



University of Pretoria Yearbook 2022

Laboratory 321 (CLB 321)

Qualification	Undergraduate
Faculty	Faculty of Engineering, Built Environment and Information Technology
Module credits	16.00
NQF Level	07
Programmes	BEng (Chemical Engineering) BEng (Chemical Engineering) ENGAGE
Prerequisites	CJJ 310/CJJ 210, CHM 226, CPN 321#, CKN 321#, (CMO 310), CIO 320#
Contact time	2 lectures per week, 8 practicals per week
Language of tuition	Module is presented in English
Department	Chemical Engineering
Period of presentation	Semester 2

Module content

Laboratory safety and general industrial safety practices. Techniques for planning of experiments. Experimental work illustrating: Analysis: Composition of coal and gas, heat of combustion, viscosity. Mass transfer: Gas absorption, batch distillation, azeotropic distillation, fractional distillation and liquid-liquid extraction. Heat transfer: Condenser, shell and tube heat exchanger, heat loss from insulated pipes. Piping system design: Frictional energy loss through pipes and fittings. Measuring equipment: Rate of flow, temperature. Reporting of laboratory results.

The regulations and rules for the degrees published here are subject to change and may be amended after the publication of this information.

The [General Academic Regulations \(G Regulations\)](#) and [General Student Rules](#) apply to all faculties and registered students of the University, as well as all prospective students who have accepted an offer of a place at the University of Pretoria. On registering for a programme, the student bears the responsibility of ensuring that they familiarise themselves with the General Academic Regulations applicable to their registration, as well as the relevant faculty-specific and programme-specific regulations and information as stipulated in the relevant yearbook. Ignorance concerning these regulations will not be accepted as an excuse for any transgression, or basis for an exception to any of the aforementioned regulations.