

## **Water Distribution Disinfection – Part 2**

### **Learning Objectives**

#### *Scope*

Disinfection Part Two is broken into four lessons.

In the first lesson, students are introduced to the regulatory programs related to disinfection including the Total Coliform Rule (TCR), the Groundwater Rule (GWR), and the Disinfectant Byproducts Rule (DBPR).

In the second lesson, students learn about the factors that influence disinfection processes including pH, temperature turbidity, organic matter, inorganic matter, and contact time.

The third lesson covers disinfection chemistry with an emphasis on chlorine disinfection and chloramines. In this section, students learn about the relationship between dosage, demand, and chlorine, the difference between free and total chlorine, and the concept of breakpoint chlorination. In the last lesson, students learn about disinfection mechanics for chlorine gas, calcium, and sodium hypochlorite.

The final lesson ends with a segment on chemical feed systems and distribution system disinfection practices.

### **Training Methods**

*Our training methods that will be applied, are interactive learning through the videos displayed on our website, WaterLMS. Attendees will have to take quizzes and tests, as well as being interactive throughout the whole duration of the course. They can not skip forward, and is required to be active for the duration of the course, being able to get the full experience out of our courses and prepare them for the real duties they will encounter.*

*Courses can be taken in a learning plan, all together or be taken individually.*

### **Course Content**

- Water Disinfection - Part 2
- Water Disinfection Part 2 - Final Exam
- General Course Survey

### **Course Outline**

1. *Water Distribution Disinfection – Part 2* 2 hrs

*Self- Paced* Total 2 hrs

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### **Student Assessment**

*Upon class completion, students will be tested using an open question & answer session, to ensure there is a general understanding of the materials presented during the course.*

### **Instructor Bio:**

*Is strictly online, so no instructor is needed.*

***Please reach out if you have any questions, or is wanting to take the course yourself, to provide a better understanding of the ones we provide.***