### **Faculty Profile**

**1. Name:** Dr. Nirupama

2. Department: Chemical Engineering

3. Email id: nirupama.che@bitsindri.ac.in

**4. Phone Number:** +91 9771313741

5. Office Address: Department of Chemical Engineering, B.I.T. Sindri,

Dhanbad

#### 6. Qualification:

S. No	Degree (UG, PG, PhD)	Specialization	Institute
1.	UG	Chemical Engineering	Punjab Technical University
2.	PG	Chemical Engineering	I.I.T. Roorkee
3.	PhD	Chemical Engineering	I.I.T. Roorkee

**7. Area of Specialization:** Polymer composites, Risk assessment

**8. Subjects Taught:** Safety and hazards in Chemical Industry, Process control and instrumentation, Heat transfer

### 9. Professional Experience:

#### I) Teaching Experience:

Sl. No.	Position held	Name of Organization
1.	Assistant Professor (Under NPIU-TEQIP)	B.I.T. Mesra, Ranchi
2.	Visiting Assistant Professor	B.I.T. Mesra, Ranchi
3.	Assistant Professor	B.I.T. Sindri, Dhanbad

### **II) Research Experience:**

Sl. No.	Position held	Name of Organization	From	То

### **III) Industrial Experience:**

Sl. No.	Position held	Name of Organization
1.	Process Engineer	PDIL, Noida, New Delhi



# 11. Publications:

### I) International Journal:

Sl. No.	Title of the paper	Name of the journal in which publication has been made	Acceptance year
1.	Physico-mechanical properties of coir fiber/LDPE composites: Effect of chemical treatment and compatibilizer	Korean Journal of Chemical Engineering	2015
2.	Banana Fiber Reinforced Low-density Polyethylene Composites: Effect of Chemical Treatment and Compatibilizer	Iranian Polymer Journal	2016
3.	Thermal degradation of coir fiber reinforced low-density polyethylene (LDPE) composites	Science and engineering of composite materials	2016
4.	Hybridization effect of coir fiber on physico-mechanical properties of polyethylene-banana/coir fiber hybrid composites	Science and engineering of composite materials	2016
5.	Cadmium removal from aqueous solution by jackfruit seed bio-adsorbent	Springer Nature Applied Sciences	2020
6.	Thermo-chemical potential of solid waste seed biomass obtained from plant Phoenix dactylifera and Aegle marmelos L. Fruit core cell.	Bioresource Technology	2021
7.	Waste biomass valorisation of Bambusa vulgaris dust and Delonix regia pods: Characterization and kinetic study	Sustainable Energy Technologies and Assessments	2022
8.	Enhanced biogas production potential analysis of rice straw: Biomass characterization, kinetics and anaerobic co-digestion investigations	Bioresource Technology	2022
9.	Sustainable valorization of water hyacinth waste pollutant via pyrolysis for advance microbial fuel investigation	Chemosphere	2022
10.	Sustainable valorization of Cascabela thevetia fruit peel and seed waste biomass: characterization and thermokinetic analysis	Biomass Conversion and Biorefinery	2023

# 12. Conference/ Workshop/Seminar/ Organized

Sl.	Title of	Name of	Funding /	Date of	No. of
No.	Seminar / Conferences /	Coordinator	Sponsoring	Seminar /	<b>Participants</b>
	Short – term Courses		Agency	Conferences /	
				Short – term	
				Courses	
					ļ.

## 13. Symposium/ Workshop/Seminar/ Attended

S.N	Workshop	Place	Duration
1.	Summer Training Programme on Advanced	IIT Hyderabad	June 10-14, 2019
	Pedagogies		
2.	Faculty Induction Workshop	IIT Kharagpur	February 6-10, 2018
3.	Workshop on Industrial Process Simulation	BIT Mesra,	May 16-20, 2018
		Ranchi	

### 14. Project Experience:

Sl. No.	Organization	Position	Description
1.	B.I.T. Mesra, Ranchi	PI	A research project entitled "Development of nanofiller reinforced ionomer-based polymer nano-composite for radio freq. absorber" under "TEQIP Collaborative Research Scheme" with a grant of ₹1460000 (Rupees Forteen Lakh Sixty Thousand Only).