 2017.

**APPLY NOW**