

The University of Tennessee at Martin
Bachelor of Science in Natural Resources Management (with a major in NRM)
Soil and Water Conservation Concentration (program 1152)

Overview

Urbanization, industrial growth and population growth are placing increased demands on our land and water resources. To provide food and shelter for future generations, many professionals trained to manage soil, water and other natural resources are needed. The future food supply must come from a declining land, energy and labor base. Therefore, scientific principles and technology to protect and sustain our natural resources are becoming increasingly important.

The soil and water conservation curriculum prepares students for conservation and management of soil and water resources for the long range benefit of society. Requirements include a strong background in physical, chemical and biological relationship of soil, water and plants.

Career Opportunities

Many excellent opportunities for employment are available for graduates of the soil and water conservation curriculum. Employment opportunities are available with federal agencies such as the Natural Resource Conservation Service and Bureau of Land Management; other government units, including state, county and municipal agencies; planning and economic development districts; businesses in the agricultural industry such as fertilizer, chemical, forest products and pollution control firms; public utility companies; and private industries including banks, financial institutions, real estate agencies, and non-governmental organizations. The local soil conservationist, soil scientist, land manager, etc., is most likely trained in this field.

Facilities

Facilities on campus, including the Ned R. McWherter Agricultural Complex, the 700-acre UT Martin Agricultural and Natural Resources Field Teaching/Demonstration Complex, and our nearness to farm people make an ideal setting and are excellent for study in this area. The great needs for conservation of soil, water and related natural resources for study are unlimited and easily accessible. Numerous computer facilities are also available for student use. Students participate in local, regional and national conferences, contests and research on a regular basis.

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B.S. in Natural Resources Management - Soil and Water Conservation Concentration (1152)

Course Requirements for 2020-2021 catalog

Fine Arts (3 hours) *Select one*

ART 110	Understanding Visual Arts	___/3
ARTH 210	The History of Art	___/3
ARTH 211	The History of Art	___/3
DANC 110	Understanding Dance	___/3
MUS 111	Masterpieces of Music	___/3
MUS 112	Music in Our Time	___/3
MUS 113	Western Masterpieces	___/3
MUS 114	Historical Survey of Jazz	___/3
MUS 115	Music for the Masses	___/3
THEA 110	Understanding Theatre	___/3
THEA 111	Understanding Theatre	___/3

Biological & Physical Systems (20 hours)

BIOL 130	Foundations: Ecology, Evolution, & Diversity	___/4
BIOL 140	Foundations: Cell & Molecular	___/4
CHEM 111	Intro to Chemistry I: General & Inorganic	___/4
Or CHEM 121	General Chemistry	___/4
CHEM 112	Intro to Chemistry II: Organic & Biochem	___/4
GEOS 110	Geoscience in Everyday Life	___/4

Communication (9-10 hours)

ENGL 105	English Composition	___/3
or ENGL 111	English Composition	___/3
ENGL 112	English Composition	___/3
or ENGL 113	English for Technical Writers	___/3
COMM 230	Public Speaking	___/3
or COMM 229	Public Communication Online	___/3
or HONR 110	Public Speaking & Rhetorical Tradition	___/3

Humanities (9 hours) *Select three*

ENGL 250-	British Literature; ENGL 251- British Literature;	
ENGL 260-	American Literature; ENGL 261-American Literature;	
ENGL 270-	World Literature; ENGL 271-World Literature;	
FREN 250-	France Today; GERM 250-Germany Today;	
HIST 121-	World Civilization I; HIST 122-World Civilization II;	
HIST 201-	History of U.S. I; HIST 202-History of US II; HONR 101-	
Great Works I,	Ancient World and Classical Antiquity; HONR 102-	
Late Antiquity to	Middle Ages; HONR 201-Late Middle Ages to	
Renaissance; JAPN	250-Japan Today; PHIL 110-Adventure of Ideas:	
Historical; PHIL	120-Adventure of Ideas: Contemporary;	
PHIL 130-	Ethics & Race; PHIL 160-Exploring Ethics;	
RLST 201-	Intro Religious Studies; SPAN 250-Latin America Today	
_____		___/3
_____		___/3
_____		___/3

Mathematics (6 hours)

MATH 210	Elementary Statistics & Probability	___/3
<i>Select One</i>		
MATH 140	College Algebra & Elementary Function	___/3
MATH 160	Calculus for Business & Life Sciences	___/3
MATH 185	Precalculus	___/5

Social & Behavioral Sciences (6 hours) *Select two*

AGRI 295	International Food & Fiber Systems	___/3
ANSC 270	Animal Welfare & Ethics	___/3
ECON 100	American Enterprise System	___/3
ECON 201	Principles of Macroeconomics	___/3
ECON 202	Principles of Microeconomics	___/3
ENGR 100	Society & Technology	___/3
GEOG 151	Intro Regional Geo: NA, Europe, Russia	___/3
GEOG 152	Intro Regional Geo: Asia, Africa, LA	___/3
GEOG 202	Intro to Cultural Geography	___/3

