

NRM Curriculum of Study
AGRICULTURAL AND BIOSYSTEMS ENGINEERING

Graduate Program: Natural Resources Management
Specialty Area (Option): Physical/Earth Resources Science
Participating Academic Unit: Agricultural and Biosystems Engineering
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Requirements

- **Background:** A baccalaureate degree having major emphasis in physical sciences or in engineering.
- **Coursework:** 30 semester units (minimum). Complete *Master's Degree Plan of Study and Supervisory Committee* form no later than the first week of second semester.
- **Oral Exam:** Student must be enrolled during the semester of the oral examination (usually the last semester.)
- **Additional:** Refer to the section titled *Degree Requirements Checklist* in these Guidelines (pages 5-6).

Required Units		Approved Courses/Disciplines*	Units	Approved Courses/Disciplines*	Units
Specialty Area	16 or more	ASM 675 Management of Agricultural Systems	2	CE 770 Hazardous Waste Site Remediation	3
		ASM 654 Principles of Site-Specific Agriculture	3	CE 776 Ground Water and Seepage	3
		ABEN 664 Resource Conservation and Irrigation Engineering	4	SOIL 610 Soils and Land Use	3
		ABEN 682 Instrumentation and Measurements	3	SOIL 647 Microclimatology	3
		ABEN 758 Applied Computer Imaging and Sensing for Biosystems	3	GEOG 655 Intro to Geographic Information Systems	3
		ABEN 765 Small Watershed Hydrology and Modeling	3	GEOL 612 Geomorphology	3
		CE 677 Applied Hydrology	3	GEOL 614 Hydrogeology	3
		CE 678 Water Quality Management	3	GEOL 628 Geochemistry	3
Supporting Area: Biotic Resources Science	3 - 6	Botany/Biology		Range Science	
		Natural Resources Management		Zoology	
		Plant Sciences			
Supporting Area: Social Sciences	3	ECON 681 Natural Resource Economics	3	ECS 770 Environmental Law and Policy	3
		NRM 631 NEPA and Environmental Impact Assessment	2	HIST 634 History of Environmental Science	3
		NRM 632 Environmental Impact Statement	2	SOC 631 Environmental Sociology	3
Resource Analysis	3-6	STAT 661 Applied Regression Models	3	STAT 725 Applied Statistics	3
		STAT 662 Introduction to Experimental Design	3		
Research <i>Select paper or thesis</i>	2-4	NRM 797 Master's Paper			
	6-10	NRM 798 Master's Thesis			
Seminar	2	NRM 690 Graduate Seminar			

*Approved courses from the various disciplines are listed on pages 27-28.