



BMS Institute of Technology & Management
Avalahalli, Yelahanka, Bengaluru - 560 064
Department of Physics

Event Name	Five Days Faculty Development Program (FDP)
Topic	Techniques for Characterization of Materials
Date	20 th June 2017 to 24 th June 2017
Event Name	Seminars / Expert Talks by our faculty members
Highlights of the event	<ul style="list-style-type: none"> ➤ Hands on experience on data analysis of PXRD, FTIR & Raman Spectra with case studies. ➤ Live demonstrations. ➤ Distinguished scientists from premier institutions will be delivering invited talks.
Number of Participants benefited with this	External candidates: 43 Numbers and Internal candidates:37 Numbers.
Day wise session details	<p>Day 1:- Prof. J. Lakshman Rao from S V University delivered the keynote address on 20th June 2017 and he gave the importance of characterization and briefed about the advanced characterization techniques and their importance. The second session was by Prof. Surya Prakash, IISc. Bengaluru explained about the One and Two dimensional NMR and their applications to Chiral Chemistry. The day was ended with the third session by Prof. Chandrabhas Narayana, JNCASR, Bengaluru and he explained in detail the Raman Spectroscopy, both the instrumentation and the characterization techniques.</p> <p>Day 2:- Second day was started with the lecture by Prof. C. Shiva Kumar, IISc. Bengaluru explained about the powder X-ray diffraction techniques (PXRD) and its importance. Second lecture was by Dr. Daruka Prasad B, BMSIT&M explained about the Rietveld refinement techniques and its importance. The last session was the lab visit by the participants to Advanced Materials Lab and the case study session of Rietveld refinement arranged at MCA lab, 2nd Floor, BSN Block. These lab sessions were engaged by Dr. Dhananjaya and Dr. Daruka Prasad B.</p> <p>Day 3:- First session of this day was by Prof. K.S.R. Koteswara Rao, IISc. Bengaluru explained about the photoluminescence studies and its importance. Second session was by Prof. S.M Shivaprasad, JNCASR, Bengaluru who explained about the X-ray Photoelectron Spectroscopy and its advantages. Last session was by Dr. Chandashree Das, BMSCE, Bengaluru explained about Thin film deposition and characterization techniques.</p> <p>Day 4:-Prof. Ravi Shankar, IISc. Bengaluru explained in detail about the scanning electron microscopy (SEM) and transmission electron microscopy (TEM). Second session was by Prof. Satish M K, Bengaluru University on the overview of Nano biotechnology and its biomedical applications. The day was completed with the lab sessions of the same as it was done on day 2.</p> <p>Day 5:- This day was started with the talk by Dr. N. Dhananjaya on Fourier Transformation infrared spectroscopy and UV-Visible spectroscopy. After this the FDP was ended with the valedictory session.</p>

