

Time: 3 Hrs

Max Marks:60

Note :

- Solve any **FOUR** questions.
- All dimensions are in **mm**.
- Use First Angle Method Of Projection.
- Assume Suitable Dimension If Necessary.

Q.1 Following figure shows the pictorial view of an object. Draw

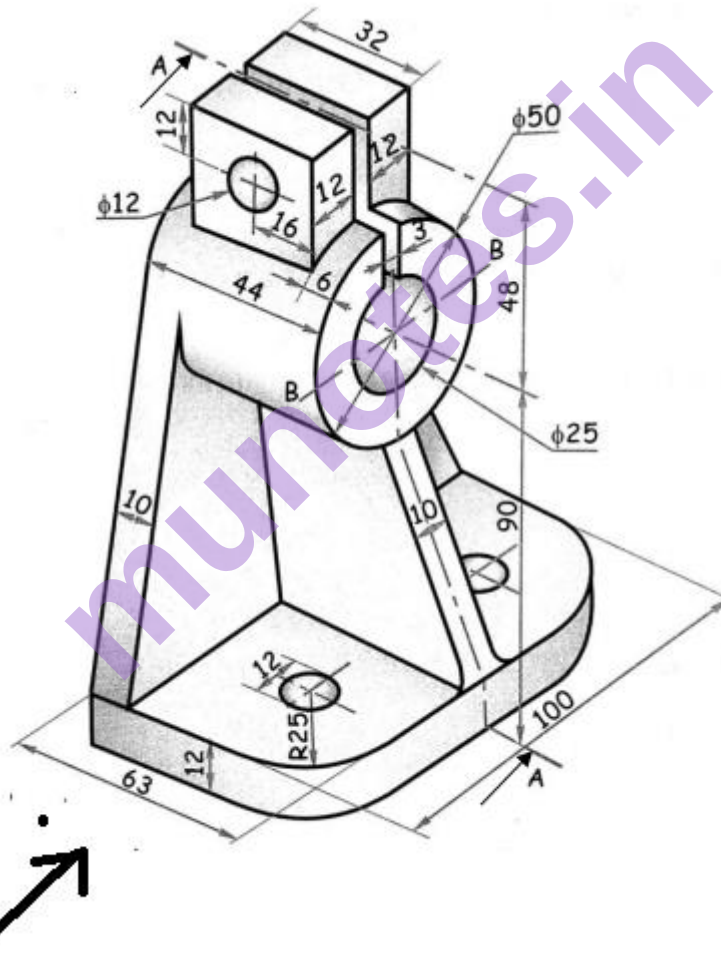
- Sectional front view along section A-A
- Top view.
- Right hand Side view
- Insert at least 10 dimensions

[5]

[4]

[4]

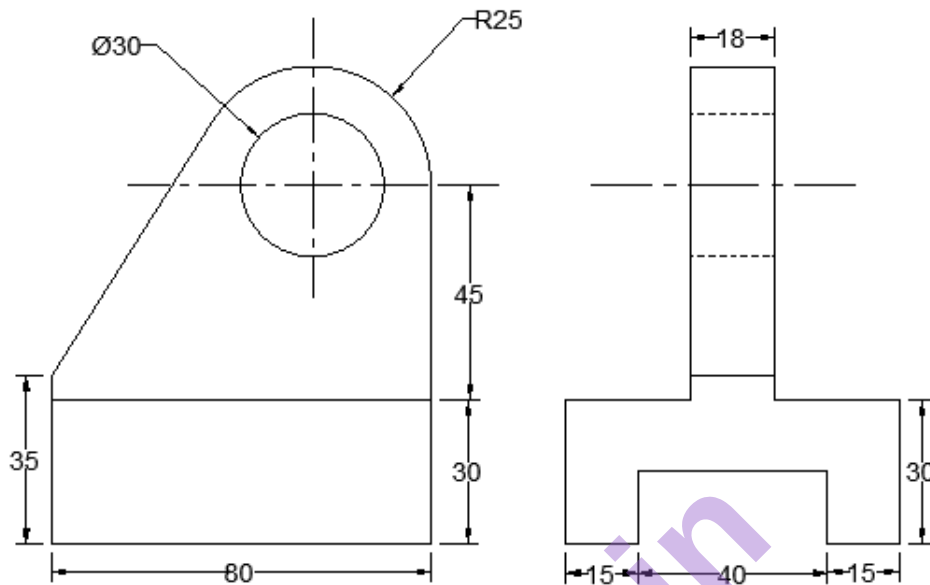
[2]



