Name of Faculty Dr. B. M. Pratima Designation Assistant Professor

Nature of Job/Appointment Contract

Date of Joining 23 - 03 - 2021

E-mail bmpratima_physics@cbit.ac.in

Education Qualifications Name of the Degree Class

> Ph. D Doctor of Philosophy (Physics), IIT Madras Awarded PG First M. Sc (Physics)

> UG B. Sc (M.P.CS) First

> > Class Incharge

Applied

Work Experience

10 Years Teaching

Research Ph. D (5 years)

Industry Others

Area of Specialization Thin films-surface modification

Member, IAENG (291590) Professional Memberships

Responsibilities held at Institution Level

Co-Incharge WBC 1. Responsibilities held at Department Co-incharge, Library related activities, NIRF 2.

Level

Research Guidance

Awards/ Scholarships Received

Courses Handled at Under Graduate /

Post Graduate Level.

National Journals -International Journals - 01

Electromagnetic Theory And Quantum Mechanics

No. of Papers Published National Conference – International Conference - 03

3.

Engineering Physics,

Projects Carried out

One filed in IIT Madras

Subrahmanyam A, Pratima BM "TITANIA-SILICA COATING FOR METAL Patents

SURFACES AND OPTICAL COATING APPLICATIONS" Patent Application

Physics,

Waves

And

Optics,

no. 201841035409.

Technology Transfer Invited Speaker (Few Important/Prominent)

No. of Books/Chapter Published with

details

One Day International Conference in " Novel Corona and Novel Challenges-Life ahead with Covid-19" organized by Sri Guru Gobind Singh College on 03rd June, 2020

2. Completed an online course titled" Nanotechnology-A Maker's course" by Duke University, North Carolina State University and The University of North Carolina at Chapel Hill and offered

through Coursera on 28 June, 2020

3. Online Faculty Development Program on "Advanced Materials for Energy Harvesting, Conversion and Storage" organized by Department of Science and Humanities, MLR Institute of Technology, Hyderabad during 19th – 23rd June, 2020

National Level Five Day faculty development program on "Scilab"" in Association With IIT-Bombay (Remote Learning Through Spoken Tutorial)," from 15th - 19th June 2020.

Details of Short-Term Training Programs/Faculty Development Programs/Seminars/Workshops. Other Trainings (Attended and/or Organized).



- 5. Online Faculty development Program on "Online skill enhancement for Academicians" by IEEE Bangalore Section-Jain College of Engineering, Belgavi on July 8th-9th, 2020.
- 6. webinar on "Analytic skills for Engineers and MBAs" hosted by SKILL EDGE in association with FTPO on 26.05.2020
- webinar titled "Beyond motivation: engaging students (online and offline) on 16.06.2020 conducted by Cambridge Assessment English
- 8. ACs webinar titled " ACS guide for scholarly Communication Expert advice for Early career researchers" on 27 May, 2020
- 9. webinar "Align Yourself to The Publishing Process" at K.S. Rangasamy College of Technology, on Thursday 18 June, 2020
- webinar on "Transforming Humanity Through Sustainable Development" organized by Department of Applied Science at IARE-Hyderabad on June 8th-9th, 2020
- 11. Webinar on "Developing Soft Skills for Employability: An Alltime Challenge", Organized by ASBM University, Bhubaneswar held on 2nd June, 2020
- 12. webinar titled "Art and challenges in Writing Papers for IEEE Transaction" organized by IEEE Bangalore Section on 8th June, 2020
- 13. live webinar "How to Publish with Oxford Journals" On 11th June 2020 organized by EBSCO
- National E-Seminar on "Intellectual Property Rights (IPR) and Patent Filing" organized by Innovation and Entrepreneurship Cell of Karmaveer Bhaurao Patil College on 23rd June 2021
- webinar on "IPR Regime and Access to Vaccine and Medicines as Fight against Covid-19" organized by Himachal Pradesh Council for Science, Technology and Environment on 23rd June 2021
- 16. one-day online workshop on "Magnetoelectric composites" on 23 June 2021
- 17. webinar on "Solar Power Inverters" hosted by Sri Chandra Sekarandra Saraswathi Viswa Maha Vidyalaya in association with Pantech E-Learning on 28 June 2021
- National Level Webinar on "Fuel cells Thermodynamics and its Applications", Organized by Department of Mechanical Engineering, VFSTR Deemed to be University, Vadlamudi, Guntur Dist, Andhra Pradesh, India held on 10th July 2021
- 19. module "How to integrate sex, gender, and intersectional analysis into research" on Thursday 15 July, 2021 online on Researcher Acedemy.
- 20. online webinar "Integrating Scopus in Research Workflow" at Elsevier, Research Academy on Wednesday 14 July, 2021
- 21. National webinar on "Recent Advances in Chemistry" organized by Govt.GNA PG College, Bhatapara (C.G.) on 26 July 2021
- 22. online FDP on "Chemistry for Societal Advancements" from 26th-31st July, 2021.
- 23. national webinar on Recent Advances in Drug
 Development for Mankind (RADDM 2021), organized by the
 Department of Chemistry, GITAM Institute of Science, GITAM
 (Deemed to be University), Visakhapatnam on 11 Aug 2021.
- 24. national Level Faculty Development Program (FDP) on "Materials for Photonic Applications" conducted during 9th-13th August, 2021

