List of Publications

- R. Mishra, S. Gupta, A. Kumar, R. Prakash, "Morphology-controlled approach for bulk synthesis of conducting Poly (5-aminoindole)." *Mater. Chem. Phys.* 183 (2016) 606-614, DOI: 10.1016/j.matchemphys.2016.09.023.
- R. Mishra, S. Mishra, C. Upadhyay, R. Prakash, "DDAB-Triggered, Size-Sorted, Instant Phase-Switching of Silver Nanoparticles." *ChemistrySelect* 2 (2017) 3028-3034, DOI: 10.1002/slct.201602012.
- R. Mishra, R. K. Pandey, C. Upadhyay, R. Prakash, "Self-Assembly of Solution-Processable Polyindole via Langmuir-Blodgett Technique: An Insight to Layer-Dependent Charge Transport and Electronic Parameters." *ChemistrySelect* 2 (2017) 6009-6015, DOI: 10.1002/slct.201700794.
- 4. **R. Mishra**, N. R. Nirala, R. K. Pandey, R. P. Ojha, R. Prakash, "Homogenous dispersion of MoS₂ nanosheets in polyindole matrix at air-water interface assisted by Langmuir technique." *Langmuir* 2017, DOI: 10.1021/acs.langmuir.7b03019.
- R. Mishra, R. K. Pandey, R. Prakash, "Mobile liquid-substrate for self-assembly of solution-processable poly (5-aminoindole) by Langmuir technique." *Vacuum* 2018, DOI: 10.1016/j.vacuum.2018.04.013.
- 6. **R. Mishra**, R. K. Pandey, S. Jana, C. Upadhyay, R. Prakash, "Interfacial dispersion of phase transferred silver nanoparticles into polyindole Langmuir film and ordering enhancement for electronic device application." (Communicated).

As Co-author in other work but not related to Ph.D. thesis:

- 7. R. K. Pandey, **R. Mishra**, P. Tiwari, R. Prakash, "Interface engineering for enhancement in performance of organic/inorganic hybrid heterojunction diode." *Organic Electronics* 45 (2017) 26-32, DOI: 10.1016/j.orgel.2017.02.032.
- 8. P. Tiwari, M. Srivastava, **R. Mishra**, G. Ji, R. Prakash, "Economic use of Waste Musa Paradisica Peels for effective control of mild steel loss in aggressive acid solutions." *J. Environ. Chem. Engg.* 6 (2018) DOI: 10.1016/j.jece.2018.07.016
- 9. R. K. Pandey, **R. Mishra**, R. Prakash, G. Ji, "Layered deposition of air-water interface grown, edge on oriented and ultrathin squaraine film over copper substrate for its effective corrosion prevention" (Communicated).
- R.P. Ojha, R. Mishra, N.R. Nirala, R. Prakash, MoS₂ quantum dot stabilized silver nanoparticles for instant naked-eye colorimetric detection of mercury (II) ion (Communicated).

List of Publications

Seminar and Symposium

- Workshop on "Advanced microscopy and imaging techniques" organised by Olympus and IIT BHU, August, 2015.
- International conference on Nanomaterials and Nanotechnology (NANO-2015), KSR institutions, Chennai (Poster presentation).
- Workshop and Conference on "International Conference on Electron Microscopy" organised by Electron Microscope Society of India and IIT BHU, 2016.
- 18th National Symposium in Chemistry, CRSI-2016, Punjab University, Punjab (Poster presentation).
- International Conference of Young Researchers on Advanced Materials (IUMRS -ICYRAM 2016), Indian Institute of Science, Bangalore (Poster presentation).
- 6. NCEEIS-2017, K.N.P.G College, Varanasi (Poster presentation).
- Advances in Biological Systems and Materials Science in Nano World (ABSMSNW-2017), Department of Physics, IIT (BHU) (Poster presentation).
- 4th International Conference on Nanoscience and Nanotechnology-2017 (ICONN-17),
 SRM University, Chennai (Poster presentation).
- International Conference on Thin Films (ICTF-2017), NPL, Delhi (conference proceedings).
- 10. 4th International conference on Electrochemistry at Italy, 2018 (Oral presentation).
- International conference on Advanced Materials, Energy and Environmental stability (ICAMEES), Dehradun, 2018 (Oral presentation).