University of Pretoria Yearbook 2021

MPhil Agricultural Economics (Coursework) (07255251)

Department	Agricultural Economics, Extension and Rural Development
Minimum duration of study	2 years
Total credits	180
NQF level	09

Admission requirements

1. Relevant honours degree
   or
   relevant postgraduate diploma (PGDip)
2. A cumulative weighted average of at least 65% for the honours degree or postgraduate diploma

Other programme-specific information

The degree programme must be completed within four years after the first registration.

Please note that not all modules are presented every year.

Curriculum: Year 1

Minimum credits: 180

Core modules

Institutional economics 882 (LEK 882)

Module credits	15.00
NQF Level	09
Service modules	Faculty of Economic and Management Sciences
Prerequisites	No prerequisites.
Contact time	1 lecture per week
Language of tuition	Module is presented in English
Department	Agricultural Economics Extension and Rural Develo
Period of presentation	Semester 1

Module content

Institutional and behavioural economics. This module will expose students to the principles of the New Institutional Economics paradigm and how it can be utilized to improve the analysis of agricultural economic and agricultural development problems and issues. Major themes covered are: The agricultural development challenge: stylised features; new institutional economics: distinctive features and concepts; institutions and development: A historical and macro-perspective techno-economic characteristics and agricultural systems and products in poor countries; NIE analysis of markets and markets structures; the State: Political and institutional determinants of agricultural policy; collective action; transactions costs in smallholder agriculture; case studies.

Elective modules

Quantitative methods for agricultural and environmental policy 814 (LEK 814)

Module credits	15.00
NQF Level	09
Service modules	Faculty of Economic and Management Sciences
Prerequisites	No prerequisites.
Contact time	1 lecture per week, 1 practical per week
Language of tuition	Module is presented in English
Department	Agricultural Economics Extension and Rural Develo
Period of presentation	Semester 1

Module content

Quantitative models for agricultural and environmental policy. This module will introduce students to applications of discrete choice and linear regression models to agricultural and environmental economics. These include demand systems, production functions and treatment effects/impact assessment models. The second part of the class will focus on mathematical programming and numerical methods including but not limited to multisector models, Input-output and programming models and social accounting matrices for consistent production planning, growth, income distribution and trade policy analysis. Computable general equilibrium models.

Partial equilibrium modelling and commodity market analysis 820 (LEK 820)

Module credits	15.00
NQF Level	09
Service modules	Faculty of Economic and Management Sciences
Prerequisites	EKT 723 or LEK 810
Contact time	1 lecture per week, 1 practical per week
Language of tuition	Module is presented in English
Department	Agricultural Economics Extension and Rural Develo
Period of presentation	Semester 2

Module content

This module focuses on the modelling of agricultural commodity markets, price determination, policy and trade. The main objective is to provide the basic theoretical principles and skills for partial-equilibrium model building and and opportunity to apply these skills. The approach will include:
1) Economic theory: The theoretical foundations of each modelling component of a typical commodity balance sheet and set of prices will be emphasised in the design and specification of models; price formation and model closure under alternative equilibrium pricing conditions
2) Applied research: Advanced steps in modelling will be emphasised. Throughout the module, applied modelling research will be conducted and presented to gain experience with methods discussed in class. The course applies economic theory and quantitative methods to analyse food and agricultural markets, price, trade and policy issues. The module examines problem formulation, model structure, estimation, and model evaluation applied to demand and supply and to trade and policy interventions.

Environmental valuation and policy 826 (LEK 826)

Module credits	15.00
NQF Level	09
Service modules	Faculty of Economic and Management Sciences
Prerequisites	No prerequisites.
Contact time	1 lecture per week
Language of tuition	Module is presented in English
Department	Agricultural Economics Extension and Rural Develo

Period of presentation	Semester 2

Module content

Environmental valuation and policy. This module will review the basic principles of microeconomic theory needed for understanding and analysis of environmental problems, introduce market and non-market techniques of valuation of natural resources and environmental services (hedonic pricing, contingent valuation, transport cost, willingness-to-pay, cost-based techniques, etc.), public goods and environmental externalities, property rights regimes and selection of appropriate environmental policy instruments for management of environmental externalities.

Agricultural supply chain management 883 (LEK 883)

Module credits	15.00
NQF Level	09
Service modules	Faculty of Economic and Management Sciences
Prerequisites	No prerequisites.
Contact time	1 lecture per week
Language of tuition	Module is presented in English
Department	Agricultural Economics Extension and Rural Develo
Period of presentation	Semester 1 or Semester 2

Module content

Agricultural supply chain analysis. Explore the evolution of supply chain management in the global food industry. Establish the different ways in which supply chain management can provide a source of competitive advantage at industry level and for individual firms. Examine the crossfunctional and multidisciplinary nature of supply chain management as it applies in the global food industry. Introduce the core elements of the theoretical literature on supply chain management and consider applications in different sectors. Provide students with practical experience in applying the principles of supply chain management to the exploitation of a marketing opportunity, using case examples from the fresh produce and meat sectors. Provide students with practical experience of undertaking a supply chain audit, with a view to establishing an appropriate business strategy for a food manufacturing company.

The economics of natural resources 886 (LEK 886)

Module credits	15.00
NQF Level	09
Service modules	Faculty of Economic and Management Sciences
Prerequisites	LEK 810 or equivalent
Contact time	1 lecture per week
Language of tuition	Module is presented in English
Department	Agricultural Economics Extension and Rural Develo
Period of presentation	Semester 2

Module content

The economics of natural resources. This course will introduce students to the techniques of optimisation overtime, optimal allocation and management of non-renewable and renewable resources, with case studies from Africa. The influence of property rights regimes on optimal natural resource use will also be stressed. The course consists of three main sections: Methods of dynamic optimisation; Theory of exhaustible and renewable resources and growth models; and Property rights and natural resource use with case studies from Africa.

Selected topics in environmental economics 887 (LEK 887)

Module credits	15.00
NQF Level	09
Service modules	Faculty of Economic and Management Sciences
Prerequisites	MIE 780 and EKT 713 or equivalents
Contact time	1 lecture per week
Language of tuition	Module is presented in English
Department	Agricultural Economics Extension and Rural Develo
Period of presentation	Semester 2

Module content

Selected topics in environmental economics. This module will introduce students to various issues of special importance in environmental economics and policy with special emphasis on international dimensions. Examples of key themes to be covered include trade and the environment, trans-boundary externalities, global public goods, multi-lateral environmental agreements, international aid, economic growth and environmental change, poverty and the environment, etc. The main objective of the module is to equip students with the appropriate tools for analysing the linkages between economic development, trade and globalization, poverty, economic and environmental policy and environmental change.

Curriculum: Final year

Minimum credits: 120

Core modules

Dissertation: Agricultural economics 898 (LEK 898)

Module credits	120.00
NQF Level	09
Service modules	Faculty of Economic and Management Sciences
Prerequisites	No prerequisites.
Language of tuition	Module is presented in English
Department	Agricultural Economics Extension and Rural Develo
Period of presentation	Year

The information published here is subject to change and may be amended after the publication of this information. The General Regulations (G Regulations) apply to all faculties of the University of Pretoria. It is expected of students to familiarise themselves well with these regulations as well as with the information contained in the General Rules section. Ignorance concerning these regulations and rules will not be accepted as an excuse for any transgression.