

# Fundamentals of Industrial Networking - Virtual (IEN-NETOILFUND)

#### **Global Reference**

Online-Training - Ethernet Fundamentals in Industrial Networks (IK-ETHBAS)

#### **Type**

Virtual Instructor-led Learning

## **Duration and Continuing Education Units (CEU)**

13 Hours (Schedule varies) 0 CEUs

### **Short Description**

This virtual course is an introductory course to networking technology and mechanisms – the foundation of today's digital communication. Designed as a recommended prerequisite for our suite of Certification courses, it will take you on a tour through the seven networking layers. At the end of the course, students will have a broad understanding of networking terminology, as well as a deeper knowledge of the principles of building Ethernet networks.

### **Objectives**

- Understanding the OSI Reference Model
- Learning the Physical Layer (Copper, Fiber, Wireless)
- Learning the Data Link Layer (MAC, VLAN)
- Learning the Network Layer (TCP/IP, Routing Protocols)
- IPv4 vs IPv6 Addressing
- Understanding Upper Layer Communications

#### Content

- Introduction to Industrial Ethernet
- Layer 1 Physical Layer
- Layer 2 Data Link Layer
- Layer 3 Network Layer
- Layer 4 through 7 Upper Layers

### Note

The class in online via MS Teams.

#### Language

**English** 

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