## Dr. P. SANJAY

sanjayphysics15@gmail.com

## Objective

Work innovatively for the enhancement and betterment of education. I aspire to work for an institution which offers career growth and chances to learn and improve my knowledge.

#### Experience

- Total years of teaching experience: 4 years
- Working as Assistant Professor in the Dept. of Physics, Thiruthangal Nadar College, Chennai from June 2020.
- Worked as Assistant Professor in the Dept. of Physics, Apollo Arts and Science College, Chennai from May 2019 till March 2020.
- Worked as Assistant Professor in the Dept. of Physics, Sri Muthukumaran Arts and Science College, Chennai from June 2018 till March 2019.
- Worked as Assistant professor in the Dept. of Physics, Indian Arts and Science College, Thiruvannamalai, from June 2014 till May 2016.
- Worked in Educall as NEET trainer from June 2017. Taking CBSE Physics classes for +1 & +2 students.

Degree/ Course	Name of the Institution	University / Board	Year of Passing	Percentage of Marks
Ph.D PHYSICS	Govt. Arts College for Men, Nandanam	University of Madras	Degree Awarded May 2019	
B.Ed PHYSICS	Krishnaa College of Education	Tamil Nadu Teacher University	2015	76% Distinction
M.Sc PHYSICS	Govt. Arts College for Men, Nandanam	University of Madras	2014	76% Distinction
B.Sc PHYSICS	Indian Arts And Science College	Thiruvalluvar University	2012	73%

# **Educational Qualifications**

## **Technical Skills**

- Personal Computer Programme (PCP)
- MS Office

### **Research Publications**

- The preparation of dye sensitized solar cells using natural dyes extracted from Phytolacca icosandra and Phyllanthus reticulatus with ZnO as photoanode. **Materials Letters**, 244 (2019) 142–146. (Impact **2.68**).
- Performance of TiO<sub>2</sub> based dye-sensitized solar cells fabricated with dye extracted from leaves of *Peltophorum pterocarpum* and *Acalypha amentacea* as sensitizer, *Materials Letters*,219 (2018) 158–162. (Impact **2.68**)
- Dye-Sensitized Solar Cells Using Natural Dye as Light-Harvesting Material Extracted from the Leaves of *Peltophoroum Pterocarpum, Materials Today: Proceedings*, 8 (2019) 123-129.
- Natural Dyes Extracted from Fruits of *Phyllanthus reticulatus* as Sensitizers in ZnO Nanorods Based dye Sensitized Solar Cells, *Materials Today: Proceedings*, 8 (2019) 284-293.
- Performance of TiO<sub>2</sub> Based Dye-Sensitized Solar Cells Fabricated Using Coomassie Brilliant Blue in Acetonitrile Solution, *Materials Today: Proceedings*,8 (2019) 130-135.
- Optical, spectral and photovoltaic characterization of natural dye extracted from leaves of *Peltophorum pterocarpum* and *Acalypha amentacea* as sensitizers for ZnO based dye sensitized solar cells, *Optical materials*, 83 (2018) 192-199. (Impact 2.32).
- Synthesis, Structural, Morphologigal and Optical Characterization of TiO<sub>2</sub> and Nd<sup>3+</sup> Doped TiO<sub>2</sub> Nano Particles by Sol Gel Method: A Comparative Study for Photovoltaic Application. IOP Conf. Series: Materials Science and Engineering 360 (2018) 012011.
- Synthesis and Spectroscopic Characterization of CdSe Nanoparticles for Photovoltaic Applications. IOP Conf. Series: Materials Science and Engineering 360 (2018) 012010.
- Crystal Growth and Characterization of A Novel Non Linear Optical Single Crystals of Urea Phthalic Acid. IOP Conf. Series: Materials Science and Engineering 360 (2018) 012032.
- Growth and Spectroscopic Studies on L-Tartaric Acid Doped Potassium Dihydrogen Phosphate Nonlinear Optical Single Crystal. IOP Conf. Series: Materials Science and Engineering 360 (2018) 012043.
- Synthesis Growth and Characterization of L-Leucenium Hydrogen Maleate Single Crystals For Nonlinear Optical Application. IOP Conf. Series: Materials Science and Engineering **360** (2018) 012044.
- Fabrication of *DSSC* with Nanostructured TiO<sub>2</sub> Photo Anode and Natural Dye Sensitizer extracted from fruits of *Phyllanthus reticulatus*, *IJSRST* 4(5) 437- 443.
- Investigation on the Structural, Optical and Thermal Behaviour of Terbium (Tb<sup>3+</sup>)Doped CdSe Nanorods by Hydrothermal Method, *International Journal of Chem Tech Research*, Vol.10 No.5, pp 1034-1037, 2017.

