

Seminar on “*Discotic Nanoscience*” by Prof. Sandeep Kumar, Raman Research Institute, Bangalore, India

Date: 21/06/2019

Place: Salle B014 Calais

Time: 10h00

Abstract of the talk:



In this talk, I will present our recent results on the dispersion of various zero-, one-, and two-dimensional metallic, semiconducting and carbon nanoparticles in the supramolecular order of columnar mesophases. After brief introduction of liquid crystals and discotic nanocomposites, the effects of nanoparticles dispersion on thermal, electrical, supramolecular and nonlinear optical properties of DLCs will be presented.



Speaker’s Introduction: Professor Sandeep Kumar is currently working as senior Professor at the Raman Research Institute (RRI), Bangalore, India. He is heading the Soft-Matter research unit at the RRI. His area of research is discotic liquid crystal and its nanocomposites for opto-electronic, photonic and photovoltaic applications. He has published more than 250 research articles in reputed journals like Nature, Chemical Society Reviews, Advanced Materials, Journal of American Chemical Society etc. He also authored two books entitled “Chemistry of Discotic Liquid Crystals: from monomers to polymers (CRC Press)” and Liquid Crystal Dimers (Cambridge University Press) and 11 book chapters. He is also having 8 patents in his credit. He is an authority in the field of discotic liquid crystals (number one in the world, please see Web of Science with key word “discotic liquid crystal”).