Process Instrumentation

Fundamentals of Flow Technologies

Call 770-625-5644 to Register

General Information

Course Code: PIA-PRFFTCA1
Length: 1 Day

Audience

This introductory course is intended for technicians, engineers and other individuals responsible for installation, commissioning and basic maintenance of flow instrumentation. Additionally, sales representatives responsible for selling and specifying these meters will benefit from this class.

Prerequisites

- Basic knowledge of flow fundamentals and process instrumentation.

Profile

This course covers basic theory of operation, hardware components, applications, installation considerations and basics of commissioning of flow instrumentation which includes Electromagnetic, Coriolis and Vortex flowmeters.

Objectives

Upon completion of this course, the student shall be able to:

- Explain the fundamentals for how each flow instrument works
- Distinguish the appropriate flow instrument for a specific application
- Identify a suitable installation location, which includes mounting and orientation
- Apply basic commissioning steps

Topics

1. Basics of flow and types of measurements
2. Electromagnetic flowmeters
   a. Basic theory of operation
   b. Construction and hardware
   c. Material and meter selection
   d. Transmitters and accuracy
   e. Basic installation and mounting
3. PCS 7 Documentation and Online Support
   a. Basic theory of operation
   b. Sensor design and transmitter features
   c. Basic installation and mounting
   d. Legacy Options
4. Vortex flowmeters
   a. Basic theory of operation
   b. Sensor design and system overview
   c. Basic installation and mounting
   d. Sizing tool
5. Industries and Applications