Code No: 09A10491

JAWAHARLAL NEHRU TECHNOLOGICAL UNIVERSITY, HYDERABAD B. Tech I Year Examinations, June - 2014 ENGINEERING DRAWING

(Electronics and Communication Engineering)

Time: 3 hours

Max. Marks: 75

Answer any five questions All questions carry equal marks

- 1. The area of a field is 50000 sq.m. The length and the breadth of the field on the map are 10 cm and 8 cm respectively. Construct a diagonal scale which can read upto one kilometer. Mark the length of 235 meter on the scale. What is the R.F of the scale?
- 2. The front view of a line AB 80 mm long measures 55 mm while its top view measures 70 mm. End A is in both HP and VP. Draw the projections of the line and find its inclinations with the reference planes. Also locate the traces.
- 3. Draw the projections of a cylinder of 40mm diameter and axis 60mm long resting on H.P on a point on its base circle with its axis inclined at 30° to H.P and top view of axis making 45° with V.P.
- 4. A square ABCD with a 45 mm side is suspended from a point O, which is on side AB, 15 mm from A. The plane is parallel to and 20 mm in front of the V.P. Draw its projections and locate the traces.
- 5. A horizontal cylinder of 50 mm diameter penetrates a vertical cylinder of 75 mm diameter resting on HP. The two axes are coplanar. The axis of the horizontal cylinder is 50 mm above the HP. Draw the projection showing the curves of intersection.
- 6. A triangular prism having a base with a 55 mm side and a 75 mm long axis is lying on the H.P. with a side of the base perpendicular to the V.P. It is cut by an A.I.P. such that true shape of the section is an isosceles triangle having base with a 45 mm side and 60 mm altitude. Draw its front view, sectional top view and true shape of the section.
- 7. A cube of 50 mm edge lies with a face on the ground and an edge on the picture plane. All the vertical faces are equally inclined to PP. The SP is 80 mm from PP and 60 mm from GP. The edge of the cube in contact with the picture plane is situated 10 mm to the right of the station point. Draw the perspective view of the cube.

8. Draw the front, top and right hand side views of the isometric view given below in figure. All dimensions are in mm.

