

Curriculum Vitae

Ambrish Pandey

Department of Physics, Indian Institute of Technology Roorkee, Haridwar 247667, India

Academic Degrees

- 2016 - M. Sc. - Ph. D. (Dual Degree), Department of Physics, Indian Institute of Technology Kanpur, Kanpur 208016, Uttar Pradesh, India
- 2008 - B. Sc. (Honours) in Physics, Department of Physics, Banaras Hindu University, Varanasi 221005, Uttar Pradesh, India

Employment

- Jan. 2023 — present: Assistant Professor, Department of Physics, Indian Institute of Technology Roorkee, India
- Dec. 2019 — Dec. 2022: Research Associate, Center for Space Science, New York University Abu Dhabi, UAE
- Nov. 2016 — Nov. 2019: Post-Doctoral Fellow, Institut für Thermo- und Fluidodynamik, Department of Mechanical Engineering, Technische Universität Ilmenau, Germany

Awards

- *Best Paper Award of the TU Ilmenau 2020* for the article “Turbulent Superstructures in Rayleigh-Bénard convection”, *Nature Communications* **9**, 2118 (2018).
- Junior Research Fellowship, conducted by the Council of Scientific and Industrial Research (CSIR), India.

Editorial

- Associate Editor, *European Journal of Mechanics B/Fluids* (since 2024)
- Reviewer for *Journal of Fluid Mechanics*, *Europhysics Letters*, *Scientific Reports*, *European Journal of Mechanics B/Fluids*, *Chaos: An Interdisciplinary Journal of Nonlinear Science*, *Zeitschrift für Angewandte Mathematik und Mechanik (ZAMM)*, *Physics of Fluids*

Research Visits

- January 2016 to March 2016, as guest scientist to Technische Universität Ilmenau, Germany

Invited Talks

- Title: *Attempts to approach solar convection parameters—but a long way to go*, Field Theory and Turbulence, ICTS Bengaluru, India (Dec. 2023)

PhD Students

- Shreshthi (since 2023)

Important Publications (see also [Google Scholar](#) and [ORCID](#))

- A. Pandey and K. R. Sreenivasan, *Turbulent Convection in Rotating Slender Cells*, *J. Fluid. Mech.* **999**, A28 (2024). [pdf](#)
- A. Pandey, J. Schumacher, and K. R. Sreenivasan, *Non-Boussinesq low-Prandtl number Convection with a Temperature-dependent Thermal Diffusivity*, *Astrophys. J.* **907**, 56 (2021). [pdf](#)

- E. Fonda*, **A. Pandey***, J. Schumacher, and K. R. Sreenivasan, *Deep learning in turbulent convection networks*, [Proc. Natl. Acad. Sci. USA **116** \(18\) 8667—8672 \(2019\). pdf SM](#) [*equal contribution]
- **A. Pandey**, J. D. Scheel, and J. Schumacher, *Turbulent Superstructures in Rayleigh-Bénard convection*, [Nat. Commun. **9**, 2118 \(2018\). pdf SM](#)
- **A. Pandey** and M. K. Verma, *Scaling of large-scale quantities in Rayleigh-Bénard convection*, [Phys. Fluids **28**, 095105 \(2016\). pdf](#)