- National Level webinar on "Intellectual Property Rights: Copyright and Patents" organised by C.D, Jain College of Commerce, Shrirampur, Ahmendnagar (Dist.) held on 27.08.2021
- 26. National Webinar on "Online Education in Technical Institutions:
 A new normal" organized by School of Chemical Technology,
 Harcourt Butler Technical University, Kanpur on Aug 27, 2021.
- 27. AICTE Training And Learning (ATAL) Academy Online Elementary FDP on "Improving Personal Effectiveness at Workplace" from 1-5 Sep 2021 by Sikkim University.
- 28. Webinar Series on "Excellence of Women in the Field of Science and Technology" jointly organised by the Department of Physics and Centre for Nanoscience and Nanotechnology, Sathyabama Institute of Science and Technology, Chennai through virtual mode from 13-23rd September 2021.
- 29. One Day National Webinar on 'THEORETICAL AND PRACTICAL ASPECTS OF POWDER COATINGS' organized by Department of Paint Technology, School of Chemical Technology in association with Paint and Coating Technologists' Association (PACT), Harcourt Butler Technical University, Kanpur on September 18, 2021.
- webinar titled "Engineering Education in The Virtual World-Solving India Specific Grand Challenges", on Wednesday 15th September, 2021 at Delhi Technological University
- 31. NPTEL AICTE Faculty Development programme in the course "Soalr Photovoltaics Fundamentals, Technology and Applications" during Jul-Sep 2021.

Details of Journal Publications/ Conferences (National and International)

International Journal: Impact Factor: IF

- As-deposited sol-gel made TiO₂-SiO₂ films as protective coatings for silver, B. Manikya Pratima, K. Uday Kumar, and A. Subrahmanyam AIP Conference Proceedings 2265, 030259 (2020) https://doi.org/10.1063/5.0017089 (I.F: 0.415 in 2020)
- 2. Detection of copper by localized surface Plasmon resonance-based fiber optic technique, N. Aruna, K. Chandra Mouli, P. V. N. Kishore, B. M. Pratima, N. Rajeswara Rao, and J. Ashok Proc. SPIE 11772, Optical Sensors 2021, 117720I (18 April 2021); https://doi.org/10.1117/12.2589085 (I.F.: 0.45 in 2021)
- 3. Multi U-bent cladded POF sensors for refractive index measurement P. V. N. Kishore, N. Aruna, B. M. Pratima, N. Rajeswara Rao, and J. Ashok, Proc. SPIE 11772, Optical Sensors 2021, 117720U (18 April 2021); https://doi.org/10.1117/12.2589198 (I.F: 0.45 in 2021)

Journal Publications

1. Pratima, B.M., Valleti, K. and Subrahmanyam, A., 2018. Optical and mechanical properties of Solgel prepared Titania (TiO₂)-Silica (SiO₂) mixed thin films 'as prepared at 300 K' without any post heat treatment. Materials Research Express, 6(2), p.026407.(I.F: 1.48 in 2018)