Course Description

Analysis and discussion of theories and principles of OSHA and their practical uses in the workplace. Non-engineering based methods are used to facilitate student understanding.

Prerequisites

This course is designed to complement MOS 5201, Safety Engineering, and it is recommended MOS 5101 and MOS 5201 be taken sequentially.

Course Textbook


Course Learning Objectives

Upon completion of this course, students should be able to:

1. Explain the historical reasons that led to the development of modern safety and health regulations and programs.
2. Analyze the costs and effects of accidents on industry, the economy, and society.
3. Compare the seven major theories of accident causation.
4. Explain the mission of the Occupational Safety and Health Administration (OSHA) and the importance of the OSH Act.
5. Discuss the development of OSHA standards and methods for enforcing them.
6. Identify OSHA forms to be maintained and posted by employers.
7. Discuss workers' compensation and categories of compensable injuries.
8. Define ergonomics and illustrate ergonomics problems and solutions in the workplace.
9. Describe methods of protection against mechanical injuries, including lockout/tagout programs.
10. Assess the impact of falls and slips and the guarding of such hazards.
11. Discuss chemical hazards and their major exposure routes to humans.
12. Compare and contrast ionizing and non-ionizing radiation and the hazards associated with each.
13. Explain the importance of hearing conservation programs.
14. Assess ethical issues commonly faced by safety and health practitioners and the steps for handling those issues.
15. Recommend the methods of promoting workplace safety and health.
16. Support the importance of safety and health training on accident prevention.
17. Describe the safety impacts that computers, automation, and robots have in today's workplace.
18. Develop, initiate, and evaluate a product safety and liability program.

Credits

Upon completion of this course, the students will earn three (3) hours of college credit.
Course Structure

1. **Unit Learning Objectives:** Each unit contains Unit Learning Objectives that specify the measurable skills and knowledge students should gain upon completion of the unit.
2. **Written Lectures:** Each unit contains a Written Lecture, which discusses lesson material.
3. **Reading Assignments:** Each unit contains Reading Assignments from one or more chapters from the textbook. Supplemental Readings are provided in the Unit I-VII study guides to aid students in their course of study.
4. **Learning Activities (Non-Graded):** The non-graded Learning Activity in Unit VIII is provided to aid students in their course of study.
5. **Key Terms:** Key Terms are intended to guide students in their course of study. Students should pay particular attention to Key Terms as they represent important concepts within the unit material and reading.
6. **Unit Assessments:** This course contains seven Unit Assessments, one to be completed at the end of Units I-VII. Assessments are composed of written response questions. Grading rubrics are included with the Unit I, III, IV, and VI Assessments. Specific information about accessing these rubrics is provided below.
7. **Article Review:** Students are required to submit for grading an Article Review in Unit II. Specific information and instructions regarding this assignment are provided below. A grading rubric is included with this assignment. Specific information about accessing this rubric is provided below.
8. **Research Paper:** Students are required to submit for grading a Research Paper Topic in Unit III and the Research Paper in Unit VIII. Specific information and instructions regarding this assignment are provided below.
9. **Final Exam (Proctored):** Students are to complete a Final Exam in Unit VIII. All Final Exams are proctored—see below for additional information. You are permitted four (4) hours to complete this exam, in the presence of your approved proctor. This is an open book exam.
10. **Ask the Professor:** This communication forum provides you with an opportunity to ask your professor general or course content related questions.
11. **Student Break Room:** This communication forum allows for casual conversation with your classmates.

Unit Assignments

**Unit II Article Review**

In the Business Source Complete database of the CSU Online Library, locate and read the article, “Safety, Accidents, and Investigations: Be Prepared for the Unexpected,” by Robert A. Battles. Write a summary of the article and answer the following:

- What is the author’s main point?
- Who is the author’s intended audience?
- What is involved in analyzing potential job hazards and developing an accident prevention plan that will prevent and reduce the cost of accidents?
- How should you respond to accidents effectively?
- How should you prepare for an accident investigation? What should you expect from investigators?
- How could this article be improved? Can you think of any information from other sources, such as your textbook, whose inclusions would improve this article?

Your Article Review must be a minimum of three pages, not counting the title page and references. Use APA style when writing the paper, including references and in-text citations.

Information about accessing the Blackboard Grading Rubric for this assignment is provided below.

**Unit III Research Paper Topic and Outline**

Please select a topic in the field of safety that is of interest to you and prepare a well-organized and thoughtful five- to seven-page research paper. In Unit III, submit your selected topic and summary outline and wait for your professor's approval before continuing to write the paper.

**Unit VIII Research Paper**

The required research paper title page and reference page are not included in the required paper length. Please be sure to include an Introduction and Conclusion section in your paper, and label both sections as such. Your paper must contain at least five references, and may include Internet sources, books, and professional journals or other resources related to the profession.
CSU requires that students use the APA format in writing course papers. The Ebsco Database (Business Source Complete) is a very good source of journals for any paper written for CSU. Students can access this information, as well as other CSU Online Library resources by clicking on the My Library button located in the Course Menu.

