

TYPICAL B.S. CHEMICAL ENGINEERING CURRICULUM

Chemistry

General Chemistry, Organic Chemistry, Physical Chemistry, Analytical Chemistry

Math

2 years of calculus, linear algebra, differential equations, numerical methods

Fundamentals

Physics, Mechanics, Properties of Materials, Fluid Mechanics, Engineering Economics

Chemical Engineering Fundamentals

thermodynamics, Heat transfer, Mass transfer, Reaction kinetics, Engineering Design, Unit Operations & Laboratory, Process Dynamics & Control

Chemical Engineering Specialties

(Bio)medical Engineering, (Bio)Chemical Engineering, Environmental Engineering, Electrochemistry, Petroleum Engineering, Polymer Engineering, Nuclear Engineering, Food Engineering

Non-Technical

English, Technical Writing, Graphics, Ethics, Liberal Arts, ,