

Spring 2024

EVSC 623-852: Environmental Health

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Environmental Health: EVSC 623-852 on line asynchronous *Spring 2024 Course Syllabus*

NJIT Academic Integrity Code: All Students should be aware that the Department takes the University Code on Academic Integrity at NJIT very seriously and enforces it strictly. This means that there must not be any forms of plagiarism, i.e., copying of homework, class projects, or lab assignments, or any form of cheating in quizzes and exams. Under the University Code on Academic Integrity, students are obligated to report any such activities to the Instructor. Students are asked to practice extra care and attention in regard to academic honesty, with the understanding that all cases of plagiarism, cheating, multiple submission, and unauthorized collaboration are subject to penalty. Students must properly cite and attribute all sources used for papers and assignments. Students may not collaborate on exams or assignments, directly or through virtual consultation, unless the instructor gives specific permission to do so. Posting an exam, assignment, or answers to them on an online forum (before, during, or after the due date), in addition to consulting posted materials, constitutes a violation of the university's Honesty policy. Likewise, unauthorized use of live assistance websites, including seeking "expert" help for specific questions during an exam, can be construed as a violation of the honesty policy. All students should be familiar with the [NJIT Academic Integrity Code](#)

Academic integrity: Please note that it is my professional obligation and responsibility to report any academic misconduct to the Dean of Students Office. Any student found in violation of the code by cheating, plagiarizing or using any online software inappropriately will result in disciplinary action. This may include a failing grade of F, and/or suspension or dismissal from the university. If you have any questions about the code of Academic Integrity, please contact the Dean of Students Office at dos@njit.edu

COURSE INFORMATION

I. Course Description:

This course includes an interdisciplinary review of fundamental scientific principles necessary to understand basic environmental health science. Environmental health science examines the relationships and risks of the physical environment on human health. Basic science and engineering knowledge is applied to the recognition, evaluation and control of physical, chemical and biological processes that influence human health and welfare. This course is based on the premise that exposures to the environmental stressors that cause harm can be recognized through the observation of environmental quality parameters and mitigated by source controls and pollution prevention.

II. Learning Outcomes:

Student learners will be able to:

- Describe the direct and indirect human health and ecological effects of major environmental and occupational agents.
- Describe federal and state regulatory programs, guidelines and authorities that control environmental health issues.
- Specify current environmental risk assessment methods.
- Specify approaches for assessing, preventing and controlling environmental hazards that pose risks to human health and safety.

- Explain the general mechanisms of toxicity in eliciting a toxic response to various environmental exposures.
- Discuss various risk management and risk communication approaches employed in the field of environmental health sciences.

Number of Credits: 3

- **Prerequisites:** Basic college level courses in Biology, Chemistry and Physics

Course-Section and Instructor: EVSC 623-852, MP Bonchonsky

Office Hours (virtual by appointment) ; See Canvas Website; **Modality:** asynchronous “on line Newark” on Canvas
text: **Essentials of Environmental Health (Essential Public Health) 3rd Edition**

by [Robert H. Friis](#) (Author). ISBN-13: 978-1284123975, ISBN-10: 9781284123975

University-wide Withdrawal Date: See NJIT Academic calendar S '24 It will be strictly enforced.

POLICIES

All CES students must familiarize themselves with, and adhere to, all official university-wide student policies. CES takes these policies very seriously and enforces them strictly.

Grading Policy: The final grade in this course will be determined as follows:

Discussion Participation	10%
Quizzes	10%
Midterm	30%
Research Essay	20%
Final Exam	30%

Your final letter grade in this course will be based on the following range:

A	➤ 90	C	70-74
B+	85-90	F	<70
B	80-84		
C+	75-79		

On line course Policy: the course is on line and asynchronous; students are expected each week to log in, listen and observe lecture materials, read text chapter in text and post discussion items each week. Other assignments, tests, and quizzes must be taken and submitted as indicated on Canvas.

Discussion Policy: Discussion postings are an expectation of the course. The discussion postings accrue to the participation element of the grade and are used in the determination of the final letter grade as described above.

Exams: There will be a quiz, a midterm exam and a final exam held on line on-line. during the semester. The test periods are identified on your Canvas class site (dates are subject to change as will be indicated on Canvas).

Makeup Exam Policy: There will normally be **NO MAKE-UP QUIZZES OR EXAMS** during the semester. In the event that a student has a legitimate reason for missing a quiz or exam, the student should contact the Dean of Students office and present written verifiable proof of the reason for missing the exam, e.g., a doctor's note, police report, court notice, etc. clearly stating the date AND time of the mitigating problem. The student must also notify the CES Department Office/Instructor that the exam will be missed so that appropriate steps can be taken to make up the grade.

