

**Course Overview:**

This advanced training courses intended for all experienced operators and technicians involved in operation and maintenance, and those are responsible for special mechanical, electrical management for maintenance, operation in different advanced aspects of mechanical maintenance or electrical procedures, and persons who are interested to work plant area

**Course Objective:**

- learning advanced information of technical processes and equipment in order to apply best and suitable techniques and to be familiar with advanced principles of mechanical and electrical.
- Have advanced knowledge on the evolution of Electrical & Mechanical operation Work Standards and its recent advancements

**Course Outline:**

Day-1. Principles of Operation of heaters & furnaces.. Control of heaters and furnaces. Start-up & Shut down Operating Procedures. Fuel Types & Supply. Ignition systems. Maintenance & Inspection of heaters and furnaces

Day-2. Theory of chemical reactions. Reaction types. Reactors types. Catalytic Chemical reactors. Types of catalysts (Effects on reaction). Exothermic & endothermic chemical reactions

Day-3. Extruder operation and Troubleshooting.

Day-4. System Operation· Operating Problems. Optimization· Column Shutdown & Maintenance

Day-5. Cooling Tower & Chiller Operation & Troubleshooting.

**Who Should Attend:**

- all experienced operators and technicians involved in operation and maintenance
- for those are responsible for special mechanical, electrical management for maintenance, operation in different advanced aspects of mechanical maintenance or electrical procedures
- all operators who are work plant area

**Training Language:**

EN / AR

**Training Methodology:**

- Presentation & Slides
- Audio Visual Aids
- Interactive Discussion
- Participatory Exercise
- Action Learning
- Class Activities
- Case Studies
- Workshops
- Simulation