## **WFS 340**

# Wetlands Ecology and Management Spring 2009

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**Recommended Text:** Wetlands, 2007, 4<sup>th</sup> edition (ISBN 978-0-471-69967-5)

**Authors:** William J. Mitsch and James G. Gosselink

**Course Goal:** To expose students to the basic principles of wetland ecology and

management via class lectures, labs, and field experiences.

**Course Topics:** • What is a Wetland?–USACE Definition

•Wetland Regulations

•Wetland Classification via Cowardin et al. (1979)—USFWS Protocol

•Wetland Plant, Waterfowl, Shorebird, and Amphibian ID

•Wetland Losses and Human Impacts

•Wetland Values

•Wetland Management (agriculture, moist-soil, and green-tree reservoirs)

•Waterfowl Carrying Capacity (duck energy-days, DED) Estimation

•Student Selected Topic (e.g., wetland impoundment construction, avian

influenza, amphibian declines, wetland hydrology)

**Required Materials**: Field Clothes and Boots, Raingear, Camping Gear, Calculator, Laptop

## Weights of Academic Assessments and Grading Scale:

The exam, lab practicum, DED assignment, and participation (field trip attendance) will be weighted as follows:

Exam: 50% (Monday, 23 March 2009 at 7:30 am)
Lab Practicum: 30% (Friday, 13 March 2009 at 8:30 am)

• DED Assignment: 10% (due **Monday, 30 March 2009** by 1:00 pm)

• Participation: 10% (see page 2)

Your course grade will be determined using the following straight<sup>1</sup> scale:

Grade	Final Weighted	Grade	Final Weighted
	Percent		Percent
A	90-100%	С	70–76%
B+	87-89%	D	60–69%
В	80-86%	F	<60%
C+	77–79%		

<sup>&</sup>lt;sup>1</sup>Exam, practicum, and DED assignment will not be curved.

## **Extra Credit:**

You can positively influence your grade as much as **4.5%** by volunteering for extra credit. Your volunteer work however must be related to wetlands or wetland fauna (e.g., amphibians, waterbirds). For every **8 hours** of volunteer work, your final grade will be increased by **1.5%** up to 4.5% (24 hours total). All volunteering must be completed before **28 April 2009**. A volunteer form (see website) must be filled out by the supervising individual, and submitted to Dr. Gray.

## **Attendance:**

Attendance on the 3-day field trip to Noxubee Wildlife Refuge in Mississippi will count for 10% of your final grade. You must participate in all field trip activities to receive 10% (2% deduction for each missed activity). Attendance at lectures is <u>not</u> mandatory but highly recommended.

**Tentative Schedule:** 

6, 9–13, 23 March (lecture, indoor labs, and tests)\* 23–26 March (field trip to Mississippi)\*\*

\*Meeting time is 8:30–12:00 and 1:30–5:00 daily in 156/157 PBB. \*\*We will leave Knoxville at 10:00 a.m. on Monday, 23 March. The field trip will end at 10:00 am on 26 March. You will have the choice to return to Knoxville or go to the SE Student Conclave. You must notify Dr. Gray by 6 March at 5:00 p.m. of your choice.

EXCEPTION: •Monday (9 March): Hollingsworth Auditorium (all day)

## **2–6 March:**

	Monday	Tuesday	Wed	Thursday	Friday
Morning			Annual Meeting of the		Wetland
			Tennessee Chapter of		Definition,
			The Wildlife Society		Wetland
					Regulations
Afternoon			Fall Creek Falls State Park		Waterbird,
			Amphibian,		
			Pikevil	lle, TN	and Wetland
					Plant ID

#### 9–13 March:

	Monday	Tuesday	Wed	Thursday	Friday
Morning	USFWS	Wetland	Capacity	Open Topic –	PRACTICUM
	Wetland	Management	Estimation	Students	(Classification
	Classification	(agriculture &	Lecture	Decide	& Waterbird,
		moist-soil			Amphibian,
		management)			and Plant ID)
Afternoon	Human	Wetland	Capacity	OPEN	
	Impacts	Management	Estimation		
	and Wetland	(green-tree	Assignment &	Study for	
	Values	reservoir	Lab Exercise	Practicum	
		management)			

16–19 March: Spring Break

#### 23–27 March:

	Monday	Tuesday	Wed	Thursday	Friday
Morning	EXAM	Noxubee	Meet Dr. Rick		
	(7:30-9:30)	NWR	Kaminski,	Southeastern Wildlife	
	Leave for	(moist-soil	MSU	Conclave	
	Noxubee	units, GTRs,	Presentations		
	(10:00 am)	aquatic plant		Co-hosted by University of	
		management)		Arkansas - Monticello and	
Afternoon	Visit Briefly	Noxubee	Meet Dr. Steve	Arkansas Tech University	
	with Refuge	NWR	Demarais,		
Staff, Watch		(wood duck	MSU Captive	(Leave Noxubee NWR at 10:00	
	Video	and RCW	Wildlife	am on Thurs	• .
		management,	Facility	Arkansas by	8:00 am on
		bat research)		Suno	lay)

#### **GENERAL POLICIES**

## **Testing Policy**:

Make-up exams and practicums will **not** be given without a *bona fide* written and signed excuse from a vouching authority (e.g., physician, funeral announcement). The telephone number of the vouching individual must be provided with the written explanation. All tests are required.

**Academic Misconduct:** Group learning and studying is encouraged; however, academic

misconduct on tests or assignments (including **copying Excel files** used in the duck energy-day assignment) will not be tolerated and result in immediate dismissal from and failure of the course. In the case of copying Excel files, the student that provided the Excel will

receive an "F" in the course also.

**Learning Distractions:** Please turn off pagers and cell phones prior to class and lab.

## **ADA Accommodation:**

Any student who, because of a disability, may require some special arrangements in order to meet course requirements should contact the instructor as soon as possible to make such accommodations as may be necessary.

## **Religious Holy Day Observance:**

A student who is absent from classes for the observance of a religious holy day shall be allowed to take an examination or complete an assignment scheduled for that day within a reasonable time after the absence IF, not later than the FIFTEENTH day after the first day of the semester (i.e., 01/23/09), the student had notified the instructor of each scheduled class that the student would be absent for a religious holy day.