



TULSIRAMJI GAIKWAD-PATIL College of Engineering and Technology

Wardha Road, Nagpur - 441108

Accredited with NAAC A+ Grade

Approved by AICTE, New Delhi, Govt. of Maharashtra

(An Autonomous Institution Affiliated to RTM Nagpur University)



Department of Biotechnology

B. Tech Biotechnology
BBT4707: Protein Engineering

BBT3501	Course Outcomes
CO1	Understand the importance and applications of protein engineering, and the fundamentals of protein structure, function, folding, and stability
CO2	Analyze computational methods for protein design, structure prediction, molecular dynamics simulations, and protein interactions
CO3	Evaluate mutagenesis techniques, library construction, screening methods, and high-throughput screening platforms in directed evolution
CO4	Apply protein engineering techniques such as site-directed mutagenesis, rational design, grafting, loop engineering, disulfide engineering, and glycoengineering
CO5	Explain the classification, structure, kinetics, inhibition, and industrial applications of enzymes, as well as the effects of pH, temperature, Michaelis-Menten kinetics, and enzyme regulation