



PREMIER UNIVERSITY CHITTAGONG

DEPARTMENT OF COMPUTER SCIENCE & ENGINEERING

Course Code : **EEE 314**

Course Title : **Control System Laboratory**

Report No : **01**

Name of the Report : **Real-time simulation**

Date of Performance : **14/09/2019**

Date of Submission : **21/09/2019**

REMARKS

SUBMITTED BY
Student ID : 1402710200740
Department : CSE
Year : 2019
Semester : 7th
Group : C7A1

Ojective : Real time-simulation .

Instrument : ✧ PLC Software .

✧ CPU 1212C DC/DC/DC .

✧ Siemens S7-1200 PLC CPU .

✧ Circuit Board .

Ladder Diagram :

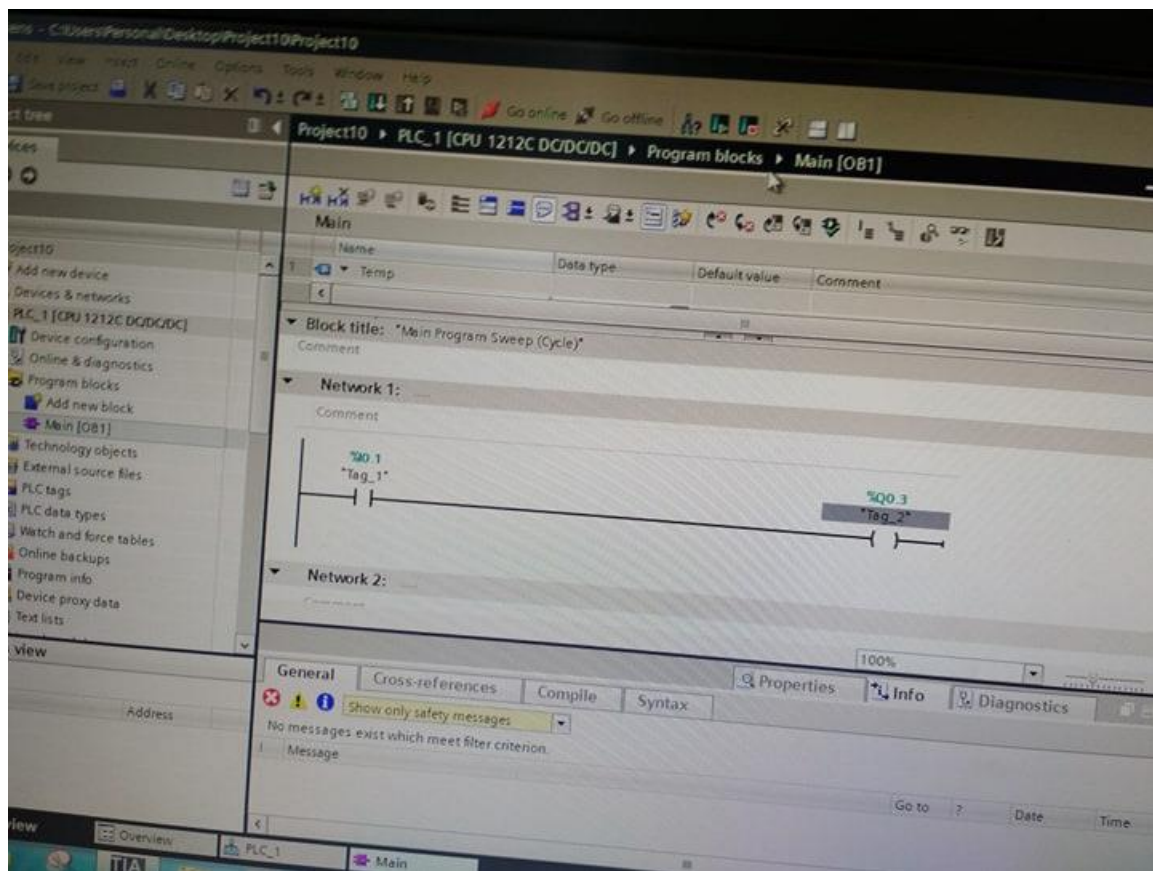


Fig : Ladder Diagram .

In this figure $i = 0.1$ and $q = 0.3$.

Discussion : I created a project place in **PLC** software to do the process, which is required. Then I selected the needed elements in the work field from which is included in this software. I selected the **Siemens S7-1200 PLC CPU** and **CPU 1212C DC/DC/DC** in this workplace, then I created the Ladder Diagram to give inputs and get outputs.

Ladder diagram, better known as **ladder logic**, is a programming language used to program **PLCs** (programmable logic controllers). ... Outputs don't have to be physical, though, and can represent a single bit in the **PLC's** memory. This bit can then be used later on in the code as another input.