POKHARA INDUSTRIAL AUTOMATION
Pokhara-7 Masabar

General Industrial Automation Using PLC

Course of Study

Duration: 30 Hrs,

Training Material:

Lecture Note, Presentation Slides, and Drawing, Videos, PLC hardware and software

Learning Outcomes:

After this training, trainee will have the basic knowledge of industrial sensors actuator and PLC automation system .This course is designed to equip the novice with no prior PLC programming experience with the basic tools necessary to create a Basic PLC program using ladder logic common platforms.

Target Audience:

This course is written for anybody who wants to become functional with ladder logic as quickly as possible.

Requirement for the participants:

There is no software, hardware or experience required in order to complete this course, but practicing the techniques discussed on an emulator or live PLC are necessary steps toward eventual mastery.

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Course Detail:

1. **Basic Industrial Control**   **1hrs**

    Basic Concept of PLC, Input devices, Output devices, HMI / SCADA,

2. **Input Device (Sensors)**   **1hr**
    Basic concept of the input device used in industrial Automation and their types
3. **Output Device (actuators)**   **1 hr**
    Basic concept of the output device used in industrial Automation and their types
4. **Basic Relay logic**   **1hrs**
    Introduction to basic relay logic with examples
5. **PLC System**   **1hrs**
    Understanding the PLC, INPUT MODULE,CPU,OUTPUT MODULE, Types of PLC, COMMUNICATION AND INTERFACING OF PLC
6. **PLC Programming**   **16 hrs**
    Digital: Fundamental Commands, Timer, Counter, Data register, Arithmetic Command, Move Call, Jump, interrupts, MC/MCR, PWM, Sequencer and special commands.
    Analog: handling analog value using analog module, setting gain and offset.
7. **HMI**   **3hrs**
    Basic Concept of HMI, communication with PC and PLC, Basic Programming to control and monitor PLC
8. **PLC Project**   **6 hrs**
    Sample application Projects

PLC Project is also available in Real Games Factory I/O (Real time Factory simulator)*
http://www.realgames.pt/factory-io/

Thank You!

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