

Processing Equipment and Control Engineering

Objectives

Students who complete the undergraduate program in Processing Equipment and Control Engineering will:

1. Acquire the basic professional knowledge on mechanical engineering, chemical engineering, thermal power engineering, control engineering and management engineering.
2. Demonstrate the ability to master chemical processing engineering technology especially design method, manufacturing technology and monitoring technology of pressure vessel.
3. Obtain the basic knowledge to develop new equipment and technology and know about the frontier problems and development status of processing equipment and control engineering.
4. Master a foreign language and acquire basic computer knowledge and general software to programming.

Core Courses

Title	Hours	Credit
Descriptive Geometry and Mechanical Drawing	72	4.5
Principle of Mechanics	48	3
Mechanical Design	48	3
Engineering Mechanics	120	7.5
Engineering Fluid Mechanics	56	3.5
Engineering Thermodynamics and Heat Transfer Theory	64	4

Principle of Chemical Engineering	64	4
Process Equipment Design	64	4
Process Fluid Mechanics	56	3.5
Process Equipment Control Technology and Application	64	4

Graduation & Degree Requirements

Students have to gain at least 179 credits to graduate, among which 105 credits from compulsory courses, 37 credits from selective courses and 37 credits from practice teaching. Students have to pass CET-4 to gain the Bachelor degree.

Career Prospects

About 3/4 graduates work in oil and petrochemical companies engaging in products design, production management, research and development, and marketing. The other 1/4 graduates choose to continue their study in Master's programs at China University of Petroleum-Beijing, Tianjin University, Zhejiang University, or Chinese Academy of Sciences, among others.