ASSIGNMENT 4Th Semester Electronics Engineering ELECTRONICS MEASUREMENT AND INSTRUMENTS

SECTION -A

Q 1. Fill in the blanks.

- 1. Electrostatic focusing system consists of ------.
- 2. Time base generator is used to produce------.
- **3**. Function generator, generates ------types of waves.
- 4. Dual trace CRO has -----time base circuit.
- 5. Cathode ray tube converts-----signal into -----one.
- 6. An ammeter is always connected in -----with a circuit under test.
- 7. AC millivoltmeter is 1)----- 2)------ 2)------
- 8. The accuracy of analog meter is -----than digital meter.
- 9. When a high resistance is connected in series with a galvanometer, it becomes------.

10. Function generator, generates ------types of waves.

SECTION -B

NOTE: Do any five questions

- 1) Draw the block diagram of Digital Storage Oscilloscope (DSO) and explain its working principle ?
- 2) Explain the working principle of a Q- meter with suitable diagram ?
- 3) Draw the block diagram of CRO and explain each block ?
- 4) Explain construction and working of permanent magnet moving coil (PMMC) instrument .
- **5)** What do you understand by loading effect of a multimeter ? Describe the applications of multimeter with suitable diagram ?
- 6) What is Lissajous patterns ? Explain its importance with examples .
- 7) Draw the block diagram of pulse generator and explain its working .

SECTION -C

NOTE: Do any five questions

- **1)** Explain briefly the working principle of universal counter.
- 2) Write short notes on any two .
- a) Accuracy and precision b)Working of CRT
- c) Wheat stone bridge d) Digital Multimeter
- 3) Explain the working principle of logic probe, logic pulser and logic analyzer with suitable diagram ?
- 4) Write the specification of Multimeter ?
- 5) What is spectrum analyzer ? Explain with the help of neat diagram the working of spectrum Analyzer .
- 6) Draw and explain the block diagram of function
- 7) Explain the working principle of schering bridge and Anderson bridge .