



WE025: Water Distribution Network System: *Design, Operational & Maintenance*

Training Description:

For the water industry, this effectively means effluent and sludge, by-products of sewage treatment, should be viewed as resources to be reused in a beneficial and sustainable manner, rather than wastes requiring disposal. The reuse of these materials involves treating them to a level appropriate for their intended reuse application and using the resulting water (termed reclaimed water) or sludge (termed bio-solids) in a sustainable manner for a beneficial purpose. Beneficial reuse is defined as the sustainable use of reclaimed water or bio-solids in a manner which provides some direct or indirect economic, social or environmental value, while still protecting the environment, public and agricultural (being stock and plant) health.

The concept of beneficial reuse is different from that of wastewater disposal to land. The primary purpose of land disposal is to discharge waste to land in a controlled manner so as not to cause pollution. In contrast, the primary purpose of beneficial reuse is to use what was previously considered "wastewater or sludge" as a resource in a beneficial and safe manner.

Training Objectives:

By the end of the training, participants will be able to:

- ✓ Design and analyze of new water distribution systems
- ✓ Explain the principles and pressurized flow and water distribution systems hydraulics
- ✓ Select proper valves for water distribution systems
- ✓ Employ proper methods for operation, maintenance and rehabilitation of existing water distribution systems
- ✓ Discuss the importance of reliability analysis of water network systems and learn the methods of improving system reliability and availability
- ✓ Understanding the Fundamentals of Water Distribution Systems
- ✓ Analyze existing Systems and be able to find out existing problems
- ✓ Understanding Operation, Inspection, Maintenance & Repair of Water Networks

Training Designed for:

This course is intended for Municipal Engineers, Public Works Engineers, Water Distribution System Engineers, Safety Inspectors and Procurement Officers from Municipalities, and Technologists who need Understanding of Water Distribution System Design and are currently employed in the Water Distribution Management Field.

Training Program:

DAY ONE:

- ❖ Introduction
- ❖ Water Supply System
- ❖ Storage Facilities & Equipment

DAY TWO:

- ❖ Water Distribution System
- ❖ Revision of Hydraulics Engineering

DAY THREE:

- ❖ Pipelines Selection & Installation
- ❖ Distribution Storage

DAY FOUR:

- ❖ Standard Operation Procedures
- ❖ Water System Inspection, Testing & Repair

DAY FIVE:

- ❖ Troubleshooting Matrix & Failure Analysis
- ❖ Maintenance Programs for Water Networks
- ❖ Course Conclusion
- ❖ POST- ASSESSMENT and EVALUATION

Training Requirement:

"Hand's on practical sessions, equipment and software will be applied during the course if required and as per the client's request."

Contents can be adapted to your specific wishes. It is therefore possible to focus on specific modules of the training course as per client's learning needs and objectives. Further, it should be forwarded to us a month prior to the course dates.

Training Methodology:

This interactive training course includes the following training methodologies as a percentage of the total tuition hours:-

- 30% Lectures, Concepts, Role Play
- 70% Workshops & Work Presentations, Techniques, Based on Case Studies & Practical Exercises, Gamification, Software & General Discussions
- Pre and Post Test

Training Certificate(s):

Internationally recognized certificate(s) will be issued to each participant who completed the course.

Training Fees:

TBA as per the course location - This rate includes participant's manual, hand-outs, buffet lunch, coffee/tea on arrival, morning & afternoon of each day.

Note: The 5% VAT (Value Added Tax), will be effective starting 01st of January 2018 as per the new regulation from the UAE Government. The VAT applies for all quotation both for local and abroad.

Training Timings:

Daily Timings:

07:45 - 08:00	Morning Coffee / Tea
08:00 - 10:00	First Session
10:00 - 10:20	Recess (Coffee/Tea/Snacks)
10:20 - 12:20	Second Session
12:20 - 13:00	Recess (Prayer Break & Lunch)
13:00 - 14:00	Last Session

For training registrations or in-house enquiries, please contact:

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