

### **2023 Excavation Competent Person Course Outline**

#### **Lesson 1 Introduction .75 Hours**

- NTS Introduction
- Course Workbook Review
- OSHA Statistics and Purpose of Training
- Competent Person Defined
- Responsibilities of a Competent Person
- OSHA General Duty Clause
- Qualification vs. Certification Review
- Competent Person Training Requirements
- Competent Person Activity

#### **Lesson 2 Standards 1 Hour**

- Subpart P Overview
- 1926.650 Scope & Application, Definitions
- Excavation Basics
- 1926.651 Specific Excavation Requirements
- 1926.652 Requirements for Protective Systems
- The Appendices
  - Appendix A Soil Classification
  - Appendix B Sloping and Benching
  - Appendix C Timber Shoring for Trenches
  - Appendix D Aluminum
    Hydraulic Shoring for Trenches
  - Appendix E Alternatives to Timber Shoring
  - Appendix F Selection of Protective Systems (Flowchart)

#### **Lesson 3 Soils 1.5 Hours**

- Introduction to Soils
- OSHA Soils Video
- Soil Classification
- Definitions
- Soil Types
- Soil Dynamics
- Soil Testing
- States of Moisture
- Special Soil Types C-60 & C-80
- Soil Testing Video
- Soil Testing Visual and Manual
- Practical Application Activity
- Additional Hazards
- Visual excavation inspection video
- Summary and Review

## Lesson 4 Protective Systems 1.5 Hours

- Protective System Requirements
- Protection of Employees in Excavations
- Sloping and Benching System Options
- Sloping and Benching System Calculations Activity
- Shielding and Shoring Equipment Overview
- Shielding Application and Design
- Shoring Application and Design
- Timber Shoring Application and Calculation
- Engineered Systems
- Tabulated Data Overview
- Tabulated Data Activity and Deep Dive

# **Lesson 5 General Safety Requirements 1 Hour**

- Site and Environmental Conditions
- Surface Encumbrances
- Underground Installations
- Utility Locating
- Utility Protection
- Access and Egress
- Structural Ramps
- Additional Hazards
  - o Vehicle Traffic
  - o Falling and Suspended Loads
  - Hazardous Atmospheres
- Confined Spaces
- Protection Methods from Water Accumulation
- Adjacent Areas
- Stability Review
- Walkways
- Warning Systems
- Fall Protection
- Inspections
  - o Frequency
  - o Soil Type and Composition
  - o Condition of Open Trenches
  - Condition of Manufactured Protective Systems