

PTAC 1308-202C3

Introduction to Safety, Health, Environment 1 Fall 2025

Tuesday & Thursday 600pm to 750pm

Instructor Information:

Jimm B. Cooper, CSP, BSc, LP (ret), MI-NCCER

Office number: 409-933-8536 E-Mail: jcooper4745@com.edu

Office time: Tuesday – 800pm to 830pm

Office location IC-B23-room 207 (Process Technology Offices)

Student hours and location:

Industrial Careers Building #23 (ICB#23)

Classroom 206 Laboratory 120

Tuesdays & Thursdays 6:00 PM to 7:50 PM

Required Textbook/Materials:

Safety, Health, and Environment – 2nd Edition

Prentice Hall – Publisher

Center for the Advancement of Process Technology (CAPT)

Course Description:

This course covers the development of knowledge and skills to reinforce the attitudes and behaviors required for safe and environmentally sound work habits. Emphasis is placed on safety, health, and environmental issues in the performance of all job tasks and regulatory compliance issues. Students will list components of a typical plant safety and environmental program; describe the role of a process technician in relation to safety, health, and environment; and identify and describe safety, health, and environmental equipment uses. Prerequisite: TSI Math 342 or equivalent developmental course with a grade of "C" or better.

Course requirements:

This course, PTAC 1308 – SH&E1, requires completion of online homework/quizzes and two (2) written assignments. Also, there are in class examinations – 6 section exams, a midterm exam and a final exam. Laboratory exercises are completed in class without makeup.

Determination of Course Grade/Detailed Grading Formula:

<u>Chapter quizzes</u> will be given for each chapter. These quizzes / HW are open book and the number of questions per chapter will vary. These quizzes are to be completed outside of class and through Brightspace. You will have up to three (3) attempts for each chapter quiz. There are 24 quizzes, consisting of 370 total questions. (30% of grade)

<u>Section Examinations</u>: These exams are given after every four (4) chapters of the text. There are six (6) section exams worth 100 points each. The section examinations will be taken in class and are closed book. (40% of grade

<u>Mid-term Examination</u>: The Midterm Exam will cover the first 12 chapters of the textbook. There will be 60 questions. Each question will be worth 2.00 points for a point total of 120 with a 5 point addition for a total possible point of 125 points. (8% of grade)

Final Examination: The final exam for this class is a comprehensive examination covering all 24 chapters. It will be 95 questions at two (2) points each. There will be approximately 5 to 10 questions from each chapter. The questions will be presented in a random order. There will be ten (10) points added to each FE score for a possible 200 points. (15% of grade)

<u>Safety Data Sheet Analysis</u>: A SDS Analysis of a topic selected by the student from list of topics provided in BrightSpace under assignments. An example of a report is listed under this assignment's tab. The report is to be done in a business report format. <u>A cut and paste version of the SDS will not be accepted.</u> (6% of grade)

<u>Permitting Procedures Report</u>: A Permitting Procedures Report will be an assessment of an incident of the student's choice. The PPR will explain how the incident could have been avoided or have reduced consequences if the permitting process had been followed. (6% of grade)

<u>Discussion Board</u>: A discussion board will be available for students to earn extra points to make up for low Section Examination scores. The discussion board consists of five (5) questions that must be answered. This part is worth 25 points (5 points per answer). After completing the first part, a student must reply to other students' replies of the questions asked. Five (5) replies gain another 25 points.

Attendance, Lab exercises, and Safety Minute (ALSM) will be added at end of semester to point total. These points are additional points that will not exceed 100 points.

Late Work, Make-Up, and Extra-Credit Policy:

Quizzes/Homework is expected to be completed by the closed date which will be the day of the appropriate section exam. Quizzes and Homework will not be accepted after the closed date.

Section Examinations are expected to be made up at the next class meeting date. The make-up will be given after the day's class has ended, NOT before class or during break.

Attendance Policy: Each student will be required to register his/her attendance in the class by signing the class roster. This class includes lab time and the attendance sheets will be used to record lab points based on the day's activities.

Communicating with your instructor: ALL electronic communication with the instructor must be through your COM email. Due to FERPA restrictions, faculty cannot share any information about performance in the class through other electronic means. D2wL Brightspace has options to use to contact your instructor and /or other students in the class.

