



CI No.: U80900RJ2019PTC063908.

# AUTOMATION | simplified

## Certificate of Completion

### 30 Days Industrial Training Program: Basic Automation Training (B.A.T.)

During the **MERC's Industrial Automation Training**, administered by the undersigned trainer, the student was able to proficiently:

- Developed the understanding of **PLC (Programmable Logic Controller) & SCADA (Supervisory Control & Data Acquisition)** system and become familiar with their brief history & system parts.
- Analyze the system parts & power supplies of a PLC hardware including the block diagram of a typical PLC, PLC processor module & memory organization
- Discover the underlying principles of a PLC software such as the programming devices, number systems, memory components, data structures, operating modes and limitations
- Understand the PLC systems design, Ladder programming languages, installation and maintenance and be able to review troubleshooting techniques used in the system.
- Know the concepts & common elements of Human machine Interface communication with Programmable logic controller (PLC).
- Heighten awareness on the principles of data communications & Object Linking and Embedding in Process Control (OPC) and be able to recognize their importance in HMI & SCADA also.
- Learn the concept of viewing and editing parameters, Braking, Bypassing, and Line Consideration, User / Operator Interface of adjustable frequency Drive.
- Understand the basic control wiring of frequency drives with PLC.
- Learn the basic concept of control panel designing of programmable logic control.

**Sachin Yadav**

Student's Name

**Techno India NJR Institute of Technology, Udaipur**

College Name

**21<sup>st</sup> Jan, 2020 to 19<sup>th</sup> Feb , 2020**

Training Date

**Techno India NJR Institute of Technology, Udaipur**

Location

**MIT-TR-19-AJM-206**

Reference ID

Director