# NRES 474: Integrated Resource Management (spring 2022)

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#### **Course Time/Location:**

Lecture- Monday 11:00 AM – 11:50, TNR 320 Discussion- Wednesday 1:00 – 2:50 PM, TNR 320

#### **Course Description:**

Natural resource management is about making decisions and implementing actions (or not) to achieve resource objectives. This course will specifically explore how management occurs in areas with multiple types of natural resources, diverse and often competing objectives, varied stakeholders, often numerous administrative boundaries, in the face of great uncertainty, i.e., where you will most likely find yourself working as a natural resource professional. Lectures will focus on how public agencies, private landowners and NGO's manage properties with diverse natural resources and differing goals and objectives. Discussion will concentrate on developing your natural resource problem-solving and critical thinking skills through discussion of readings and management scenarios. A major component of the course will involve student teams developing and presenting a management project for a selected natural resource problem to gain practical experience with the integrated nature of natural resource management and to develop oral and/or written communication abilities.

#### **Course Objectives:**

1. You will develop natural resource management problem-solving and planning skills.

2. You will develop and demonstrate oral and/or written communication, and critical thinking skills.

3. You will collaborate and work effectively in a team.

4. You will understand and be able to describe the role of public agencies, private landowners, and non-government organizations in contemporary natural resource management.

#### **Readings:**

- Assigned readings (available online/Canvas)
- Assigned readings are testable material.

**Discussion:** The goal of discussion is to reinforce topics covered in lecture and to give students practical application in integrated resource management (IRM). We will accomplish this

through *discussion of readings and management scenarios* and a *group natural resource management project*. Participation is required.

#### Grading:

Your course grade will be based on the following components:

Exam 1:	20%
Exam 2:	20%
Discussion/Participation:	30%
Management Project:	30%

Exams can be a combination of multiple choice, fill-in-the-blank, short answer, matching, True/False, and discussion.

Grade	%
А	93-100
A-	90-92
B+	87-89
В	83-86
B-	80-82
C+	77-79
С	73-76
C-	70-72
D+	67-69
D	65-66
F	Below 65

\*I will not adjust your grade up at the end of the semester just because you are "close" to the next grade. I do not give extra credit at the end of the semester. You must do the work during the semester to earn the grade you want and are capable of. I will round up from .5 to the next higher whole number.

**Exams:** There will be one midterm and a final exam. Exams must be taken on the scheduled dates or a score of zero will be assigned. See "Due Dates/Late Policy" for absence policy.

**Discussion:** Each week during Discussion we will analyze a reading and/or a management scenario (see Schedule). You must complete assigned readings prior to class and be prepared to discuss the reading in class. Each student is expected to contribute to the discussion each week. Thirty percent of your course grade is dependent on your discussion participation. Contributions in class will be scored according to the following scale: 4- well prepared, frequent contributor; 3- satisfactory, need to work on quality or quantity; 2- infrequent comments, unprepared; 0- no contribution, absent. Your course Discussion grade will be your total points earned divided by the total possible (e.g., 11 Discussions X 4 points = 44 points total).

**Management Project:** For each Discussion section, I will assign students to teams to work on a group natural resources management project. The project is comprised of four cumulative tasks: Task #1- Assessment, Task #2- Strategy, Task #3- Implementation, and Task #4- Final Oral Report. Scoring rubrics will be provided. Peer evaluation will be utilized to assess individual effort and weight task grades. Group members will independently and confidentially assign each group member (including themselves) a percentage to indicate group member contribution. For example, a group of four people would have a total of 400% to divide amongst the group members. I will take the average of the percentages assigned to each group member and multiply that number by the group's score to get an individual grade. Groups can remove a member by majority vote in consultation with the instructor. Dropped members have four options: 1) persuade their original group to re-accept them; 2) find another group willing to accept them; 3) complete the project on their own; or, 4) receive a failing grade for the project.

**Attendance:** Attendance in class is required. You are expected to fully participate in the course, e.g., attend lectures, participate in discussions, etc., and getting a good grade in the course is usually dependent on that.

**Communication:** Students are expected to routinely check their UWSP email and the Canvas course site for updates and materials.

