

## INTRODUCTION

Programmable Logic controller (PLC) is an Electronic hardware/device used for automating electro-mechanical / mechatronics equipment in every manufacturing industries. PLC is a specialized computer used to control machines and process. It has feature to store instructions and specific functions that include On/Off control, timing, counting, sequencing, arithmetic and data handling. PLC is called 'The Work Horse' and or brain of any system, represents a key driver in automation. Today, PLC has become a very widely used and accepted tool across the product segment for automation in various Machines, Processes, Shop floor, and Utilities etc. To get the best results out of this technology, it’s high time to understand the Power of PLC clearly by key level decision makers and technology interface experts from various functions like Design / Production / QC / Process Planning / Maintenance etc. Keeping this in view, Indian Machine Tool Manufacturers' Association (IMTMA) is organising an online training on PLC - A Key Technology for Industrial Automation.

## FOCUS AREAS

- PLC -Basic Concepts
- Common Hardware Types - Digital and Analog elements
- Communication
- Types of PLCs and HMI
- Evaluation of "Power" of PLC
- Overview of Programming Techniques
- Overview of Sensors and Peripherals
- Major Features / Usage of PLC
- Application Areas with Examples
- Limitations of PLC Control

## KEY TAKE AWAYS

- Basics of PLC technology and understand the concept of “Programmable” Software Control
- Knowledge of latest features available with PLC technology
- Knowledge on types of PLCs and HMI
- Knowledge about various application possibilities of PLCs
- Importance & types of Sensors and Peripherals
- Knowledge on PLC Features / Usage

## FEE PER PARTICIPANT (PER LOGIN)

**Rs. 5500/-**  
+18% GST

**IMTMA Members/ Micro Companies/ Individuals/  
Educational Institutions / Students/ IMTMA Non  
Members/ Others**

**USD 220/-**  
**Overseas Participants**

**Group Concession : 10% for 3 to 5 and 30% for 6 and more delegates being nominated from the same company**

## FACULTY

Mr. B MURALIDHAR, Industry Expert

AMIE from Institute of Engineers and Industrial experience for 38 years in Design and Development of electrical/electronic controls for various machine tools at HMT Machine Tools ltd Bangalore

Started his carrier with the Design of Contactor logic for Cylindrical Grinding machines, Surface grinders, Gear shapers, SPMs, etc. With the evolvement of PLCs, Changed contactor logic to PLCs and have used almost all Siemens PLCs available as on date on various machine tools including SSMs & SPMs. In 1985, CNC cylindrical Grinding machine was developed using the Primo S system. Subsequently, many CNC machines like CYL. Grinders, Surface grinders, Gear Hobbers, Gear Shappers, SPMs, etc., were developed using CNC systems like Sinumerik, Hinumerik ( after HMT got collaboration from Siemens), Siemens 802D, Siemens 810D, Siemens 840D, Fanuc0 (MD & TD) systems, 828D, 840Dsl and Fanuc0i. Apart from above, Assembly co-ordination, Prove out and commissioning at customer's end were our responsibilities.

Also, he contributed to various developmental activities such as low-frequency converter for spindle orientation (PWM Technique) during the initial time, Pulse Generator for WEDM using IGBT and during 2019-20, developed, Servo Manipulator with Force and Weight feedback.

### For Registration Contact

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