## Basic Details:


- **Name: Dr. R. Aruna Devi**
- **Designation**: Assistant Professor
- **Phone Number:** 7358541617
- **Email ID:**arunadeviramsankar@gmail.com
- **Area or Subject:** Mathematics
- **Affiliation:** Department of Mathematics, Ramapuram, SRM Institute of Science and Technology


## Educational Details:

- · **Ph.D. Mathematics** – SRM University – 2024
- · **M.Sc. Mathematics** – Madras University - 2020
- · **B.Sc. Mathematics** – Madras University – 2018

**Research Interests:** Rough set theory, rough graph theory

## Publications:01


- K. Anitha, R. Aruna Devi, Mohammed Munir, Kottakaran Soopy Nisar, "Metric dimension of rough graphs," The International Journal of Nonlinear Analysis and Applications. (2021), Vol.12, 1793-1806. ISSN: 2008-6822. DOI: http://dx.doi.org/10.22075/ijnaa.2021.5891.
- R. Aruna Devi, and K. Anitha, "Construction of Rough Graph through Rough Membership Function," Mathematics and Statistics, (2022), Vol. 10(6) , 1344-1353. DOI: 10.13189/ms.2022.100622
- R. Aruna Devi, and K. Anitha, "Exploring Diverse Rough Neighborhoods Through Graphical Analysis," International Journal on Recent and Innovation Trends in Computing and Communication, (2023), Vol. 11(9), 2299-2306. ISSN: 2321-8169.
- R. Aruna Devi, and K. Anitha, "Exploring Metric Dimensions for Dimensionality Reduction and Navigation in Rough Graphs," Mathematical Modelling of Engineering Problems, (2024), Vol

11, No.4, 1037-1043, https://doi.org/10.18280/mmep.110421

- R. Aruna Devi, and K. Anitha, "Developing a framework for rough graphs," AIP Conference Proceedings, (2023), 2587, 100008, https://doi.org/10.1063/5.0150534.
- R. Aruna Devi, R. Nithya and K. Anitha, " Applications of Rough Sets in Graphs," Proceedings of Second National Virtual Conferencee on Recent Advances in Technology and Engineering, (2021), ISBN: 978–93–X90631–89-6 (Conference Proceedings)
- R. Aruna Devi, and K. Anitha, " Tensor Product on Rough Path Graph," Proceedings for the Multi-Disciplinary International Conference on Artificial Intelligence in E-Commerce, (2022), ISBN: 978-93-91977-04-7 (Conference Proceedings)

## Academic Experience:

- SRM Institute of Science and Technology, Ramapuram, Assistant Professor, from 10.06.2025 to till date

**Other Professional Experience:** NIL

## Other Details:

**Achievements and Awards:**

**Certifications – NPTEL Courses**

- NPTEL Online Certification – Graph Theory
- NPTEL Online Certification – Engineering Mathematics – I

**Membership:**

IAENG (International Association of Engineers)