

# Two Days Workshop On Synthesis of Nanoparticles (Nano ferrite Materials) At Shoolini University

## **Introduction:**

On 23<sup>rd</sup> and 24<sup>th</sup> of September 2024, under the guidance of Principle Prof. Bharti Bhagra, the Department of Chemistry and Physics of COE Sanjauli went for Hands on training of Nanoparticles at Shoolini University under Star DBT College Scheme.

## **Event Details:**

### **Day 1:**

On the very first day of visit, 15 students and two teachers from COE Sanjauli had an interactive and demonstrative session with Dr. Rohit Jasrotia (Head and Assistant Professor at department of Nanotechnology at Shoolini University) highlighted the various topics like the preparation of Nanoparticles in which he certainly described about the preparation of Nano ferrite through Sol-Gel Auto combustion method. He discussed the fundamental principles governing the behavior of these materials at nanoscale, applications of nano ferrite material, their structure and their different properties.

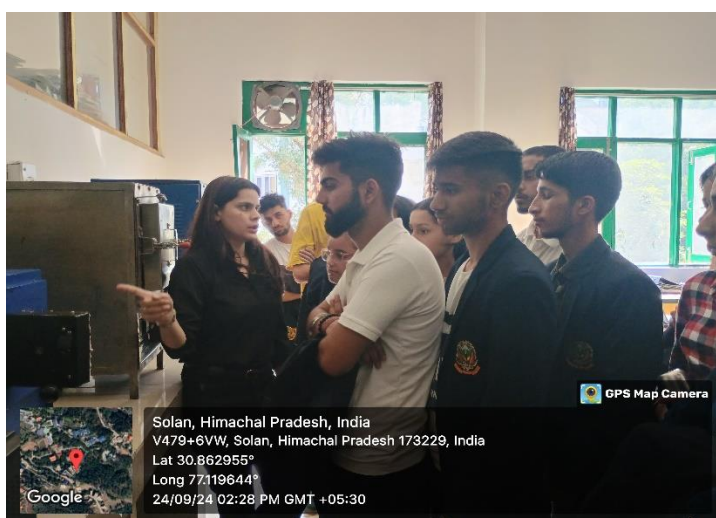
Interactive Session by Miss. Himanshi Malik, PhD scholar of the university demonstrated the preparation of Nano ferrites through hands on experiment.

Apart from this student also visited their F block specifically department of Nanotechnology.

Students also learned about the Sol-Gel Autocombustion method for the preparation of soft ferrites of  $ZnFe_2O_4$  practically. They also shared their working experience with the students.

### **Day 2:**

On the 2<sup>nd</sup> day, students further got to see the remaining process which was left on Day 1. They saw how the material forms the gel and autocombust by itself. Further they got to know about how it will be processed further and about the test that will determine its structural and magnetic properties. They got familiar with machineries that are involved in the analysis of the final product.



Apart from this, students had a visit to campus exploring the various areas like –  
Department of Chemistry



Library



Department of Physics

Photo Gallery



Sports Complex



### **Conclusion:**

The visit to Shoolini University was very much informative. It provided lots of knowledge in the research field and hands-on-experiment. The positive response and active participation of the students indicate a growing awareness in the experimental and research field.

नैनोफेराइट कार्यशाला  
में शामिल हुए विद्यार्थी  
शिमला। संजौली कॉलेज के  
भौतिक और रसायन विज्ञान विभाग  
के 15 विद्यार्थियों ने डीबीटी स्टार  
कॉलेज योजना के तहत शूलिनी  
विश्वविद्यालय सोलन में आयोजित  
नैनोफेराइट निर्माण पर आयोजित  
कार्यशाला में भाग लिया। कार्यशाला  
में नैनो प्रौद्योगिकी विभाग के प्रमुख  
डॉ. रोहित जसरोटिया ने विद्यार्थियों  
को सोल जेल ऑटो दहन विधि के  
माध्यम से नैनोफेराइट की तैयारी  
करने के बारे में जानकारी दी।  
कार्यशाला में संजौली कॉलेज के  
विद्यार्थियों के साथ शिक्षिका डॉ.  
कीर्ति सिंह और योगेश कुमार ने  
भाग लिया। ब्यूरो