

University of Pretoria Yearbook 2022

Algebra 731 (WTW 731)

Qualification Postgraduate

Faculty of Natural and Agricultural Sciences

Module credits 15.00

NQF Level 08

Programmes BScHons (Mathematics and Mathematics Education) (Algebra and Analysis)

BScHons *Mathematics*

Prerequisites Algebra on third-year level

Contact time 2 lectures per week

Language of tuition Module is presented in English

Department Mathematics and Applied Mathematics

Period of presentation Semester 1

Module content

The following topics will be covered: Galois theory and solving equations by radicals, introduction to the theory of R-modules, direct sums and products, projectivity and injectivity, finitely generated modules over Euclidean domains, primary factorisation, applications to Jordan and rational canonical forms of matrices.

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.