Once you have completed your Research Paper, submit your completed paper by uploading it through the “view/complete” link provided in the unit. Do not e-mail your paper directly to your professor. Your university record will be automatically updated to indicate you have submitted your paper and the paper will be provided to your professor for grading.

**APA Guidelines**

CSU requires that students use the APA style for papers and projects. Therefore, the APA rules for formatting, quoting, paraphrasing, citing, and listing of sources are to be followed. A document titled “APA Guide” is available for you to download from the APA Guide link, found in the Learning Resources area of the myCSU Student Portal. It may also be accessed from the Student Resources link on the Course Menu. This document includes examples and sample papers and provides links to The CSU Success Center and the CSU Online Library staff.

**Blackboard Grading Rubrics**

**Unit Assessment Rubrics**

One or more “written response” questions in this course utilize a Blackboard Grading Rubric. A rubric is a tool that lists evaluation criteria and can help you organize your efforts to meet the requirements of the written response question. Your professor will use the Blackboard Grading Rubric to assign points and provide feedback.

You are encouraged to view the rubric before submitting your response. This will allow you to review the evaluation criteria as you prepare your response. You may access the rubric by clicking on the “View Rubric” icon next to the written response question within the assessment. Upon receiving your assessment grade, you may view your grade breakdown and feedback in the rubric within the assessment.

**Assignment Rubrics**

One or more assignments in this course utilizes a Blackboard Grading Rubric. A rubric is a tool that lists evaluation criteria and can help you organize your efforts to meet the requirements of an assignment. Your professor will use the Blackboard Grading Rubric to assign points and provide feedback for the assignment.

You are encouraged to view the assignment rubric before submitting your work. This will allow you to review the evaluation criteria as you prepare your assignments. You may access the rubric in “My Grades” through the “Tools” button in your course menu. Click the “View Rubric” link to see the evaluation criteria for the assignment. Upon receiving your assignment grade, you may view your grade breakdown and feedback in the rubric.

**CSU Grading Rubric for Papers/Projects**

The course papers will be graded based on the CSU Grading Rubric for all types of papers, unless otherwise specified within assignment instructions. In addition, all papers will be submitted for electronic evaluation to rule out plagiarism. Course projects will contain project specific grading criteria defined in the project directions. To view the rubric, click the Academic Policies link on the Course Menu, or access it through the CSU Grading Rubric link found in the Learning Resources area of the myCSU Student Portal.

**Final Examination Guidelines**

Final Exams are to be administered to students by an approved Proctor. CSU approves two, flexible proctoring options: a standard Proctor, who is chosen by the student and approved by the university, or Remote Proctor Now (RP Now), an on-demand, third-party testing service that proctors examinations for a small fee.
A standard Proctor is an unbiased, qualified individual who is selected by the student and agrees to supervise an examination. You are responsible for selecting a qualified Proctor, and the Proctor must be pre-approved by CSU.

Students choosing RP Now must have an operational webcam/video with audio, a high-speed internet connection, and the appropriate system rights required to download and install software.

To review the complete Examination Proctor Policy, including a list of acceptable Proctors, Proctor responsibilities, Proctor approval procedures, and the Proctor Agreement Form, go to the myCSU Student Portal from the link below.

http://mycsu.columbiasouthern.edu

You are permitted four (4) hours to complete this exam, in the presence of your approved Proctor. This is an open book exam. Only course textbooks and a calculator, if necessary, are allowed when taking proctored exams.

Communication Forums

These are non-graded discussion forums that allow you to communicate with your professor and other students. Participation in these discussion forums is encouraged, but not required. You can access these forums with the buttons in the Course Menu. Instructions for subscribing/unsubscribing to these forums are provided below.

Once you have completed Unit VIII, you MUST unsubscribe from the forum; otherwise, you will continue to receive e-mail updates from the forum. You will not be able to unsubscribe after your course end date.

Click here for instructions on how to subscribe/unsubscribe and post to the Communication Forums.

Ask the Professor

This communication forum provides you with an opportunity to ask your professor general or course content questions. Questions may focus on Blackboard locations of online course components, textbook or course content elaboration, additional guidance on assessment requirements, or general advice from other students.

Questions that are specific in nature, such as inquiries regarding assessment/assignment grades or personal accommodation requests, are NOT to be posted on this forum. If you have questions, comments, or concerns of a non-public nature, please feel free to email your professor. Responses to your post will be addressed or emailed by the professor within 48 hours.

Before posting, please ensure that you have read all relevant course documentation, including the syllabus, assessment/assignment instructions, faculty feedback, and other important information.

Student Break Room

This communication forum allows for casual conversation with your classmates. Communication on this forum should always maintain a standard of appropriateness and respect for your fellow classmates. This forum should NOT be used to share assessment answers.

Grading

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<th>Component</th>
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<tr>
<td>Assessments (7 @ 7%)</td>
<td>49%</td>
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<tr>
<td>Article Review</td>
<td>13%</td>
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<td>Research Paper Topic and Outline</td>
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<td>Research Paper</td>
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<td>Final Exam</td>
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<td><strong>Total</strong></td>
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Course Schedule/Checklist (PLEASE PRINT)

The following pages contain a printable Course Schedule to assist you through this course. By following this schedule, you will be assured that you will complete the course within the time allotted.
By following this schedule, you will be assured that you will complete the course within the time allotted. Please keep this schedule for reference as you progress through your course.

