

CNST-1750: CONSTRUCTION SAFETY

Cuyahoga Community College

Viewing: CNST-1750 : Construction Safety

Board of Trustees:

January 2023

Academic Term:

Fall 2023

Subject Code

CNST - Construction Engineering Tech

Course Number:

1750

Title:

Construction Safety

Catalog Description:

The theories and principles of construction safety and health applied to real-world setting. Upon completion of course materials and required attendance hours, students receive their OSHA 30 certification.

Credit Hour(s):

3

Lecture Hour(s):

3

Requisites

Prerequisite and Corequisite

None.

Outcomes

Course Outcome(s):

Obtain OSHA 30 certification for the construction industry.

Objective(s):

1. Explain the importance of safety in the construction industry and the role personnel play in safety and health.
2. List ways to prevent violence and reduce stress in the workplace.
3. Explain workers' compensation and OSHA compliance.
4. List and explain OSHA's construction standard (29CFR 1926) and corresponding safety practices.
5. Explain the relationship between ethics and job safety.

Course Outcome(s):

Explain how to respond to workplace hazards.

Objective(s):

1. Create a construction project safety plan.
 2. Describe job safety, and prevention and control of workplace hazards.
 3. Describe accident investigation, reporting and record keeping.
 4. Describe an emergency response plan.
 5. Define total safety management.
-

Methods of Evaluation:

- a. Summative quizzes
- b. Assignments
- c. Final exam.
- d. Class participation

Course Content Outline:

- a. Safety movement in the construction industry
 - i. Past and present history trends
 - ii. Environmental safety and ISO 14000
- b. OSHA compliance with personal protective equipment
 - i. Fire protection
 - ii. Fall protection
 - iii. Electrical safety
- c. Cost of accident
 - i. Accident causation
 - ii. Contractor insurance rating
- d. Role of construction personnel in safety & health
 - i. Back safety
 - ii. OSHA subparts P through Z, and related safety practices
- e. Ethics and safety
 - i. Ohio's construction safety ranking
 - ii. Drug-free safety program
 - iii. Worker's compensation
 - iv. Stress in the workplace
 - v. Promoting safety
- f. Construction safety and health: Program and Policies
 - i. Job safety and hazard analysis
 - ii. Accident investigation, reporting, and record keeping
 - iii. Emergency response plan
 - iv. Total safety management
 - v. Bloodborne pathogens

Resources

David L. Goetsch. *Construction Safety and Health*. 2nd ed. Boston: Pearson, 2013.

National Safety Compliance. *OSHA Construction Industry Regulations*. Springfield, MO, 2016.

J. J. Keller & Associates, Inc. *OSHA Construction Safety Handbook*. 6th. 2019.

Resources Other

OSHA approved videos: *Personal Protection Equipment, Fire Protection, Fall Protection, Electrical Safety, Back Safety, and Violence in the Workplace*.

- Ohio DOT Highway Safety Manual (2021) <https://www.transportation.ohio.gov/programs/highway+safety/highway-safety-manual-guidance/highway-safety-manual> (<https://www.transportation.ohio.gov/programs/highway+safety/highway-safety-manual-guidance/highway-safety-manual/>)
- National Association of Home Builders YouTube Channel (2022) <https://www.youtube.com/c/NAHBTV> (<https://www.youtube.com/c/NAHBTV/>)
- National Safety Compliance YouTube Channel (2022) <https://www.youtube.com/c/oshasafetytraining> (<https://www.youtube.com/c/oshasafetytraining/>)
- ODOT Online Resource Library (2022) <https://www.transportation.ohio.gov/about-us/resources> (<https://www.transportation.ohio.gov/about-us/resources/>)
- FEMA Resource Center (2021) <https://training.fema.gov/>

Instructional Services

CTAN Number:

Career Technical Assurance Guide CTCON002

Top of page

Key: 1180