**Due Dates/Late Policy:** All assignments are due on the specified due date at the beginning of class. Late assignments will incur a **10% penalty the first week they are late and a 20% penalty the second week they are late. Late assignments will not be accepted after two weeks.** *You are responsible for your own time management and keeping up with due dates.* Illness, family emergency, etc., may be cause for extending a due date if I am notified **prior** to the due date (email and voicemail have date and time stamps) and you can **document** (e.g., Dr.'s note) your absence.

**Course Effort/Study:** I believe being a full-time University student is akin to having a full-time job. A full-time job generally equates to at least 40 hours of work per week. You will only spend approximately a third of this time in class. You must spend the additional time on *your own* studying, reading, completing assignments, etc. To get the most out of this course and your University experience (i.e., grades, knowledge, skills, etc.), *you* must put in the time outside of class. A good rule of thumb is to plan on spending two hours of outside preparation for every hour you spend in class. Budget this time into your weekly/monthly planner.

Academic Integrity: Academic integrity is central to the mission of higher education in general and UWSP in particular. Academic dishonesty (cheating, plagiarism, etc.) is taken very seriously. Don't do it! The minimum penalty for a violation of academic integrity is a failure (zero) for the assignment. For more information, see the "Student Academic Standards and Disciplinary Procedures" section of the Community Rights and Responsibilities document, UWSP Chapter 14. This can be accessed by viewing page 11 of the document at: http://www.uwsp.edu/dos/Documents/CommunityRights.pdf

Lecture materials and recordings for NRES 474 are protected intellectual property at UW-Stevens Point. Students in this course may use the materials and recordings for their personal use related to participation in this class. Students may also take notes solely for their personal use. If a lecture is not already recorded, you are not authorized to record my lectures without my permission unless you are considered by the university to be a qualified student with a disability requiring accommodation. [Regent Policy Document 4-1] Students may not copy or share lecture materials and recordings outside of class, including posting on internet sites or selling to commercial entities. Students are also prohibited from providing or selling their personal notes to anyone else or being paid for taking notes by any person or commercial firm without the instructor's express written permission. Unauthorized use of these copyrighted lecture materials and recordings constitutes copyright infringement and may be addressed under the university's policies, UWS Chapters 14 and 17, governing student academic and non-academic misconduct.

**Professionalism:** A professional is competent, reliable, respectful, and has integrity. It is a necessary attribute for most careers, particularly law enforcement. It is never too early to begin developing a professional mindset, e.g., being on time with the appropriate equipment, being competent and knowledgeable in your field, completing assignments correctly and on time, being respectful to others, etc. I may deduct up to 5% of your final course grade for lack of professionalism, e.g., absences, profanity, disrespect, sleeping, disrupting class with unsolicited texting and talking, etc.

**Disability Policy:** Please discuss with me as soon as possible any concerns you may have regarding a disability so we can accommodate you as per UWSP policy.

#### **COVID Precautions**

## Face Coverings:

• At all UW-Stevens Point campus locations, the wearing of face coverings is mandatory in all buildings, including classrooms, laboratories, studios, and other instructional spaces. Any student with a condition that impacts their use of a face covering should contact the Disability and Assistive Technology Center to discuss accommodations in classes. Please note that unless everyone is wearing a face covering, in-person classes cannot take place. This is university policy and not up to the discretion of individual instructors. Failure to adhere to this requirement could result in formal withdrawal from the course. *Other Guidance:* 

• Please monitor your own health each day using the screening tool on the UWSP homepage. If you are not feeling well or believe you have been exposed to COVID-19, do not come to class; email your instructor and contact Student Health Service (715-346-4646).

o As with any type of absence, students are expected to communicate their need to be absent and complete the course requirements as outlined in the syllabus.

- Maintain a minimum of 6 feet of physical distance from others whenever possible.
- Do not congregate in groups before or after class; stagger your arrival and departure from the classroom, lab, or meeting room.
- Wash your hands or use appropriate hand sanitizer regularly and avoid touching your face.
- Please maintain these same healthy practices outside the classroom.

Updated: 01-19-2022

### **Emergency Procedures:**

If you see/hear something, say something.

In the event of a medical emergency call 9-1-1 or use Red Emergency Phone. Offer assistance if trained and willing to do so. Guide emergency responders to victim.

In the event of a tornado warning, proceed to the lowest level interior room without window exposure. See <u>www.uwsp.edu/rmgt/Pages/em/procedures/other/floor-plans.aspx</u> for floor plans showing severe weather shelters on campus. Avoid wide-span structures (gyms, pools or large classrooms).