## Unit I  
**Foundations in Occupational Safety and Health**

<table>
<thead>
<tr>
<th>Review</th>
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<tbody>
<tr>
<td>☐ Unit Study Guide</td>
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<tr>
<td>Read</td>
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<tr>
<td>☐ <strong>Chapter 1</strong>: Safety and Health Movement, Then and Now</td>
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<td>☐ <strong>Chapter 2</strong>: Accidents and Their Effects</td>
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<td>☐ <strong>Chapter 3</strong>: Theories of Accident Causation</td>
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<td>☐ <strong>Chapter 4</strong>: Roles and Professional Certifications for Safety and Health Professionals</td>
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<tr>
<td>☐ <strong>Supplemental Reading</strong>: See Study Guide</td>
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<td>Submit</td>
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<td>☐ Assessment</td>
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Notes/Goals:

## Unit II  
**Occupational Safety and Health Standards and Regulations**

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<tr>
<td>☐ Unit Study Guide</td>
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<td>Read</td>
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<tr>
<td>☐ <strong>Chapter 5</strong>: Safety, Health, and Competition in the Global Marketplace</td>
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<td>☐ <strong>Chapter 6</strong>: The OSH Act, Standards, and Liability</td>
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<td>☐ <strong>Chapter 7</strong>: Workers’ Compensation</td>
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<td>☐ <strong>Chapter 8</strong>: Accident Investigation and Reporting</td>
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<td>☐ <strong>Chapter 9</strong>: Product Safety and Liability</td>
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<td>☐ <strong>Supplemental Reading</strong>: See Study Guide</td>
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<td>Submit</td>
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<td>☐ Assessment</td>
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<td>☐ Article Review</td>
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<td>☐ Proctor Approval Form</td>
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Notes/Goals:
### Unit III: The Human Element

**Review:**
- [ ] Unit Study Guide

**Read:**
- [ ] **Chapter 10:** Ergonomic Hazards: Musculoskeletal Disorders (MSDs) and Cumulative Trauma Disorders (CTDs)
- [ ] **Chapter 11:** Stress and Safety
- [ ] **Chapter 12:** Safety and Health Training
- [ ] **Chapter 13:** Violence in the Workplace
- [ ] **Supplemental Reading:** See Study Guide

**Submit:**
- [ ] Assessment
- [ ] Research Paper Topic and Outline

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**Notes/Goals:**

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### Unit IV: Hazard Assessment

**Review:**
- [ ] Unit Study Guide

**Read:**
- [ ] **Chapter 15:** Falling, Impact, Acceleration, Lifting, and Vision Hazards
- [ ] **Chapter 19:** Fire Hazards and Life Safety
- [ ] **Supplemental Reading:** See Study Guide

**Submit:**
- [ ] Assessment

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**Notes/Goals:**
# MOS 5101, Safety and Accident Prevention

## Course Schedule

### Unit V  
**Hazard Assessment-Prevention and Control**

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| 🗒️  Chapter 14: Mechanical Hazards and Machine Safeguarding  
| 🗒️  Chapter 16: Hazards of Temperature Extremes  
| 🗒️  Chapter 17: Pressure Hazards  
| 🗒️  Chapter 18: Electrical Hazards  
| 🗒️  Chapter 21: Radiation Hazards  
| 🗒️  Chapter 22: Noise and Vibration Hazards  

| Supplemental Reading | See Study Guide |

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**Notes/Goals:**

### Unit VI  
**Industrial Hygiene and Education in Safety and Health**

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<th>Read</th>
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| 🗒️  Chapter 20: Industrial Hygiene and Confined Spaces (pp. 429-472)  
| 🗒️  Chapter 23: Computers, Automation, and Robots (pp. 522-533)  
| 🗒️  Chapter 24: Bloodborne Pathogens, and Bacterial Hazards in the Workplace (pp. 539-557)  

| Supplemental Reading | See Study Guide |

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**Notes/Goals:**
### Unit VII: Management of Safety and Health

| Review:  | Unit Study Guide |
| Read:    | Chapter 26: Ethics and Safety  
|          | Chapter 27: Hazard Analysis/Prevention and Safety Management  
|          | Chapter 28: Promoting Safety  
|          | Chapter 29: Environmental Safety and ISO 14000 (Environmental Management)  
|          | Chapter 30: TSM: Total Safety Management in a Quality Management Setting  
|          | Chapter 31: Establishing a Safety-First Corporate Culture  
|          | **Supplemental Reading:** See Study Guide |
| Submit:  | Assessment  
|          | Request to take Final Exam |

**Notes/Goals:**

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### Unit VIII: Practical Application

| Review:  | Unit Study Guide  
| Read:    | **Learning Activity (Non-Graded):** See Study Guide  
|          | Chapter 25: Preparing for Emergencies and Terrorism |
| Submit:  | Research Paper  
|          | Final Exam |

**Notes/Goals:**

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