HLTH 111	Principles & Concepts in Personal Health	___/3
HONR 202	Great Works IV-Enlightenment to Modernity	___/3
NRM 101	Wildlife, Conservation & Environmental Issues	___/3
NRM 250	Global Perspectives in Natural Resources	___/3
NUTR 100	Introductory Nutrition	___/3
POSC 210	American Government & Politics	___/3
POSC 220	American Political Institutions & Policy	___/3
POSC 230	Introduction to World Politics	___/3
PSYC 101	Introduction to Psychology	___/3
SWRK 220	Understanding Human Diversity	___/3
SOC 201	General Sociology	___/3
SOC 202	Social Problems	___/3
SUST 200	Intro to Sustainability	___/3
WMST 201	Intro to Women's & Gender Studies	___/3

Natural Resources Management Common Core (22 hours)

AGET 220	Surveying & Soil and Water Engineering	___/3
AGRI 270	Intro to Geospatial Technology	___/3
or GEOG 270	Intro to Geospatial Technology	___/3
NRM 100	Intro to Natural Resources Management	___/3
NRM 210	Human Dimensions in Natural Resources Mgt	___/3
SOIL 210	Soil Science	___/4
<i>Water Elective (3 hours) Select one</i>		
NRM 225	Intro to Aquatic Science	___/3
NRM 315	Restoration of Freshwater Habitats	___/3
SOIL 315	Soil & Water Conservation	___/3
SOIL 430	Wetland Science	___/3
<i>Plant Science Elective (3 hours) Select one</i>		
PLSC 333	Weed Science	___/3
PLSC 341	Dendrology & Forest Ecology	___/3
PLSC 410	Silviculture	___/3
PLSC 422	Forage Crops	___/3

Soil & Water Conservation Concentration (45 hours)

AGRI 441	Interpretation of Agricultural Research	___/3
AGEC 110	Introduction to Agricultural Business	___/3
AGET 460	Waste Management Technology	___/3
ENGL 325	Technical Communications	___/3
MBIO 251	General Bacteriology	___/4
<i>Physics (4 hours) Select one</i>		
PHYS 101	Physics in Everyday Life	___/4
PHYS 150	Concepts & Demonstrations in Physics	___/4
PHYS 211	College Physics	___/4
<i>Plant Science Elective (3 hours) Select One that was not selected above*</i>		
PLSC 110	Introductory Plant & Soil Science	___/3
PLSC 333	Weed Science	___/3
PLSC 341	Dendrology & Forest Ecology	___/3
PLSC 422	Forage Crops	___/3
<i>Soil Science (9 hours) Select three</i>		
SOIL 315	Soil & Water Conservation	___/3
SOIL 321	Soil Genesis, Morphology, & Classification	___/3
SOIL 412	Soil Chemistry & Fertility	___/3
SOIL 440	Soil Physics	___/3
<i>Geology upper-division (3 hours) UD GEOL course</i>		
_____		___/3
<i>Soil Science Elective (2 hours) SOIL courses</i>		
SOIL 250	Soil & Landscape Evaluation (Recommended)	___/1
_____		___/1
<i>Upper-Division Science Electives (8 hours) - UD courses in Departments of Ag, Geosciences, and Natural Resources; Biological Sciences; Chemistry and Physics; or Engineering</i>		
NRM 420	Supervised Field Experience (Recommended)	___/3
_____		___/
_____		___/

**B.S. in Natural Resources Management
Soil and Water Conservation
2020-2021**

Freshman Fall	
Fine Arts Elective	3
ENGL 105 or 111	3
MATH 140, 160, or 185	3
BIOL 130	4
GENS 101	2
Semester Total	15

Freshman Spring	
ENGL 112 or 113	3
CHEM 111	4
Social Science Elective	3
GEOL 110	4
NRM 100	3
Semester Total	17

Sophomore Fall	
SOIL 210	4
CHEM 112	4
NRM 210	3
AGET 220	3
SOIL 250	1
Semester Total	15

Sophomore Spring	
Humanities Elective	3
COMM 230	3
AGEC 110	3
AGRI 270 or GEOG 270	3
PHYS 101	4
Semester Total	16

Junior Fall	
Humanities Elective	3
Plant Science Elective	3
Soil 315	3
ENGL 325	3
SOIL 250	1
Humanities Elective	3
Semester Total	16

Junior Spring	
AGET 460	3
Social Science Elective	3
Math 210	3
BIOL 140	4
Semester Total	16

Senior Fall	
SOIL 321	3
MBIO 251	4
AGRI 441	3
UD Science Elective	3
SOIL 250	1
Semester Total	14

Senior Spring	
Soil 412	3
GEOL UD	3
Water Elective	3
UD Science Elective	3
Plant Science Elective	3
Semester Total	15