

## NCPRE NEWS!

### We focus to see the best possible of Nano world

National Centre for Photovoltaic Research and Education (NCPRE), IIT Bombay, has entered the Worldwide Zeiss Microscopy Image Contest 2021. With the ZEISS Microscopy Image Contest 2021, ZEISS celebrates its 175th anniversary year by honoring the work of scholars who use microscopy in a variety of sectors. More than 1,300 fascinating entries were submitted by ZEISS customers from more than 50 countries.

NCPRE, IIT Bombay received 4th place in honorable mentions in this contest, and the most fascinating fact that it is the only one from India. This image was captured using a Carl Zeiss “Field Emission Scanning Electron Microscope” by Vishal Ramkar, Project Engineer working under the guidance of Prof. Sagar Mitra at NCPRE, IIT Bombay. The sample was prepared by Tuhin Subhra Sahu, Project Research Engineer at NCPRE. To give it a 3D feel and make it more interactive, it was reconstructed and colored it using an image analysis software platform.

The results of the ZEISS Microscopy Image Contest 2021 can be found here:

[https://www.zeiss.com/microscopy/int/cmp/ind/fy-20-21/zeiss-microscopy-image-contest-2021-winners.html?utm\\_source=linkedin&utm\\_medium=social&utm\\_campaign=imagecontest2021](https://www.zeiss.com/microscopy/int/cmp/ind/fy-20-21/zeiss-microscopy-image-contest-2021-winners.html?utm_source=linkedin&utm_medium=social&utm_campaign=imagecontest2021)

**About Image:** Zeolite imidazolate frameworks (ZIF) are a class of metal oxide framework (MOF) where metal ions (Zn) are connected tetrahedrally with organic imidazolate linkers. They have excellent thermal and chemical stability. More importantly, with micro/mesoporous structures such MOF can be used for several applications like gas adsorption, catalytic reactions, and energy storage purposes. The uniform dispersion of ZIF nanoparticles is depicted in this image.

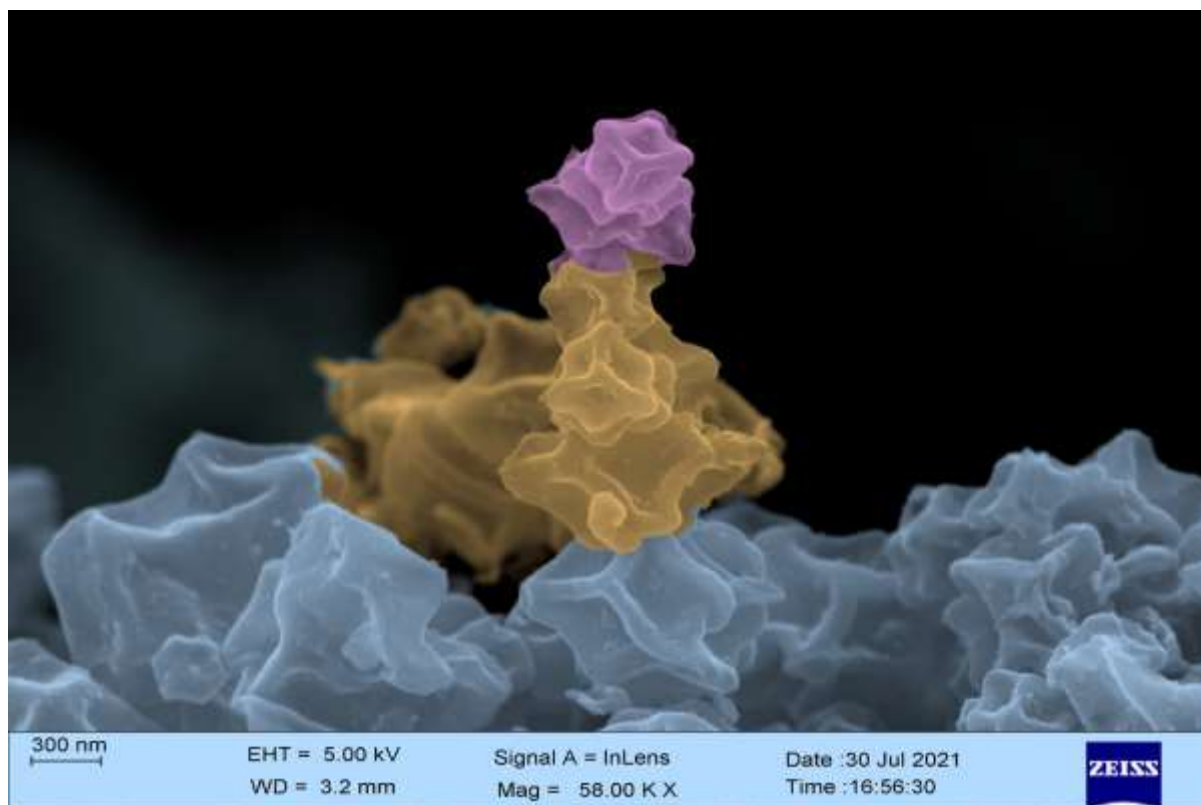


Image: ZIF - 8 Metal Oxide Framework (MOF)