

R07

Code: R7410402

B.Tech IV Year I Semester (R07) Supplementary Examinations December 2015

ELECTRONIC MEASUREMENTS & INSTRUMENTATION

(Electronics and Communication Engineering)

(For 2008 regular admitted batch only)

Time: 3 hours

Max. Marks: 80

Answer any FIVE questions
All questions carry equal marks

- 1 (a) List the static characteristics of instruments.
(b) Draw a neat figure of Ohmmeter series type and explain.
- 2 (a) Draw a neat figure and explain the working of a function generator.
(b) Briefly explain the special features of AF sine wave generator.
- 3 Draw a neat figure and explain the functioning of a Harmonic distribution analyzer.
- 4 (a) Explain the travelling of an electron in a simple CRO.
(b) Discuss the special features of triggered sweep CRO.
- 5 (a) Explain how time measurement is done using a frequency counter.
(b) Explain the features of active and passive CRO probes.
- 6 (a) Explain how do you measure capacitance using an appropriate bridge.
(b) Derive an expression for Q-meter when unknown impedance is connected in parallel.
- 7 (a) Explain the principle of Piezo electric transducer.
(b) With a neat figure explain the working of a thermocouple.
- 8 Explain the following:
 - (a) Thermistor.
 - (b) Moisture measurement.