In the event of a fire alarm, evacuate the building in a calm manner. Meet at location 200 yards from building. Notify instructor or emergency command personnel of any missing individuals.

Active Shooter/Code React – Run/Escape, Hide, Fight. If trapped hide, lock doors, turn off lights, spread out and remain quiet. Call 9-1-1 when it is safe to do so. Follow instructions of emergency responders.

See UW-Stevens Point Emergency Procedures at <u>www.uwsp.edu/rmgt/Pages/em/procedures</u> for details on all emergency response at UW-Stevens Point. (Source: UWSP Risk Management Dept.)

		Торіс	Reading	Assignments
Week 1	Lecture	Syllabus/Introductions		
1/24-1/28	Discussion	Intro, Team	Video:	
		assignments, project	Conservation in	
		topics	the Real World	
Week 2	Lecture	Introduction to IRM	Knight & Meffe	
1/31-2/4			1997; INRMP	
			Fact Sheet	
	Discussion	Discussion #1 (practice);	Knight & Meffe	
		Task #1- Assessment	1997	
Week 3	Lecture	IRM	Williams et al.	
2/7-2/11	Lecture	Planning/Management	2009; Allen et al.	
2,7-2,11		Criteria	2005, Allen et al.	
	Discussion	Discussion #2 (graded	Failing et al.	
		from this point on)	2013	

