Faculty Profile

Name: **Dr. Anjanna Matta**

Designation: **Associate Professor**

Teaching Areas: Differential Equations, Numerical Analysis, Probability & Statistics, Linear Algebra

Research Interests: Numerical Modeling, Computational Fluid Dynamics, Convection in porous media, Hydrodynamic stability, Machine learning.

Education:
- **Ph.D.,** Indian Institute of Technology, Hyderabad, 2016
- **M.Tech.,** Indian Institute of Technology, Madras, 2010
- **M.Sc.,** National Institute of Technology, Warangal, 2004

Research / Selected Publications: Total Scopus (28) in that SCI(21)

1. Sucharitha, G, Sitharamulu, V, M. S. Nandan , **Anjanna Matta**, Jose, Deepa, Enhancing Secure Communication in the Cloud through Blockchain Assisted-CP-DABE, *IEEE Access*, (2023).

2. Rafeek, K.V.M., Reddy, G.J., Matta, A., Beg, O.A., Effect of viscous dissipation and internal heat source on mono-diffusive thermos convective stability in a horizontal porous medium layer, *Special Topics and Reviews in Porous Media*, 2023, 14(1), pp. 17–28.

3. Gundlapally Shiva Kumar Reddy,Ravi Ragoju, Prasenjit Dey, **Anjanna Matta**, Nonlinear magneto convection in an inclined porous layer with artificial neural network prediction, **Mathematical Methods in the Applied Sciences**, (Impact Factor 3.17, Q1) SCIE journal, 1–12, 2022.

4. **Anjanna Matta** and G. Nagaraju, The influence of double diffusive gradient boundary condition on micropolar nano fluid flow through stretching surface with a higher order chemical reaction, **Int. J. Computing Science and Mathematics**, (**Impact Factor 1.4**) Vol. 14, No. 3, 2021.

5. **Anjanna Matta** and G. Nagaraju, The detailed study of thermal instability analysis in an inclined porous medium, *AIP Conference Proceedings*, (**Impact Factor 0.4**)   2020, 2246, 020079.

6. **Anjanna Matta,** On the stability of hadley-flow in a horizontal porous layer with non-uniform thermal gradient and internal heat source, **Microgravity Science and Technology**, *(*SCI Journal) (2019) 1-7.

Published Books : 2

Ongoing Projects:
- **Project (SERB-TAR/2018/001290):** The effect of heat source on non-Newtonian fluid flow through a horizontal porous bed.