Agricultural Economics

Programmes

Master of Agricultural Economics
Master of Environmental Economics
Master of Natural Resource Management
M.Sc. in Agricultural Economics
M.Sc. in Environmental Economics
M.Sc. in Natural Resource Management
PGD in Development Practice & Management
Master of Philosophy (M.Phil.)
Doctor of Philosophy (Ph.D.)

About the Board of Study

The Board of Study (BS) in Agricultural Economics is the centre of teaching and research in applied economics of the Postgraduate Institute of Agriculture. The BS trains graduates who would be capable in advising and guiding policy makers, industrialists, Non Governmental Organizations, farmers and other interest parties to understand the past and present structure of agriculture. The BS offers three Masters degree programmes, Agricultural Economics (AE), Environmental Economics (EE) and Natural Resource Management (NRM). The Board offers the Master programme in AE to provide students a fundamental understanding of economic principles and their application to identify and solve relevant problems in agriculture and related fields. The programmes also strives to develop appropriate analytical, methodological and communication skills to analyse agricultural problems effectively and explain findings. The objective of the Master programme in EE is to provide rigorous training in the subject to produce professional environmental economists who could conduct environmental policy analysis which is a nationally important aspect. The Master programme in NRM trains professionals for management and coordination of environmental and natural resource projects. The BS also offers a Postgraduate Diploma in Development Practices and Management (PDDPM) and M.Phil. and Ph.D. degree programmes. Those who obtain degrees and diplomas offered by the BS enter into a variety of organization such as governmental ministries, universities, NGOs, research institutes and the private sector organizations as economists, trainers, consultants and managers to use the knowledge and skills gained during their study programmes at the Institute.

Recent research

- Export creation and diversion effects of agricultural trade: implications for the South Asian economies
- An analysis of total factor productivity and sources of growth in the paddy sector of Sri Lanka
- An examination of profit inefficiency of smallholder rubber producers in Sri Lanka
- Analysis of profit efficiency among tea processing factories in Sri Lanka
- Effects of world market prices on the coconut sector in Sri Lanka: An analysis of price transmission elasticities and endogenous trade policy
- Impact of irrigation investments in regional development: Uda Walawe development Project in southern Sri Lanka
- Role of home gardens in achieving food security in Baticaloa district
- Technical change and returns to research in the Coconut sector of Sri Lanka

Master of Agricultural Economics

Overview

The Master programme in Agricultural Economics is a social science programme with focus on economic methodologies and tools which equip students for solving problems. As humanity's single

largest use of the earth's resources, agriculture is a major driving force in the world economy. With an ever-increasing world population and growing pressure on the world's finite resources, the analytical skills of agricultural economists are as relevant as ever.

Agricultural Economics examines the use of available resources in this complex sector to meet the needs and desires of present and future generations. Sustainability, food security, food safety, environmental quality, agricultural policy reform and rural community development are typical issues that agricultural economists study in a local and global context.

Key features

An extended knowledge of contemporary economic theory, the skills to analyse problems concerning choice and resource allocation on national and international markets, the ability to access and synthesise the relevant economic literature to undertake further research or study in the field of agricultural economics, and the skills to communicate the results of economic analysis to interested parties are the foremost benefits of the Programme.

The Programme facilitates assessment of food economics, international economics and development economics issues and decision-making processes.

No. of Credits: 30

Minimum Programme Duration: 3 semesters

Entry Requirements: Applicants must possess B.Sc. (Agric.) degree with specialization in Agricultural Economics or B.Sc. (Agrech & Mgt.) degree with a specialization in Applied Economics & Business Management or B.A. (Economics) degree. This programme requires a strong background in Economics. Other graduates will be admitted after completion of prerequisite courses that are specified by the Board of Study.

Code	Title	Credits	Option		
First Semester					
EC 5101	Microeconomic Theory I	2	Compulsory		
EC 5102	Mathematical Economics	2	Compulsory		
EC 5107	Project Analysis	2	Compulsory		
EC 5112	Macroeconomic Theory I	2	Compulsory		
EC 5113	Econometrics I	2	Compulsory		
EC 5103	Mathematical Programming	2	Elective		
EC 5104	Agricultural Marketing I	2	Elective		
EC 5105	History of Agricultural Policies in Sri Lanka	2	Elective		
EC 5106	Resource and Environmental Economics I	2	Elective		
EC 5120	Land Economics	2	Elective		
EC 5154	Agricultural Finance	2	Elective		
EC 5156	Livestock Economics and Marketing	2	Elective		
EC 5199	Seminar	1	Elective		
ST 5105	Time Series Analysis	2	Elective		
EC 5153	Resource Planing and Management	2	Elective		
Second Sei	mester				
EC 5203	Development Economics	2	Compulsory		
EC 5204	Applied Production Economics	2	Compulsory		
EC 5222	Microeconomic Theory II	2	Compulsory		
EC 5223	Econometrics II	2	Compulsory		
EC 5298	Directed Study	5	Compulsory		
EC 5209	Special Topics in Agricultural Economics	1	Elective		
EC 5213	Agricultural Policies in Developing Countries	2	Elective		
EC 5214	Agricultural Marketing and Price Analysis	2	Elective		
EC 5215	International Trade	2	Elective		
EC 5216	Macroeconomic Theory II	2	Elective		
EC 5218	Quantitative Policy Analysis	2	Elective		
EC 5221	Environmental Valuation	3	Elective		
ST 5203	Regression Analysis	2	Elective		
EC 5217	Dynamics of Resource Economics	2	Elective		
EC 5212	Seminar in Sustainable Development	2	Elective		
EX 5208	Social Research Methodology*	2	Elective		