#### **Tentative Schedule**

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Week 4	Lecture	Ecological	Dale et al. 2000	
2/14-2/18		Considerations		
	Discussion	Discussion #3	Dale et al. 2000	
Week 5	Lecture	Management	Yaffee 1999	
2/21-2/25		Philosophies		
	Discussion	Discussion #4	Messier &	
			Kneeshaw 1999	
Week 6	Lecture	Stakeholder	Decker et al.	
2/28-3/4		Considerations	1996	
2,20 3,4		considerations	1550	
	Discussion	Discussion #5	Chase et al. 2002	
	Discussion			
Week 7	Lecture	MIDTERM EXAM		
3/7-3/11				
5,, 5,11	Discussion	Task #2: Strategy		Task #1:
	Discussion	Task #2. Strategy		Assessment
Week 8	Locturo	Economic	TBD	Assessment
	Lecture		ТВО	
3/14-3/18	<u> </u>	Considerations		
	Discussion	Discussion #6	TBD	
		March 19-27: SPRING BREAK!		
Week 9	Lecture		Mir & Dick 2012	
Week 9 3/28-4/1	Lecture	BREAK!	Mir & Dick 2012	
	Lecture Discussion	BREAK!	Mir & Dick 2012	Task #2: Strategy
		BREAK! Small Private Lands Discussion #7; Task #3:	Mir & Dick 2012	Task #2: Strategy
3/28-4/1	Discussion	BREAK! Small Private Lands Discussion #7; Task #3: Implementation		Task #2: Strategy
3/28-4/1 Week 10		BREAK! Small Private Lands Discussion #7; Task #3: Implementation Large Private Lands-	Scherr &	Task #2: Strategy
3/28-4/1	Discussion Lecture	BREAK! Small Private Lands Discussion #7; Task #3: Implementation Large Private Lands- Agriculture		Task #2: Strategy
3/28-4/1 Week 10	Discussion	BREAK! Small Private Lands Discussion #7; Task #3: Implementation Large Private Lands-	Scherr &	Task #2: Strategy
3/28-4/1 Week 10 4/4-4/8	Discussion Lecture Discussion	BREAK! Small Private Lands Discussion #7; Task #3: Implementation Large Private Lands- Agriculture Discussion #8	Scherr & McNeely 2008	Task #2: Strategy
3/28-4/1 Week 10 4/4-4/8 Week 11	Discussion Lecture	BREAK! Small Private Lands Discussion #7; Task #3: Implementation Large Private Lands- Agriculture Discussion #8 Large Private Lands-	Scherr & McNeely 2008 Wisconsin's	Task #2: Strategy
3/28-4/1 Week 10 4/4-4/8	Discussion Lecture Discussion Lecture	BREAK! Small Private Lands Discussion #7; Task #3: Implementation Large Private Lands- Agriculture Discussion #8 Large Private Lands- Forest	Scherr & McNeely 2008 Wisconsin's Forests	Task #2: Strategy
3/28-4/1 Week 10 4/4-4/8 Week 11	Discussion Lecture Discussion	BREAK! Small Private Lands Discussion #7; Task #3: Implementation Large Private Lands- Agriculture Discussion #8 Large Private Lands-	Scherr & McNeely 2008 Wisconsin's	Task #2: Strategy
3/28-4/1 Week 10 4/4-4/8 Week 11 4/11-4/15	Discussion Lecture Discussion Lecture Discussion	BREAK!Small Private LandsDiscussion #7; Task #3: ImplementationLarge Private Lands- AgricultureDiscussion #8Large Private Lands- ForestDiscussion #9	Scherr & McNeely 2008 Wisconsin's Forests SFI 101	Task #2: Strategy
3/28-4/1 Week 10 4/4-4/8 Week 11 4/11-4/15 Week 12	Discussion Lecture Discussion Lecture	BREAK! Small Private Lands Discussion #7; Task #3: Implementation Large Private Lands- Agriculture Discussion #8 Large Private Lands- Forest Discussion #9 Large Private Lands-	Scherr & McNeely 2008 Wisconsin's Forests SFI 101 Fuhlendorf et al.	Task #2: Strategy
3/28-4/1 Week 10 4/4-4/8 Week 11 4/11-4/15	Discussion Lecture Discussion Lecture Discussion	BREAK!Small Private LandsDiscussion #7; Task #3: ImplementationLarge Private Lands- AgricultureDiscussion #8Large Private Lands- ForestDiscussion #9	Scherr & McNeely 2008 Wisconsin's Forests SFI 101 Fuhlendorf et al. 2012; TNC Beef	Task #2: Strategy
3/28-4/1 Week 10 4/4-4/8 Week 11 4/11-4/15 Week 12	Discussion Lecture Discussion Lecture Discussion Lecture	BREAK!Small Private LandsDiscussion #7; Task #3: ImplementationLarge Private Lands- AgricultureDiscussion #8Large Private Lands- ForestDiscussion #9Large Private Lands- Rangeland	Scherr & McNeely 2008 Wisconsin's Forests SFI 101 Fuhlendorf et al. 2012; TNC Beef Roadmap	
3/28-4/1 Week 10 4/4-4/8 Week 11 4/11-4/15 Week 12	Discussion Lecture Discussion Lecture Discussion	BREAK!Small Private LandsDiscussion #7; Task #3:ImplementationLarge Private Lands- AgricultureDiscussion #8Large Private Lands- ForestDiscussion #9Large Private Lands- RangelandDiscussion #10; Task #4:	Scherr & McNeely 2008 Wisconsin's Forests SFI 101 Fuhlendorf et al. 2012; TNC Beef Roadmap Wilkinson et al.	Task #3:
3/28-4/1 Week 10 4/4-4/8 Week 11 4/11-4/15 Week 12 4/18-4/22	Discussion Lecture Discussion Lecture Discussion Lecture Discussion	BREAK! Small Private Lands Discussion #7; Task #3: Implementation Large Private Lands- Agriculture Discussion #8 Large Private Lands- Forest Discussion #9 Large Private Lands- Rangeland Discussion #10; Task #4: Final Report	Scherr & McNeely 2008 Wisconsin's Forests SFI 101 Fuhlendorf et al. 2012; TNC Beef Roadmap Wilkinson et al. 2020	
3/28-4/1 Week 10 4/4-4/8 Week 11 4/11-4/15 Week 12	Discussion Lecture Discussion Lecture Discussion Lecture	BREAK!Small Private LandsDiscussion #7; Task #3:ImplementationLarge Private Lands- AgricultureDiscussion #8Large Private Lands- ForestDiscussion #9Large Private Lands- RangelandDiscussion #10; Task #4:	Scherr & McNeely 2008 Wisconsin's Forests SFI 101 Fuhlendorf et al. 2012; TNC Beef Roadmap Wilkinson et al.	Task #3:

			Advisory	
			Councils	
	Discussion	Presentation prep.		
Week 14	Lecture	Public Lands: Federal	Video: Lakes	
5/2-5/6			States Bat HCP	
	Discussion	Project Presentations		Task #4: Final
				Report
Week 15	Lecture	Non-government	Trauger et al.	
5/9-5/13		Organizations &	1995	
		Partnerships		
	Discussion	Project Presentations		
Week 16		FINAL EXAM		
5/16-5/20		Monday, 5/16, 0800-1000		