

TIMOTHY JACOB MARVELOUS-M

18/ENG02/094

COMPUTER ENGINEERING

ENGINEERING DRAWING

1) A

2) B

3) C

4) B

5) ~~A~~

6) B

7) C

8) B

9) A

10) A

11) C

12) A

13) C

14) C

15) D

## R Objectives

1.] A = Reference Plane

2.] B = False

3.] C = Directly

4.] B =  $120^\circ$

5.] A =  $60^\circ$

6.] B = Rivet

7.] C = Crowning

8.] B =  $45^\circ$

9.] A = a circle

10.] A = an ellipse

11.] ~~A = Cone~~ C = Cylinder

12.] A = Cone

13.] A = journal bearing

14.] C =  $55^\circ$

15.] D = Horizontal plane

## ASSIGNMENT

1] A section of an object is produced by cutting an object by an imaginary plane, removing one or more parts and thus revealing a view of the effects of the dissection. They are represented by a cut on the drawing.

2] All dimension, extension, and leader lines should be thin, sharp, dark lines.

b] Dimensions shown with dimension lines and arrowheads <sup>should</sup> be placed to be read from the bottom of the drawing.

c] Extension lines indicate the points between which the dimension figures apply.

d] Each dimension should be terminated by arrowheads touching the extension lines and pointing in opposite directions.

e] All dimensions should be given in decimal format.

f] When all dimensions on a drawing are given in inches, the inch

marks are omitted; the same applies to millimetres.

3] A dimension line should never coincide with an object line or a center line, nor should it be an extension of these lines.

3a] Half section:-

This is a view of an object showing one-half of the view in sections. ~~The~~ <sup>Thin</sup> diagonal lines on the section drawing are used to indicate the area that has been theoretically cut. These

lines are called section line or cross-hatching. The lines are thin and are usually drawn at a  $45^\circ$  angle to the major outline of the object.

b] Full-section:-

A full-section is a view of an object when a cutting plane line passes entirely through an object.

~~Header lines are terminated by an arrowhead touching the feature of it dimensions~~

5] Scale = 5:1

This means that the drawing should be five ~~more~~ <sup>times</sup> more than its original size. The measurement of the line is multiplied by five.

6] Scale = 1:10

A drawing at a scale of 1:10 means that the object is 10 times smaller than in real life scale

1:1

Header lines are terminated a) with a dot, if they end within the outlines of an object.

b) with an arrow head, if they end on the outline of an object

c) without dot or arrow head, if they end on a dimension line

6] diameter:  $\varnothing$

→ Radius: R

→ Square:  $\square$

→ Spherical radius: SR

→ Centre line: - - - - -

→ Cutting plane line: ————

→ long break: ————

7] An orthographic projection is a means of representing three dimensional objects with two dimensional drawings.

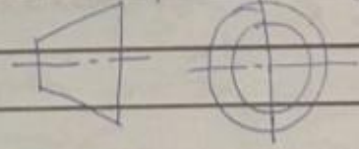
The elements are the front view, side view and plan view.

8] It is called an orthographic projection when the figure is drawn in first or third angle elevation.

9] First angle projection:

This is a way of showing a 3D object on a 2D piece of paper and it shows what a part looks like from each direction.

Symbol for first angle projection



b] Third angle projection: is the opposite of first angle projection

This is a method of orthographic projection which is a technique in portraying a 3D design using a series of 2D views.

