

### BASICS OF WATER DISTRIBUTION

#### Information

<i>Target group:</i>	Water system operator (including First level response operator)
<i>Entry level:</i>	Vocational level
<i>Duration:</i>	2 days

#### Learning targets

Water is a relatively scarce but essential commodity. The consumer expects water that is delivered to his premises to be of a consistent quality and pressure for low or even no costs.

Threated water is pumped into a distribution network that has been designed to deliver the water to the consumer. The water must pass through the network with a minimum of loss and quality deterioration. Water system operators play a key role in this. The *First Level Response Operator* is the frontrunner in case of damage or problems in the network, for example leakages and customer complaints. Other Water system operators are in charge of repair or other activities.

In this basic course, you are introduced to the basics of water supply and distribution. You learn about the importance of a well-designed and operated water supply network for water delivery, with a minimum of water loss, at the required flow rate/pressure and quality to the consumer. The water cycle, the water supply chain and the relevant regulations and legislations are discussed. Also the basics of map reading, the use of GIS and units calculation will be trained.

#### Content

The course covers following topics:

- Water production steps and distribution
- Relevant distribution parameters
- Pressure and flow (rudimentary hydraulics)
- Basic principles of Non-Revenue water reduction
- Legislations / permits / Blue Drop requirements
- Map & GIS reading

#### Outcome

After successfully completing the course you understand how your actions affect the performance of the water company and how you should act as civil servant. You can react speedily in case of leakage.

#### Course material

Course book and hand-outs of the presentations

### *Training approach*

In addition to classroom presentations this course comprises interactive and innovative training methods, such as group work, discussions, practical exercises, demonstrations and role-plays.

The training methods are tailored to the objectives of the training.

### *Extra*

The course is one of five modules of the overall course *Water Distribution and Control* for Water System Operators. After successfully completing the five modules a diploma is awarded.