23017

C23-A-M-MNG-MET-MRAC–107

23017

BOARD DIPLOMA EXAMINATION, (C-23)

MARCH/APRIL—2025

FIRST YEAR (COMMON) EXAMINATION

ENGINEERING DRAWING

Time : 3 Hours] [*Total Marks* : 60

PART—A 5×4=20

Instructions : (1) Answer **all** questions.

(2) Each question carries **five** marks.

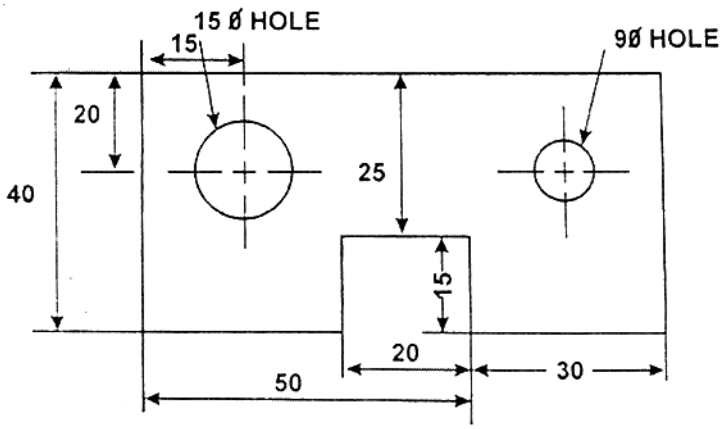
(3) All the dimensions are in mm.

(4) Use first angle of projection method.

1. Print the following in capital upright with 12 mm height specified in SP : 46-1988 :

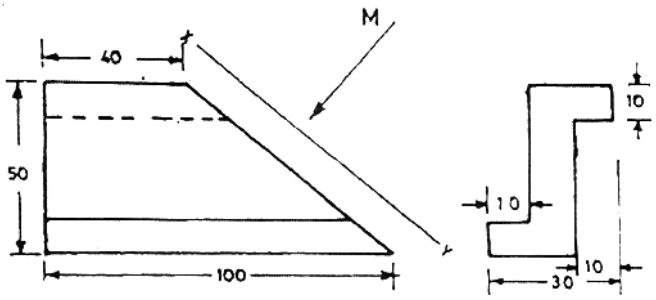
"ENGINEERING DRAWING"

2. Draw the following figure to suitable scale and dimension it as per SP : 46-1988 :



3. Construct a pentagon for the given side 30 mm.

4. Following figure shows the front and side views. Draw the auxiliary view on plane looking from direction-M :



PART—B

10×4=40

Instructions : (1) Answer *any* **four** questions.

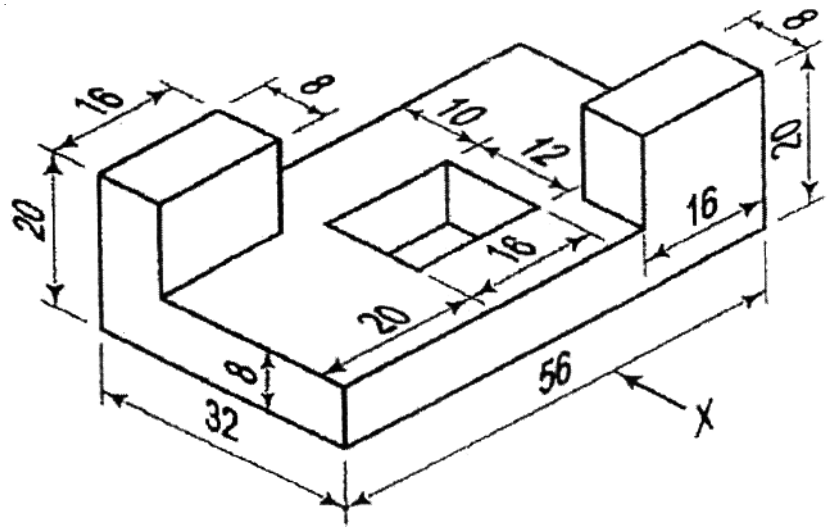
(2) Each question carries **ten** marks.

(3) All the dimensions are in mm.

(4) Use first angle of projection method.

5. Construct an ellipse by concentric circles method when major axis is 120 mm and minor axis is 70 mm.

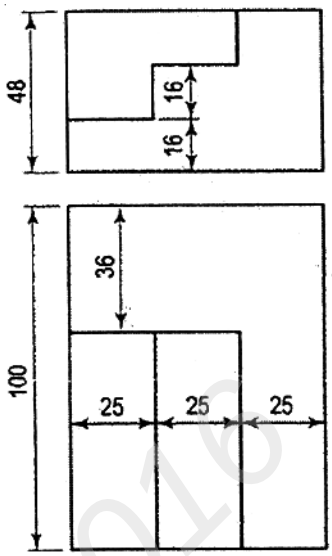
6. Draw the front view and top view of the component shown in the figure.



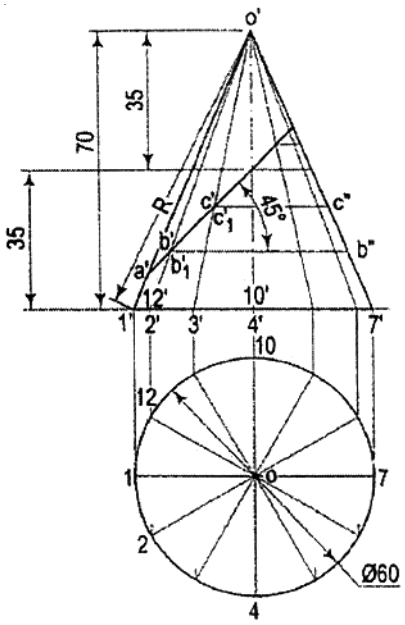
7. A hexagonal pyramid of side 30 mm and height 60 mm is resting with its base on horizontal plane. One of its base edges is inclined at 60° to vertical plane. Draw its projections.

8. A cube of side 35 mm rests on ground with one of its vertical faces inclined at 30° to the vertical plane. A vertical section plane parallel to vertical plane and perpendicular to horizontal plane and at a distance of 35 mm from vertical plane cuts the solid. Draw the sectional front view and top view.

9. Draw the isometric view of the block whose orthographic projections are given below :



10. Draw the development of truncated cone of following figure :



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