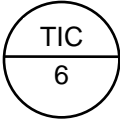


FG15 - Pre-Instructional Survey

Name: _____ Date: _____

1. The document most often referred to by all disciplines to define a process control system is:

2. On a project document, the following symbol appears.  What does it mean?

3. An instrument loop consists of the following parts: _____

4. Most final control elements in continuous process plants are: _____

5. A logic diagram may be used to describe: _____

6. A loop diagram can be used by maintenance personnel for: _____

7. A PID controller is: _____

8. The most common signal for an electronic process transmitter is:

9. Methods of reducing the possibility of danger from flammable materials are contained in:

10. Give an example of an automatic control system not in a process plant: _____

11. Safety shut-down software can be developed using:

- a) Interlock logic description only
- b) Sequence logic description only
- c) Instrument Index

12. The instrument index (list) is derived from:

- a) Software Functional description
- b) P&ID
- c) All of the above

FG15 - Pre-Instructional Survey Answer Sheet

1. P&ID or Flow Diagram or Engineering Flow Diagram.
2. An indicating temperature controller located on panel #IP-1.
3. A process sensor (an element, a transmitter, or a switch); transmitted signal(s) usually pneumatic, electronic or electric; a controller or receiver (an alarm, indicator, recorder, controller); and final control element.
4. Pneumatic control valves
5. The on-off elements of a continuous process.
6. Troubleshooting, repair, revision.
7. A controller which uses the three modes of control to develop a corrective signal. P=proportional - gain. I=integral - reset. D=derivative-rate.
8. 4-20 mA DC
9. The US National Electric Code (NEC) and Canadian Electrical Code (CEC).
10. Automobile Speed Control
Home Heating System
Home Hot Water System
11. a) Interlock logic description only
12. b) P&ID