## CHAIN FUNDAMENTALS: INDUSTRIAL

## eLearning courses designed to increase productivity and profits



# Learning made Simple, Visual, and Interactive

This course will help learners better understand the basic components, manufacturing processes, types of chains, and general terminology associated with industrial chains. These concepts are brought to life using realistic 2D and 3D models, helpful animations, and interactive quizzes. This course is beneficial for those who are experienced in the industrial chain industry as well as those who are new to this industry.

Credit Hours 2.5

### **Learning Objectives**

- Recall some of the primary components of industrial chains.
- Recognize the different chain applications.
- Understand the different types of industrial chains used in modern industries.
- Recall the material and manufacturing methods of industrial chain components.
- Determine how to minimize failures for an industrial chain.
- Develop an understanding of how environmental factors affect industrial chains.

#### Table of Contents

#### I. Basic Concepts

- What are Industrial Chains?
- Chain Terminology
- Chain Materials
- Manufacturing Methods
- Advantages and Disadvantages
- Chain Applications
- Roller vs. Rollerless Chains
- Sidebar Types

- Assembly Methods
- Sprocket
- Sprocket Terminology
- Sprocket Materials

#### **II. Chain and Sprocket Types**

- Chain Specifications
- Chain Types
- Sprocket Types

#### **III. Service Considerations and Failure Modes**

- Chain Related Concepts
- Environmental Factors
- Handling and Installation
- Chain Replacement
- Lubrication
- Lubrication Factors
- Failure Modes







