# KIRTHIKA VENKATACHALAM

**Assistant Professor, Department of Physics,**

**St. Antony's College of Arts and Sciences for Women, Dindigul**

## PROFILE

- Talented Assistant Professor in Department of Physics employing creative teaching strategies to engage students fully in the learning process. Driven to inspire students to achieve personal and academic success. Accomplished lecturer who effectively articulates information and responds honestly to questions from students. I am committed to mentoring students and supporting their academic and professional growth.

## EDUCATION

- Pursuing Doctorate of Philosophy, in Physics
  Madurai Kamaraj University,
  Dindigul, Tamilnadu

## SKILLS

**Communicate**

- Articulate Information Clearly.
- Comprehend Written Content.
- Interpret Work-Related Documents.

**Reason and Problem Solving**

- Engage in Active Listening.
- Evaluate Concepts.
- Assimilate New Information.
- Employ Reasoning.
- Diagnose Issues.
- Generate Innovative Ideas.
- Determine Necessary Adjustments.

## LANGUAGES

- English
- Telugu
- Tamil

## AREA OF SPECIALIZATION

- Specialized in **Thin Film Technology and Nanotechnology**, with a profound expertise in the synthesis, characterization and applications.

## TEACHING EXPERIENCE

| Course Taught | Name of the College | Duration |
|---|---|---|
| **B. Sc** | **St. Antony's College of Arts and Sciences for Women, Dindigul** | **6 years** |

## PUBLICATIONS

- Characterization of Pure and Al-Zn Doped Conducting SnO2Thin Films for Gas Sensors. Bodhi International Journal of Research in Humanities, Arts and Science. E-ISSN: 2456-5571
- Morphological and Optical Properties of Pure and Aluminium Doped Tin Oxide Nano Crystalline Thin film Prepared by Spray Pyrolysis method.
  ISBN: 978-81-937152-1-5
- Aluminium Doped Tin Oxide (ATO) Thin Films Grown onto Glass Substrate by Spray Pyrolysis Technique. DOI: 10.30799/jtfr.028.22070101
- Annealing Effect on Nanocrystalline SnO2 Thin Films Prepared by Spray Pyrolysis Technique. https://doi.org/10.30799/jnst.330.21070301
- Preparation and characterization of Al doped $SnO_2$ Nanocrystalline thin films by Spray pyrolysis technique International Journal for research in applied Science & Engineering Technology, DOI: 10.22214/ijraset.2020.2027
- Effect of annealing on the structural, Optical and Electrical properties of Al-Zn Co-doped $SnO_2$ thin films Materials Research Innovations, DOI:10.1080/14328917.2019.1628498.

## PAPER PRESENTED IN THE CONFERERENCE

- Presented a Research Paper entitled **"Fusarium solani mediated eco-benign hydrothermal synthesis of Tio2 nanostructures and their antibacterial activity"** in the "International Conference on Advanced Materials for Clean Energy and Health Applications organized by Coimbatore Institute of Technology, Coimbatore collaboration with Western Norway University of Applied Sciences during 19th & 20th, September 2023.
- Presented a Research Paper entitled **"ANTIBACTERIAL ACTIVITIES OF BIOGENYDIMENSIONAL ZnO2" NANORODS** 2nd International Virtual Conference on Materials Science and Applications (ICMSA'24) organized by PG & Research Department of Physics, Seethalakshmi Ramaswami College, Tiruchirappalli, Tamil Nadu, India during 1st – 2nd February 2024.

## CONFERENCE/SEMINAR/WEBINAR/ /WORKSHOP ATTENDED

| S. No | Title | State/National International | Count |
|---|---|---|---|
| 1 | Conference | International | 9 |
| 2 | Faculty Development Program | - | 20 |
| 3 | Webinar | National | 10 |
| 4 | Webinar | International | 1 |
| 5 | Webinar | - | 38 |
| 4 | Seminar | State | 2 |
| 5 | Workshop | - | 3 |
| 6 | Seminar | International | 1 |
| 7 | Symposium | | 2 |
| 8 | Hands on training | - | 2 |

## ACTED AS RESOURCE PERSON

- Acted as a Mentor for Atal tinkering Lab in Vidhya Bharathi Public School, Dindigul.
- Acted as a Resource Person in 31" National children science congress organized by Tamil Nadu Science forum in Sri Vasavi Matriculation Higher Secondary School, Dindigul.

## AWARDS RECEIVED

- Received Best Program Coordinator Award from Nehru Yuva Kendra, Ministry of Youth Affair, Dindigul.