

### **Personal Information:**

Name	Ms K. Sowmya
Years of Experience	Teaching: 15 years
Email Id	sowmya.k@bvrithyderabad.edu.in
Areas of Specialization	Physics



### **Educational Qualifications:**

Doctoral Degree	PhD	Pursuing from JNTUH
PG Degree	M. Sc	Physics
UG Degree	B. Sc	Math, Physics and Computers

**Name:** *Kanakamedala Sowmya*

**Designation as per JNTUH ratification:** *Assistant Professor*

**JNTUH Faculty ID:** *0698-150412-171801*

### **Journals:**

- Published a paper on “**NANOMATERIAL RISKS FOR HUMANS AND THE ENVIRONMENT – MAKING INNOVATIONS SUSTAINABLE**” in **International Journal of Research Culture Society**, Special Issue - 8, Feb - 2018. UGC Approved Monthly, Peer-Reviewed, Refereed, Indexed Journal Impact Factor: 3.449.
- Published a paper on “**ULTRASONIC STUDIES ON BINARY LIQUID MIXTURE OF O CHLOROTOLENE WITH 2-PROPANOL AT 303.15K TO 318.15K**” in **International Journal of Research in Medical and Basic Sciences**, Vol.03 Issue-05, (May 2017), ISSN: 2455-2569, Impact Factor: 4.457.
- Published a paper on “**DESIGN AND FABRICATION OF A SOLAR SPRAYER**” in **International Journal of Science Technology and Management**, Vol. No.6, Issue No.05, May 2017.
- Published a paper on “**Influence of Metal (Al, Mg, Sm and Cu) Dopants on Structural, Optical, Magnetic and Antimicrobial Properties of ZnO Nanopowders Synthesized by Co-Precipitation**” - International journal “**Phys. Status Solidi A**” of impact factor 2.0, Volume-221, Issue-2, October 2023, Online ISSN:1862-6319, Print ISSN:1862-6300.
- Published a paper on “**Impact of pH on structural, morphological, optical, and magnetic properties of zinc oxide nanopowders synthesized by co-precipitation method**” - International journal “**Journal of Materials Science: Materials in Electronics**” of impact factor 2.5, Volume-35, Article -972, May 2024, ISSN: 0957-4522, eISSN: 1573-482X.

- Published a paper on “Investigation of the Structural, Electrical, and Optical Properties of Co-Precipitation- Synthesized Aluminum-Doped ZnO Nanostructures” - International journal “International Journal for Research in Applied Science and Engineering Technology (IJRASET)” of impact factor 7.5, Volume-12, Issue-6, June 2024, Online ISSN:2321-9653.

### *Conferences:*

- Presented paper in second National Conference on “RECENT ADVANCES IN APPLIED NANOMATERIALS”, February 16-17, 2018 at Department of Physics, University College of Science, Saifabad, Osmania University, and Hyderabad.
- Presented paper in International Conference on “EMERGING TRENDS IN ENGINEERING AND MANAGEMENT RESEARCH”, IETE, Pune, India, and ISBN: 978-93-86171-46-7.
- Presented paper in CSIR sponsored National Conference on “Applied Physics over current Scenario 2023” on the topic - “Influence of Metal (Al, Cu, Sm, Mg) Ions Doping on Structural, Magnetic and Optical Properties of ZnO Nanopowders Synthesized by Co-Precipitation Method ” - May 2023.
- Presented abstract in National Conference on “Functional Materials for Sustainable Energy & Information Technology” on the topic - “ZnO nanoparticles produced at varying pH levels:Structural and Optoelectrical properties” - Nov 2023.

### *Patent:*

- Published patent on “STRATEGIES FOR EFFECTIVE MATHEMATICS PEDAGOGY WITH TECHNOLOGY” June 2024.
- Published patent on “METHODS FOR ENHANCING PROBLEM –SOLVING AND CRITICAL THINKING IN MATHEMATICS” June 2024.
- Published patent on “ENHANCED ANTIBACTERIAL ACTIVITY OF ALUMINUM-DOPED ZNO NANOPARTICLES SYNTHESIZED VIA PRECIPITATION METHOD” August 2024.

## *FDP's, Workshops, Courses Attended / Conducted*

- Attended a one-week online **Faculty Development Program** on “**Materials: Recent Trends & Engineering Applications**” during 02 - 07 June **2020** organized by GOKARAJU RANGARAJU Institute of Engineering and Technology.
- Attended a 1- week **Faculty Development Program** on “**DEVELOPING TEACHING COMPETENCIES IN TEACHERS OF HIGHER EDUCATION**”, during 13 - 19 June **2017**, under the scheme of PMMMNMTT, MHRD, Govt. of India, TLC, and NIT Warangal.
- Attended one Week Hybrid **Short Term Training Programme** on “**Green Energy For Sustainable Development**” during March 18-22, 2024 organized by Department of Electrical and Instrumentation, Engineering, Sant Longowal Institute of Engineering & Technology Sant Longowal Institute of Engineering & Technology, (Deemed to be University under MoE, Govt. of India).
- Attended one Week Hybrid **Faculty Development programme** on “**National Education Policy 2020 - Challenges in implementation in Higher Education**” during 18-23rd March 2024 organized Department of EEE, IT and Physics, Chaitanya Bharathi Institute of Technology, Hyderabad, Telangana in association with IEEE Education Society Student Branch Chapter CBIT and IEEE Young Professionals.
- Attended One Week Online **Workshop** on “**Empowering Educators in the Age of Artificial Intelligence**” during 12th to 18th February - 2024 organized by Kannur Salafi B.Ed. College -Kannur, Kerala,Tamilnadu Teachers Education University - Chennai, Gandhi Shikshan Bhavan'S Smt. Surajba College Of Education - Mumbai.
- Attended one week Hybrid International**Faculty Development programme** on “**Advanced Functional Materials: Energy, Environment & Sustainable Development**” during 26th February 2023 to 5th March 2023, organized by SRM TRPEngineering College, Tiruchirapalli.
- Conducted one week online International **Faculty Development programme** on “**Innovations in High - Performance materials for sustainable energy and Environmental Impacts**” during 29th April 2024 to 4th May 2024, in BVRIT HYDERABAD College of Engineering for women.