



**IFS ACADEMY**  
Training For The Future!!



**Bentley  
Institute**

Academic Service Partner

## **Advance Water Distribution Modeling using WaterCAD OR WaterGEMS**

**Course Curriculum (Duration: 50 Hrs.)**

### **Chapter 1: Introduction to WaterCAD / WaterGEMS**

- Basics of Hydraulics
- Overview of Water Distribution Design & Modeling
- WaterGEMS GUI
- Building a Network
- Assigning Values via Properties Dialog
- Using Flex Tables
- Extended Period Simulation
- Alternatives and Scenarios

### **Chapter 2: Modeling Basics**

- Water System Design & Water Distribution Modeling
- Building a Network with Fire Flow
- Building a Network with Fire Flows using MicroStation
- Building a Network with Pumps, Tanks, and PRVs
- Pump Selection
- What is Hydraulic Model?
- Using Water Distribution Models
- Internal Workings of WaterGEMS and WaterCAD
- Building a Water Model
- Reviewing Results
- Piping Data, Tanks and Pumps

### **Chapter 3: Criticality and Segmentation using WaterCAD or WaterGEMS**

### **Chapter 4: Case Study / Project: Fire Flow Analysis**

### **Chapter 5: Case Study / Project: Distribution System**

\*\*\*\*\*

IFS Academy, Pune

Phone: +91-20-6400 7296, Email: [training@ifsacademy.org](mailto:training@ifsacademy.org),

Visit Us At: [www.ifsacademy.org](http://www.ifsacademy.org)

[www.ifsacademy.org](http://www.ifsacademy.org)