*Compulsory for M.Sc.(Course Work & Research), M.Phil. and Ph.D. students

Master of Environmental Economics

Code

EC 5101

EC 5102

EC 5106

EC 5107

EC 5113

EC 5103

EC 5111

EC 5112

EC 5199

First Semester

Title

Microeconomic Theory I

Mathematical Economics

Mathematical Programming

Macroeconomic Theory I

Project Analysis

Econometrics I

Natural Resources

Resource and Environmental Economics I

Ecology, Conservation and Management of

No. of Credits: 30

Minimum Programme Duration: 3 semesters

Entry Requirements: This programme requires a strong background in Economics. Applicants must possess B.Sc. (Agric.) degree with specialization in Agricultural Economics or B.Sc. (AgTech & Mgt.) degree with a specialization in Applied Economics & Business Management or B.A. (Economics) degree. A limited number of Mathematics and Engineering graduates will also be admitted for the programme.

Credits

2

2

2

2

2

Option

Compulsory

Compulsory

Compulsory

Compulsory

Compulsory

Elective

Elective

Elective

Elective

Overview

The subject of Environmental Economics plays an increasingly central role in both understanding the causes of and designing policy solutions to contemporary environmental problems. Nowhere is this more apparent than in the case of human-induced climate change. Amongst others, economic analyses have been used to determine the net costs/benefits of different policy scenarios, to better understand how to achieve and sustain international co-operation, and to e١ m e p W а h a tŀ e a 6

evaluate the efficiency of different environ-	EC 5105	History of Agricultural Policies in Sri Lanka	2	Elective
mental policy instruments. Environmental	AE 5152	Environmental Impact Assessment	2	Elective
economics has been instrumental in forming	Second Semester			
policy across the world. In these, and across a	EC 5219	Resource and Environmental Economics II	2	Compulsory
wide range of other issues, from biodiversity	EC 5221	Environmental Valuation	3	Compulsory
and ecosystem loss, air pollution to more	EC 5222	Microeconomic Theory II	2	Compulsory
broadly the link between the environment	EC 5223	Econometrics II	2	Compulsory
and sustainable economic development, the	EC 5298	Directed Study	5	Compulsory
theory and applied tools of environmental	EC 5212	Seminar in Sustainable Development	2	Elective
economics are uniquely placed to inform	EC 5217	Dynamics of Resource Economics	2	Compulsory
and guide decision-makers in addressing	AE 5209	GIS for Natural Resources Management	2	Elective
environmental challenges.	ST 6202	Multivariate Statistical Methods	3	Elective

Seminar

Key features

The continuing rise in the application of economics to environmental policy formulation has created an increased demand for individuals with state-of-the-art training in environmental and resource economics. As a result, there are promising career opportunities for those who have trained as professional environmental economists: in government, international organizations, industry, NGOs, consultancy and research.

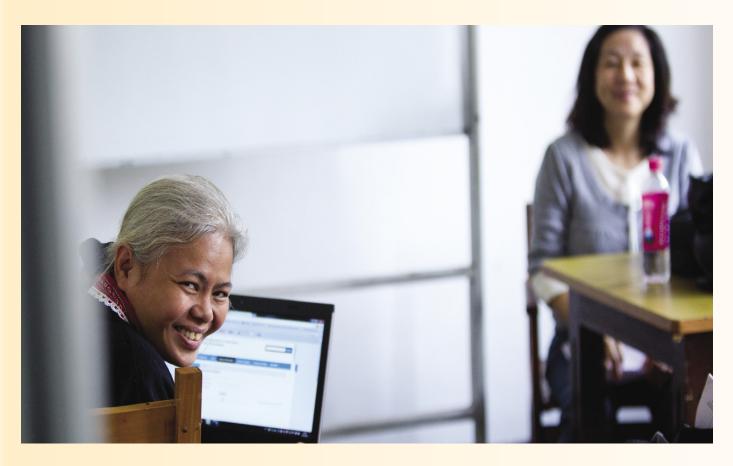












Master of Natural Resource Management

No. of Credits: 30

Minimum Programme Duration: 3 semesters

Entry Requirements: The M.Sc in Natural Resource Management (NRM) is an interdisciplinary degree programme. Applicants with degrees in Pure Sciences (Botany, Zoology, Physics, Chemistry, Mathematics), Applied Sciences (Agriculture, Engineering, Medicine), and Social Sciences are eligible for admission to this programme.

