



EDUCATION

Program	Institution	CGPA/%	Year of Completion
Ph.D. (Ongoing)	Environmental Engineering Division, IIT Madras	8.68	2024 (Tentative)
M. Sc. Environmental Science	Dept. of Environmental Studies, Panjab University	79.65	2019
B. Sc. (Honors – Botany)	Gargi College, University of Delhi	89.94	2017

SCHOLASTIC ACHIEVEMENTS

PMRF 2021	• Awarded the prestigious Prime Minister's Research Fellowship (PMRF) for doctoral research, February-2021.
GATE 2019	• Secured 43 rd rank in the Graduate Aptitude Test in Engineering (GATE) – Ecology & Evolution branch, 2019.
UGC-NET 2018	• Qualified University Grants Commission (UGC) National Eligibility Test (NET) for – Lectureship (LS)/Assistant Professorship, Govt. of India, in Environmental Sciences in June/December- 2018.

AWARDS

AGU Grant 2022	• Awarded the AGU Student Travel Grant Award for attending the AGU Fall Meeting 2022 in Chicago.
IIE Award 2022	• Awarded the International Immersion Experience (IIE) award by Global Engagement Office, IIT Madras, 2022.
INSA SRF 2018	• Recipient of Summer Research Fellowship (SRF) from Indian National Science Academy (INSA) for summer project at the CSIR-National Botanical Research Institute , Lucknow, 2018.
Best Student 2017	• Recipient of the Sara Thomas Award for Best student in Botany at Gargi College, Delhi University, 2017.

PROJECTS

Central Pollution Control Board, M.Sc. Dissertation, 2019	• M.Sc. Dissertation under the guidance of Dr. Sanjeev Agrawal at Bioscience Laboratory, CPCB, New Delhi, on the project titled " Study of toxicity of waste-water from Badshahpur drain and Panipat drain no.2 on aquatic life with special reference to metal and microbial contamination ", 2019.
Summer research Project, INSA-SRFP, 2018	• Summer research fellow under the guidance of Dr. Debasis Chakrabarty at CSIR-National Botanical Research Institute, Lucknow on the project titled " Isolation and functional characterization of somatic embryogenesis receptor kinase (SERK) gene in rice (Oryza sativa) " through the Indian National Science Academy summer research fellowship (INSA-SRF) program, 2018.
Innovation Project, Gargi College, 2015-2017	• Innovation project under the guidance of Dr. Aparajita Mohanty, Dr. Jasmeet Kaur Abat, and Dr. Supreeti Das, titled " DNA bar-coding for grasses of Aravalli range in Delhi region and subsequent creation of a database of DNA barcode sequence information: An essential study for formulating future conservation strategies " at Gargi College, Delhi University for two years (2015-17).

PUBLICATIONS

- **Singh, A., Raj, S. S., Panda, U., Kommula, S. M., Jose, C., ... & Gunthe, S. S. (2023). Rapid growth and high cloud-forming potential of anthropogenic sulfate aerosol in a thermal power plant plume during COVID lockdown in India. *npj Climate and Atmospheric Science*, 6(1), 109.**
- **Salim, R., Singh, A., Kalkura, K. N., Gopinath, A. K., Raj, S. S., ... & Gunthe, S. S. (2023). Investigating the applicability of a global average calibration line for ambient size-resolved Cloud Condensation Nuclei (CCN) measurements: A technical note. *Journal of Atmospheric and Oceanic Technology*.**
- **Vaishya, A., Raj, S. S., Singh, A., Sivakumar, S., Ojha, N., ... & Gunthe, S. S. (2023). Black carbon over tropical Indian coast during the COVID-19 lockdown: inconspicuous role of coastal meteorology. *Environmental Science and Pollution Research*, 30(15), 44773-44781.**
- **Singh, A., Shekhar, S., Das, S., & Abat, J. K. (2016). Bioinformatic testing of genetic variation in plastid gene matK for assessing its usage in phylogenetic studies of Bambusa species. *International Conference on Innovative Research in Agriculture, food science, forestry, horticulture, aquaculture, animal sciences, biodiversity, ecological sciences, and climate change (AFHABEC-2016)*.**

POSITIONS OF RESPONSIBILITY

Magazine Editor, ANTHESIS 2015-2017	<ul style="list-style-type: none"> • Managed the team of students in the editorial board of Botany departmental magazine for two years; being responsible for deciding the theme, co-ordinating with writers, ensuring quality and originality of articles. • As chief editor, I corrected, edited, and compiled all the plagiarism-free items in the digital magazine.
Co-convenor, AVNI: Eco-club, Gargi College, 2015-2017	<ul style="list-style-type: none"> • I played a pivotal role in forming the AVNI: eco-club of college and conducting its inaugural function in 2015. • Volunteered in conducting various cleanliness, recycling and plantation drives to engage and sensitise the students of the college towards environment.

COURSE WORK AND SKILLS

Aerosol Science and Technology	Environmental Chemistry and Microbiology	Air Pollution and control engineering
Environmental Quality Monitoring	Contaminant Transport Modelling	Processes for water & wastewater treatment
Programming Languages: MATLAB Python LaTeX	Softwares: LabView IgorPro Adobe Illustrator SoFi PMF Evaluation Tool AIM HYSPLIT ZeFIR Microsoft Excel Microsoft Power point	

TEACHING ASSISTANTSHIP EXPERIENCE

Aerosol Science and Technology	Climate Dynamics and its Mysteries	Air Pollution and control engineering
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CONFERENCES, SEMINARS, AND WORKSHOPS

- National Workshop on **Atmospheric Aerosol Measurements and Modelling over India: Past decade, Status and Challenges ahead**, at College of Engineering Munnar, July 2023
- **American Geophysical Union (AGU) Fall Meeting – 2022** in Chicago, USA, December 2022
- Five-day Departmental **PMRF symposium**, Department of Civil Engineering, IIT Madras, October 2021