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ADDITIONAL RESOURCES

Accommodation of Disabilities: Office of Accessibility Resources and Services (*formerly known as Disability Support Services*) offers long term and temporary accommodations for undergraduate, graduate and visiting students at NJIT.

If you are in need of accommodations due to a disability please contact Chantonette Lyles, Associate Director at the Office of Accessibility Resources and Services at 973-596-5417 or via email at lyles@njit.edu. The office is located in Fenster Hall Room 260. A Letter of Accommodation Eligibility from the Office of Accessibility Resources Services office authorizing your accommodations will be required.

For further information regarding self-identification, the submission of medical documentation and additional support services provided please visit the Accessibility Resources and Services (OARS) website at:

- <http://www5.njit.edu/studentsuccess/disability-support-services/>

Important Dates (See: [Spring 2024 Academic Calendar, Registrar](#))

Date	Event
January 16, 2024	First Day of Classes
January 22	Last Day to Add/Drop Classes
April 1	Last Day to Withdraw
March 10-16	Spring Break - University Closed
April 30	Last Day of Classes
May 3-9	Final Exam Period

Course Outline

Lecture	Topic	Assignment
1	Introduction to Environmental Health Sciences, EHS History, and regulatory patterns.	Dates as shown on Canvas site Chap 1 pp 3-27; readings as shown on Canvas
2	Disease transmission and Environmental Factors	Chap 5 pp 97-126; other readings and material as shown on Canvas
3	Environmental Health and Water Systems	Chap 9 pp 211-238 other readings and material as shown on Canvas
4 Quiz 2/12-13 2024	Environmental Health Application to Solid Waste (domestic) (Quiz 1...see Canvas for date)	Chap12 pp 311 331 other readings and material as shown on Canvas
5	Hazardous Waste Impacts to Health and Controls	See readings posted on Canvas

6	Ionizing and Non Ionizing Radiation	Chap 8 pp 181-206; other readings and material as shown on Canvas
7	Persistent Organic Pollutants and Environmental Health	Chap 7 pp1 53-177; other readings and material as shown on Canvas
8 MIDTERM	Review and Midterm	See Canvas (Midt 3/7-3/8/24)
9	Metals and Environmental Health	Chap 6 pp129-151; other readings and material as shown on Canvas
10	Environmental Health Aspects of Food and Populations	Chap 11 pp 273-308; other readings and material as shown on Canvas
11	Hazard Recognition/Toxicology and Risk Assessment	Chap 3 pp 51-68; other readings and material as shown on Canvas
12 Essay Due	Environmental Health Application to Specific Hazardous Agents: e.g., Chlorinated Hydrocarbons, Metals (Research Essay due this week see Canvas)	See readings posted on Canvas Essay Due April 5,2024
13	Environmental Health Issues in Ambient and Indoor Air Quality	Chap10 pp 241-269; other readings and material as shown on Canvas
14	Occupational Health and Safety	Chap 13 pp 333-362; other readings and material as shown on Canvas
15 FINAL	Review and Final	See Canvas (Final 5/4-5/5 2024)

Updated by MPB - 2024

Spring 2024 Academic Calendar

January	15	Monday	Martin Luther King, Jr. Day
January	16	Tuesday	First Day of Classes
January	20	Saturday	Saturday Classes Begin
January	22	Monday	Last Day to Add/Drop a Class
January	22	Monday	Last Day for 100% Refund, Full or Partial Withdrawal
January	23	Tuesday	W Grades Posted for Course Withdrawals
January	29	Monday	Last Day for 90% Refund, Full or Partial Withdrawal, No Refund for Partial Withdrawal after this date
February	12	Monday	Last Day for 50% Refund, Full Withdrawal
March	4	Monday	Last Day for 25% Refund, Full Withdrawal
March	10	Sunday	Spring Recess Begins - No Classes Scheduled - University Open
March	16	Saturday	Spring Recess Ends
March	29	Friday	Good Friday - No Classes Scheduled - University Closed
March	31	Sunday	Easter Sunday - No Classes Scheduled - University Closed
April	1	Monday	Last Day to Withdraw

April	30	Tuesday	Friday Classes Meet
April	30	Tuesday	Last Day of Classes
May	1	Wednesday	Reading Day 1
May	2	Thursday	Reading Day 2
May	3	Friday	Final Exams Begin
May	9	Thursday	Final Exams End
May	11	Saturday	Final Grades Due
May		TBA	Commencement