

University of Pretoria Yearbook 2025

Advanced plant food science and technology 402 (FST 402)

Qualification Undergraduate

Faculty Faculty of Natural and Agricultural Sciences

Module credits 20.00

NQF Level 08

Prerequisites FST 360 or permission from the HOD.

Contact time5 practicals S1, 5 discussion classes in semester 2, 3 practicals S2, 8 discussion

classes in semester 1

Language of tuition Module is presented in English

Department Consumer and Food Sciences

Period of presentation Year

Module content

Plant food functionality: Starch, non-starch polysaccharides, protein. Advanced rheology and texture. Malting and brewing. Ready-to-eat (RTE) technologies and their impact on functional and nutritional quality. Plant oil processing. Minimal processing of fruits and vegetables. Practical work: Pasting properties of starch; Dough rheology; Isolation of legume and cereal proteins; SDS-PAGE electrophoreses of legume and cereal proteins; Malting and mashing of sorghum and barley malt; Extraction of essential oils; Extraction and identification of phenolic compounds; Minimal processing of fruits and vegetables.

General Academic Regulations and Student Rules

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. The G Regulations are updated annually and may be amended after the publication of this information.

Regulations, degree requirements and information

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



University of Pretoria Programme Qualification Mix (PQM) verification project

The higher education sector has undergone an extensive alignment to the Higher Education Qualification Sub-Framework (HEQSF) across all institutions in South Africa. In order to comply with the HEQSF, all institutions are legally required to participate in a national initiative led by regulatory bodies such as the Department of Higher Education and Training (DHET), the Council on Higher Education (CHE), and the South African Qualifications Authority (SAQA). The University of Pretoria is presently engaged in an ongoing effort to align its qualifications and programmes with the HEQSF criteria. Current and prospective students should take note that changes to UP qualification and programme names, may occur as a result of the HEQSF initiative. Students are advised to contact their faculties if they have any questions.