Student Learner Outcome	Maps to Core Objective	Assessed via this Assignment
1. SLO #1	Textbook, outside reading	Discussion by peers
2. SLO #2	Photos, Videos	Review by class
3. SLO #3	Scenarios, Investigations	Projects, Tabletop exercises
4. SLO #4	Scenarios, practice sessions	Projects, Tabletop Exercises
5. SLO #5	Review of OSHA Standards	Projects, Tabletop Exercises

Academic Dishonesty:

The Section Examinations and Reports are designed to be completed by each student individually. Proven collaboration will result in disciplinary actions that could include dismissal from the program. Essays are checked for plagiarism using Turnitin.

Student Concerns:

If you have any questions or concerns about any aspect of this course, please contact me using the contact information previously provided. If, after discussing your concern with me, you continue to have questions, please contact Mr. Derrick Lewis, Program Director, dlewis22@com.edu. Please include your contact information in your email.

Determination of Course Grade/Detailed Grading Formula

Chapter Quiz / HW (24): 3	70 @ 1.30 points each	480 points
Section Examinations	6 @ 100 points each	600 points
Safety Data Sheet Report	1 @ 100 points	100 points
Permitting Procedures Report	1 @ 100 points	100 points
Midterm Examination	1 @ 125 points	125 points
Final Examination	1 @ 200 points	<u>200 points</u>
TOTAL Points (exclus	1605 points	
Discussion Board (extra credit	50 points	
Lab Exercises / Attendance (ad	100 points	

Grading criteria:

1605 to 1444 = A 1443 to 1284 = B 1283 to 1123 = C 1122 to 963 = D 962 to 000 = F

Course outline: (include calendar with lecture topics, due dates)

Week	Day	Date	Reading Assignments	Quiz & Exam Due Dates
1	Tue	8/19	Ch. 1 Introduction to Safety, Health & Environment	Quiz 1 closes 9/02
1	Thu	8/21	Ch. 2 Types of Hazards and Their Effects	Ouiz 2 closes 9/02

2	Tue	8/26	Discussion Board (PSM) opens.	Quiz 3 closes 9/02
2			Ch. 3 Recognizing Chemical Hazards	
	Thu	8/28	Ch. 4 Recognizing Biological Hazards	Quiz 4 closes 9/02
3	Tue	9/02	Section Exam #1	Quiz 5 closes 9/16
3			Ch. 5 Equipment and Energy Hazards	
	Thu	9/04	Ch. 6 Fire and explosion Hazards	Quiz 6 closes 9/16
1	Tue	9/09	Ch. 7 Pressure, Radiation & Temperature Hazards	Quiz 7 closes 9/16
4	Thu	9/11	Ch. 8 Hazardous Atmospheres & Respiratory Hazards	Quiz 8 closes 9/16
5	Tue	9/16	Section Exam #2	Quiz 9 closes 9/30
)			Ch 9 Working Area & Height Hazards	
	Thu	9/18	Safety Data Sheet Analysis Assigned	SDSA due 9/30
			Ch. 10 Hearing & Noise Hazards	Quiz 10 closes 9/30
6	Tue	9/23	Ch. 11 Construction, Maintenance & Tool Hazards	Quiz 11 closes 9/30
U	Thu	9/25	Ch. 12 Vehicle & Transportation Hazards	Quiz 11 closes 9/30
7	Tue	9/30	Safety Data Sheet Analysis Due	Study for midterm exam
/			Section Exam #3	
			Guest Speaker	
	Thu	10/02	Mid-term Review	Study for midterm exam
			Make up Section Exams	
8	Tue	10/07	Mid-term Examination	
U	Thu	10/09	Ch. 13 Natural Disasters & Inclement Weather	Quiz 13 closes 10/23
9	Tue	10/14	Ch. 14 Physical Security & Cybersecurity	Quiz 14 closes 10/23
<u> </u>	Thu	10/16	Ch. 15 Recognizing Ergonomic Hazards	Quiz 15 closes 10/23
10	Tue	10/21	Ch. 16 Recognizing Environmental Hazards	Quiz 16 closes 10/23
10	Thu	10/23	Section Exam #4	Quiz 17 closes 11/06
	_	10/20	Ch. 17 Introduction to Hazard Controls	
11	Tue	10/28	Ch.18 Engineering Controls: Alarms & Indicator Systems	Quiz 18 closes 11/06
11	Thu	10/30	Ch. 19 Engineering Controls: Process Containment &	Quiz 19 closes 11/06
	_	44/04	Process Upset Controls	
12	Tue	11/04	Ch. 20 Administrative Controls: Programs & Practices	Quiz 20 closes 11/06
1 2	Thu	11/06	Section Exam #5	Quiz 21 closes 11/20
			Ch. 21 Permitting systems	Permit Paper due
	T	11/11	Permitting Systems Paper assigned	11/20
13	Tue	11/11	Ch. 22 Personal Protective Equipment and First Aid	Quiz 22 closes 11/20
	Thu	11/13	Ch. 23 Monitoring Equipment	Quiz 23 closes 11/20
14	Tue	11/18	Ch. 24 Fire, Rescue & Emergency Response Equipment	Quiz 24 closes 11/20
•	Thu	11/20	Permitting Systems Paper Due	STUDY FOR FINAL
			Section Exam #6	EXAMINATION
	Tuo	11/25	Guest Speaker Final Examination Review	Study for Final Exam
15	Tue		Thanksgiving Holidays	ENJOY THANKSGIVING
	Thu	11/27	Thanksgiving hondays	
<u> </u>	Tue	12/02	Final Examination Class ends	DAY WITH FAMILY
16	Tue	12/02		Have a great Winter break
	Thu	12/04	Grades posted	winter break

