OSHA Regulations-Construction Industry (OSHT 1305)



Credit: 3 semester credit hours (2 hour lecture, 2 hour lab)

Prerequisite: Passed the reading and writing portion of TSI or other accepted testing instrument.

Course Description

A study of Occupational Safety and Health Administration (OSHA) regulations pertinent to the construction industry.

Required Textbook and Materials

- 29 CFR 1926 OSHA Construction Industry Standards, MANCOMM July 2018

 ISBN number is
- 2. 11/2 2" 3-ring binder, with pockets

Notebook paper for binder

*Organization of notebook; contents should include:

- Cover page with first and last name
- Title of course
- Day and time of weekly class meeting
- Semester (example, "Fall 2018")
- Dividers labeled, syllabus, PPT. lectures, study questions, handouts, exams

1 USB Flashdrive

Course Objectives

Upon completion of this course the student will be able to:

- 1. Identify the OSHA regulations which apply to the construction industry.
- 2. Demonstrate proficiency in retrieving specific information from Title 29 CFR Part 1926 regulations.

Course Outline

- A. Welcome to LIT:
 - 1. Introduction of faculty and students
 - 2. Expectations
 - 3. Policies
 - 4. Assignment 1
- B. Resources
 - 1. OSHA Website
 - 2. NIOSH, ANSI, NSC
 - 3. Federal Register
 - 4. Professional Organizations
- C. General Interpretations
 - 1. Terminology

- 2. Top Ten Construction Safety Concerns
- 3. Explanation of the General Duty Clause
- 4. OSHA Field Operations Manual, Chapter 4, Violations, Section III
- 5. Case Study-Explosion at BP Texas City Refinery
- D. General Safety and Health Provisions
 - 1. Employer Responsibilities
 - 2. Safety Training and Education
 - 3. Compliance Duties
- E. OSHA's Focus Four Hazards
 - 1. Part 1-PFAS, Fall Hazard Recognition
 - 2. Review PFAS Checklist & Ladder Safety Exercises
 - 3. Guardrail & Safety Net Summary
 - 4. Quiz
- F. OSHA's Focus Four Hazards
 - 1. Part 2-Caught in or Between Hazard Recognition
 - 2. Key Terms
 - 3. Review Fatal Facts Accident Summaries
 - 4. Review Exercise Worksheet
 - 5. Quiz
- G. OSHA's Focus Four Hazards
 - 1. Struck-By Hazard Recognition
 - 2. Key Terms
 - 3. Hand Tools
 - 4. Power Tools
 - 5. Nail Guns
 - 6. Options A & B Focus Four Toolbox Talks Handouts
 - 7. Review Fatal Facts Accident Summaries
 - 8. Quiz
- H. OSHA's Focus Four Hazards
 - 1. Part 3-Electrocution Hazard Recognition
 - 2. Key Terms
 - 3. General Rules for Construction Electrical Safety
 - 4. GFCI
 - 5. Activity A & B Scenarios
 - 6. Fatal Facts Accident Summaries
 - 7. Quiz
- I. Scaffolds
 - 1. General Requirements
 - 2. Specific Types of Scaffolds
 - 3. Aerial Lifts
 - 4. Training Requirements
 - 5. Fatal Facts Examples
 - 6. Study Questions
- J. Duty to Have Fall Protection
 - 1. Fall Protection Systems Criteria and Practices
 - 2. Training Requirements/Demonstration

OSHT 1305 COURSE SYLLABUS

- 3. Guardrail Systems
- 4. Study Questions
- K. Signs, Signals, and Barricades
 - 1. Accident Prevention Signs and Tags
 - 2. Signaling
 - 3. Barricades
 - 4. Definitions
- L. Confined Space
 - 1. Key Terms & Examples
 - 2. Permit Required/Non-Permit Required
 - 3. Confined Space Pre-Entry Checklist
 - 4. Lockout Tagout
 - 5. Hazards of Nitrogen Asphyxiation
 - 5. Quiz
- M. Welding & Cutting Safety
 - 1. Subpart J-1926.350-354
 - 2. Key Terms
 - 3. Applicable Standards
 - 4. Toxic and Hazardous Substances
 - 5. Case Study
- N. Excavations
 - 1. Subpart P 1926.650 >
 - 2. Specific Excavation Requirements
 - 3. Key Terms
 - 4. Soil Classification
 - 5. Sloping, Benching and Shoring for Trenches
 - 6. Quiz
- O. Cranes, Derricks & Subpart CC
 - 1. Subpart N- 1926.550 Worksheet
 - 2. Crane Safety
 - 3. Training Requirements/OSHA Fact Sheet
 - 4. New Points in the Revised Standard
- P. Subpart Z Toxic and Hazardous Substances
 - 1. Asbestos (1926.1101)
 - 2. Worksheet
 - 3. Key Terms
 - 4. Exposure Assessments and Monitoring
 - 5. Compliance
 - 6. Medical Surveillance and Recordkeeping
 - 7. Lead in Construction
 - 8. Employer Responsibilities
 - 9. Compliance Program
 - 10. Respiratory Protection
 - 11. Hygiene Facilities and Practices
 - 12. Medical Surveillance

Grading Scale

A = 90-100 B = 80-89 C = 70-79 D = 60-69 F = Less than 60*Notebooks will be graded the evening of the final.

Course Evaluation

Final grades will be calculated according to the following criteria:

Test 1 = 25%Test 2 = 25%Notebook = 10%Final = 40%

Course Policies

- 1. No food, drinks, or use of tobacco products in class.
- 2. Computers, telephones, headphones, and any other electronic devices must be turned off while in class or used only with permission of the instructor.
- 3. Do not bring children to class.
- 4. If you wish to drop a course, the student is responsible for initiating and completing the drop process. If you stop coming to class and fail to drop the course, you will earn an 'F' in the course.
- 5. Additional class policies as defined by the individual course instructor are in the addendum

Disabilities Statement

The Americans with Disabilities Act of 1992 and Section 504 of the Rehabilitation Act of 1973 are federal anti-discrimination status that provides comprehensive civil rights for persons with disabilities. Among other things, these statues require that all students with documented disabilities be guaranteed a learning environment that provides for reasonable accommodations for their disabilities. If you believe you have a disability requiring an accommodation, please contact the Special Populations Coordinator, at (409) 880-1737 or visit her office located in the Cecil Beeson Building, room 116B.

**Students with special needs and/or medical emergencies or situations should communicate with their instructor regarding individual exceptions/provisions. It is the student's responsibility to communicate such needs to the instructor.

Student Code of Conduct Statement

It is the responsibility of all registered Lamar Institute of Technology students to access, read, understand and abide by all published policies, regulations, and procedures listed in the *LIT Catalog and Student Handbook*. The *LIT Catalog and Student Handbook* may be accessed at <u>www.lit.edu</u> or obtained in print upon request at the Student Services Office. Please note that the online version of the *LIT Catalog and Student Handbook* supersedes all other versions of the same document change.