## 4005

## BOARD DIPLOMA EXAMINATION, (C-14) <br> MARCH/APRIL-2018 <br> FIRST YEAR (COMMON) EXAMINATION

ENGINEERING DRAWING

Time : 3 hours]
[ Total Marks : 60

## PART—A

$5 \times 4=20$
Instructions: (1) Answer all questions.
(2) Each question carries five marks.
(3) Take suitable scale wherever required.
(4) All dimensions are in mm .

1. Print the following using single-stroke capital up right letters of 10 mm size.

## "GOVERNMENT OF ANDHRA PRADESH"

2. Redraw the following figure and dimension it as per SP : 46-1988.

3. Construct a Parabda of the base 80 mm and the axis 100 mm by rectangle method.
4. Obtain the true shape of the section for the object shown below by an auxiliary view along the arrow direction.


PART—B
$10 \times 4=40$
Instructions: (1) Answer any four questions.
(2) Each question carries ten marks.
(3) Answers should be comprehensive and the criteria for evaluation is the content but not the length of the answer.
5. Draw a helix of one Convolution upon a cylinder of diameter of the base 75 mm , axis 100 mm long and pitch 75 mm .
6. A hexagonal pyramid, with side of base 25 mm and axis 60 mm long, has one of its triangular faces perpendicular to HP. Draw the projections of the pyramid, when the base side of this triangular face is in HP.
7. Draw the front view, top view and side view of the block given below viewing it in the directions of $\mathrm{X}, \mathrm{Y}, \mathrm{Z}$ respectively.

8. A cube of 40 mm long edges is resting on the H P on one of its faces with a Vertical face inclined at $30^{\circ}$ to the VP. It is cut by a section plane parallel to the VP and 10 mm away from the axis and further away from the VP. Draw its sectional front view and the top view.
9. The front view and top view of an object are shown below. Draw its isometric view.

10. A right circular cone of diameter 50 mm and axis 75 mm long is resting one of its bases of HP. It is cut by a section plane which is perpendicular to VP, inclined at $60^{\circ}$ to HP and passing through a point on the axis at a height of 40 mm from the base. Draw the surface development of the bottom portion of the truncated cone.