THIS SCHEDULE IS SUBJECT TO CHANGE DEPENDING ON DIRECTIVES COM'S ADMINISTRATION.

Institutional Policies and Guidelines

Grade Appeal Process: Concerns about the accuracy of grades should first be discussed with the instructor. A request for a change of grade is a formal request and must be made within six months of the grade assignment. Directions for filing an appeal can be found in the student handbook. (https://www.com.edu/student-services/student-handbook.htm) An appeal will not be considered because of general dissatisfaction with a grade, penalty, or outcome of a course. Disagreement with the instructor's professional judgment of the quality of the student's work and performance is also not an admissible basis for a grade appeal.

Academic Success & Support Services: College of the Mainland is committed to providing students the necessary support and tools for success in their college careers. Support is offered through our Tutoring Services, Library, Counseling, and through Student Services. Please discuss any concerns with your faculty or an advisor.

ADA Statement: Any student with a documented disability needing academic accommodations is requested to contact:

Kimberly Lachney, Student Accessibility Services Coordinator

Phone: 409-933-8919

Email: AccessibilityServices@com.edu

Location: COM Doyle Family Administration Building, Student Success Center

Textbook Purchasing Statement: A student attending College of the Mainland is not under any obligation to purchase a textbook from the college-affiliated bookstore. The same textbook may also be available from an independent retailer, including an online retailer.

Withdrawal Policy: Students may withdraw from this course for any reason prior to the last eligible day for a "W" grade. Before withdrawing students should speak with the instructor and consult an advisor. Students are permitted to withdraw only six times during their college career by state law. The last date to withdraw from the 1st 8-week session is October 1. The last date to withdraw for the 2nd 8-week session is November 25.

FN Grading: The FN grade is issued in cases of *failure due to a lack of attendance*, as determined by the instructor. The FN grade may be issued for cases in which the student ceases or fails to attend class, submit assignments, or participate in required capacities, and for which the student has failed to withdraw. The issuing of the FN grade is at the discretion of the instructor. The last date of attendance should be documented for submission of an FN grade.

Early Alert Program: The Student Success Center at College of the Mainland has implemented an Early Alert Program because student success and retention are very important to us. I have been asked to refer students to the program throughout the semester if they are having difficulty completing assignments or have poor attendance. If you are referred to the Early Alert Program

you will be contacted by someone in the Student Success Center who will schedule a meeting with you to see what assistance they can offer in order for you to meet your academic goals.

Resources to Help with Stress:

If you are experiencing stress or anxiety about your daily living needs including food, housing or just feel you could benefit from free resources to help you through a difficult time, please click here https://www.com.edu/community-resource-center/. College of the Mainland has partnered with free community resources to help you stay on track with your schoolwork, by addressing life issues that get in the way of doing your best in school. All services are private and confidential. You may also contact the Dean of Students office at deanofstudents@com.edu or communityresources@com.edu.

Nondiscrimination Statement:

The College District prohibits discrimination, including harassment, against any individual on the basis of race, color, religion, national origin, age, veteran status, disability, sex, sexual orientation, gender (including gender identity and gender expression), or any other basis prohibited by law. Retaliation against anyone involved in the complaint process is a violation of College District policy.