Experiment: Introduction to PLC and ladder programing

Software: Macro PLC

Apparatus:

• Macro PLC software

Procedure:

* Run the Macro PLC Software.
* Open the file menu.
* Open new project in sub menu.
* Select project name.
* Click OK
* Click symbols to design the required ladder logic.
* Select PLC in main menu.
* Select On-line option.
* Select Run PLC.
* Operate the switches and observe the output.
* Record the result in table.
* Record result in conclusion.

TASK:

1. Design of combinational logic using Macro PLC implementation of AND Gate.
2. Design of combinational logic using Macro PLC implementation of OR Gate.
3. Design of combinational logic using Macro PLC implementation of NOR Gate.

After performing this experiment on Macro PLC software students will be able to understand the basic concept of PLC. They understood that how to make a ladder logic to perform the tasks.

**Introduction to PLC and ladder logic Programing**

**Objectives:**

**Apparatus:**

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**Attach the screen shots for the above steps:**

**Logic implementation on PLC:**

**Table:**

|  |  |  |
| --- | --- | --- |
| **Status of X\_\_** | **Status of X\_\_\_** | **Status of Y\_\_\_** |
|  |  |  |
|  |  |  |
|  |  |  |
|  |  |  |

**Conclusion:**

Logical operation between X\_\_ and X\_\_\_ is …………………………… operation.

***Date:*** *\_\_\_\ \_\_\_\ 20\_\_\_\_*

***Obtained marks: \_\_\_\_\_ /*** *10*