- Effect of Tb<sup>3+</sup> doping on structural, optical and electrical behavior of CdSe nanoparticles prepared by Hydrothermal method, *International Journal of Engineering Development and Research*, Vol.5 No.1, (2017) 453-459.
- Structural, Morphological and Optical Characterization of Eu<sup>3+</sup> and Nd<sup>3+</sup> Co-Doped TiO<sub>2</sub> Nano Particles by Sol Gel Method, *Mechanics, Materials Science & Engineering,* 2017.
- Growth, Characterization and theoretical studies on nonlinear optical single crystal of L-Alanine Oxalate, 2017 RJPBCS 8(4) Page No. 845-856.
- Structural, Optical, Morphological, and Dielectric Properties of CdSe Nanoparticles by Hydrothermal Method, *International Journal of Scientific & Engineering Research*, Vol. 7, No 8, (2016),1144-1148.

#### **Paper Presentations**

- International conference on physics of material science and technology (ICON 2018),PG& Research Department of physics, Government Arts College for men (Autonomous) Nandanam, Chennai-35 on 13<sup>th</sup> February 2018.
- International conference on materials for energy and environment (ICMEE 2018), Loyola institute of frontier energy (LIFE), Loyola College (Autonomus) Chennai-34 on 22&23<sup>rd</sup> February 2018.
- International conference on materials science and technology (ICMST-2016) on 5-8 June 2016, St. Thomas College, Palai, (Kerala).
- National conference on preparation and characterization of Crystalline Materials (NCPCCM-2016), Department of physics, Government Arts college, Tiruvannamalai from 4<sup>th</sup> & 5<sup>th</sup> August 2016.
- National conference on materials for modern world (NCMMW-2016), Easwari Engineering College Ramapuram, Chennai-89, during 15<sup>th</sup> &16<sup>th</sup> September 2013.
- International conference on materials processing and applications (ICMPA-2016), center for crystal growth school of advanced sciences, VIT University, Vellore during 14<sup>th</sup> -16<sup>th</sup> December 2016.
- UGC sponsored National Conference on "Innovative trends in Materials Science & technology: Recent trends and future prospects (NCMST: RTFP-2016), PG& Research Department of Physics Arignar Anna Government arts College, Villupuram, Tamilnadu during 29-30<sup>th</sup> December 2016.

### **Faculty Development Programmes**

- Teaching Using ICT Tools organized by IQAC, Department of BCA & Department of IT, J P College of Arts & Science held on 20-24 May 2020.
- One Week National Level Online FDP (19<sup>th</sup> 23<sup>rd</sup> May) for Trainers on "Mastering the Art of Handling Post Covid Challenges for Sustainable Development" organized by the Faculty of Humanities and Science, Dr. MGR Educational & Research Universities, Maduravoyal, Chennai.
- FDP on Data Science Research Opportunities organised by Department of Information Technology, Sri Ramakrishna College of Arts and Science, Coimbatore-06, held on 21-05-2020.
- Two Day e Faculty Development Program on "VIRTUAL TEACHING Learning MOODLE the Efficient way" organized by the Faculty of Humanities and Science, Dr. MGR Educational & Research

Institute on 29<sup>th</sup> May 2020 and 30<sup>th</sup> May 2020.

• FDP on PRIME pedagogy organized by MEASI Institute of Management20.11.2020

#### Seminars/Workshops

- National level seminar on recent advancements and challenges in science and technology, PG& Research Department of physics, Government Arts College for men Nandanam, Chennai-35 on 10<sup>th</sup> January 2018.
- National Workshop on Solar PV System Design, Department of Electronics and Communication Science & PG Department of Physics, Justice Basheer Ahmed Sayed College for Women, Chennai 18 on 22<sup>nd</sup> August 2017.
- International Webinar on Sample Preparation for TEM and Data Analysis Department of material Science , School of chemistry, Madurai kamaraj University, Madurai, Tamilnadu, India.
- International Webinar on Recent Trends in Material Science, Pg & Research Department of Physics, Muthurangam Government Arts College(A) Vellore-632 002.
- Research Challenges In Solar -PV Systems, Department of Electrical & Electronics Engineering, RAJALAKSHMI ENGINEERING COLLEGE Thandalam- 602 105.
- International Webinar on Recent Trends in Physics, Department of Physics with Computer Applications & Internal Quality Assurance Cell (IQAC) of St. Joseph's College (Arts & Science), Kovur, Chennai.
- Nanoscale materials with different dimensions for advanced application, Department of chemistry, Mannar thirumalai naiker college, Madurai, Tamilnadu, India.
- Molecular Communication for Wireless Body Area Networks, Aurora's Degree & PG College, Hyderabad 500020.
- International Webinar Advanced Materials for Energy Applications, Aurora's Degree & PG College, Hyderabad 500020.
- Current Trends in Nanotechnology Nature Inspired Surface Engineering, Aurora's Degree & PG College, Hyderabad 500020.
- National E-Workshop on "Teaching Skills Development" Government College Patharia, Dist.-Damoh (M.P.) from 22.03.2021 to 24.03.2021
- Workshop on hands on training on development of e-content (MOODLE) & Educational video creation conducted by CIT TLC on 23.01.2021 & 24.01.2021.
- Workshop on Comprehensive e-learning to e-training guide for administrative work TLC, Ramanjuan College, University of Delhi from 25.05.2020 to 05.06.2020 .

# Awards & Recognition

Reviewer, Materials today Proceeding, Elsevier Journal (June 2020)

Place:

Date :

(Sanjay. P)