Q.2 (a) A square Prism side of base 40 mm and axis length 70 mm is kept on the HP on a side of its base such that its axis makes an angle of 45 degrees with the HP. Draw the projections of the prism.

[6]

- (b) Draw an isometric view of an object, two views of which are shown in figure: [9]



- Q.3 (a) The pictorial view of a machine part is shown in following figure.

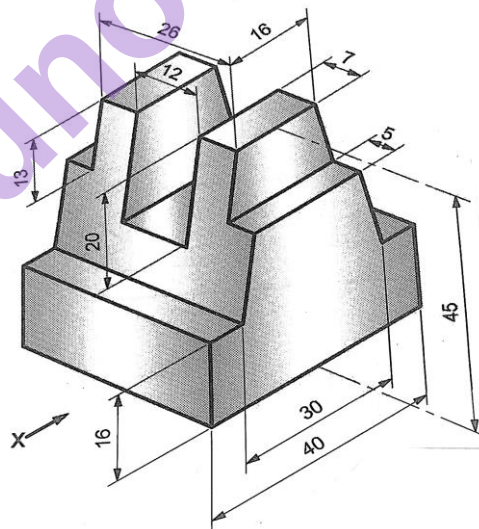
Draw

- Front view
- Top view
- Insert at least 6 Dimensions.

[4]

[4]

[1]



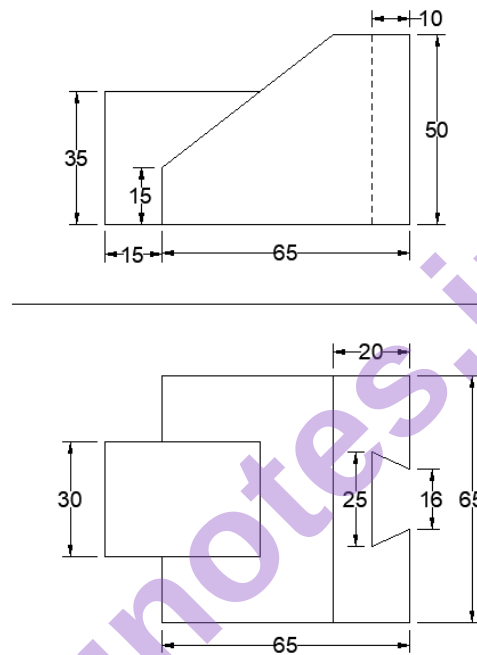
- (b) A circle of 20 mm radius rolls along a straight line without slipping. Draw a curve traced by a point on the circumference for one complete revolution of the circle. Name the curve. [6]

- Q.4 A hexagonal pyramid, side of base 40 mm and axis length 80 mm is resting on HP on an edge of its base such that its apex 60 mm above the HP. Draw its projections when axis of the top view making 45 degrees to VP. [15]

Q.5

The top view and front view of a line AB measures 70mm and 60 mm [15]
respectively. The line AB is inclined at an angle of 35 degrees to HP. The
end A is 15mm above HP and 12mm in front of VP. The other end B is also
in the first quadrant. Draw the projections of the line AB. Find its true length
and true inclination.

Q.6 (a) Figure shows two views of an object. Draw its Isometric view with 'O' as [8]
origin.



(b) A cone base 60 mm diameter and 75 mm axis length rests on its circular rim [7]
on the HP with the axis making an angle of 30 degrees to HP. Draw the
projections of the cone.