Overview

Sustainable use of natural resources is essential for the survival and development of humankind. The increasing needs and demands for these natural resources combined with the decrease of the finite resources urgently calls for sustainable management. Although Economics plays a vital role in sustainable management of natural resources, it requires an interdisciplinary approach encompassing an in-depth knowledge.

The Master of Science in Natural Resources Management programme is an interdisciplinary programme. It is especially designed to provide students an understanding of the importance of management for sustainable use of natural resources, an understanding of the relationships and the ability to communicate between different disciplines and actors. The programme aims at providing unique knowledge and skills required to solve a number of interdisciplinary challenges related to the management of natural resources.

Key features

Increasing population and growing welfare places pressure on the natural environment and results in problems such as deforestation, overgrazing, and the contamination of land and water resources. The current emphasis on sustainable management across the globe is a consequence of a growing awareness of the impact of modern society on the environment.

As a result, there is a pressing need for people with the ability of applying Natural Resources Management principles and techniques to support decision making for the effective and efficient management of natural resources. In this context, the Master programme in Natural Resources Management aims at providing theory and practice to solve real world natural resource issues using an interdisciplinary approach.

Code	Title	Credits	Option	
First Semester				
EC 5109	Resource Management in Tropical Farming Systems	2	Compulsory	
EC 5110	Introduction to Economics	2	Compulsory	
EC 5111	Ecology, Conservation and Management of Natural Resources	2	Compulsory	
EC 5114	Quantitative Methods	2	Compulsory	
EC 5212	Seminar in Sustainable Development	2	Elective	
EC 5106	Resource and Environmental Economics I	2	Elective	
EC 5107	Project Analysis	2	Elective	
AE 5152	Environmental Impact Assessment	2	Elective	
SS 5112	Soil-Plant-Water Systems	2	Elective	
AE 5156	Environment and Industry	3	Elective	
Second Semester				
EC 5210	Managerial Resource Economics	2	Compulsory	
EX 5208	Social Research Methodology	2	Compulsory	
EX 5213	Social Impact Assessment	2	Compulsory	
EC 5298	Directed Study	5	Compulsory	
EC 5153	Resource Planning and Management	2	Compulsory	
EC 5221	Environmental Valuation	3	Elective	
EC 5219	Resource and Environmental Economics II	2	Elective	
AE 5209	GIS for Natural Resources Management	2	Elective	

*EX 5208 - Social Research Methodology course (2 credits) is Compulsory for M.Sc. (Course work & Research), M.Phil. and Ph.D. students.

Postgraduate Diploma in Development Practice & Management

No. of Credits: 25

Minimum Programme Duration: 2 semesters

Entry Requirements: Applicants must possess a Bachelor's degree or an equivalent qualification acceptable to the Senate of the University of Peradeniya.

Overview

The Diploma in Development Practice and Management will be one (1) year integrated and multi-disciplinary course programme that aims to produce development practitioners with core competencies and essential broadbased knowledge, skills and attributes required for attaining sustainable development. The programme is enriched by drawing knowledge from the social sciences and management. The theoretical component presents relevant theoretical orientations and issue-based perspectives about the nature of human development needs, problems and interventions designed in response to emerging development challenges.

Code	Title	Credits	Option	
First Semester				
PDEC 5101	Contemporary Issues in Development	2	Compulsory	
PDEC 5102	Principles of Development Management	2	Compulsory	
PDEC 5103	Techniques in Development Project Planning	2	Compulsory	
EX 5102	Principles of Organization Management	2	Elective	
EX 5104	Development Sociology	2	Elective	
EX 5105	Community Development	2	Elective	
EC 5110	Introduction to Economics	2	Elective	
EC 5114	Quantitative Methods	2	Elective	
EC 5108	Water Resource Economics I	2	Elective	
Second Semester				
PDEC 5201	Research Skills for Community Development	2	Compulsory	
PDEC 5202	Agribusiness and Enterprise Development	2	Compulsory	
PDEC 5203	Poverty and Social Impact Analysis	2	Compulsory	
EX 5206	Participatory Methods for Development	2	Elective	
EX 5209	Organizational Development and Change	2	Elective	
EC 5209	Special topics in Agricultural Economics	2	Elective	

Key features

The programme exposes students to both theoretical and practical experiences in the field of development practice. Thus students are exposed to theoretical perspectives and processes of development around the globe from which they will be able to derive judgment of the forces behind underdevelopment in the third world and formulate strategies for accelerated growth and development. The programme is designed for development practitioners to enable them to develop their skill of analysis to "see beyond what the eye is able to see".