



PROGRAMMABLE LOGIC CONTROL LAB

- 1. Demonstrate PLC architecture**
- 2. Working with various tools available in PLC software**
- 3. Preparation of ladder diagram, uploading of code to PLC and running the code on PLC**
- 4. Execute ladder diagram for different Logical Gates**
- 5. Execute ladder diagram using timers & counters**
- 6. Execute ladder diagram for interfacing of lamp and button for ON / OFF operation**
- 7. Execute ladder diagram for Stair Case Lighting**
- 8. Execute ladder diagram for Temperature Controller**
- 9. Execute ladder diagram for DOL starter**
- 10. Execute ladder diagram for Star-Delta starter**

11.Execute ladder diagram for PMDC Motor Speed Controller

12.Execute ladder diagram for Traffic Light Controller

ELECTRICAL CAD LAB

1. Exercise on various tool bars, menus and standard commands

2. Practice on 2D drawing commands and modify tools

3. Practice on dimensioning commands and formatting commands

4 Practice on Insert commands and view commands

5. Exercise on drawing isometric drawings in 2D and introduction to 3D

6 Exercise on drawing Electrical symbols

7 Drawing related to electrical wiring (house wiring , multi storied buiding , commercial complex,godown wiring)

8 Exercise on drawing electrical poles and towers

9 Exercise on drawing earthing systems with dimensions

10 Exercise on drawing of the core section of transformer

11 Exercise on pole mounted and plinth mounted substations

12 Drawing the end view of induction motor