

Sub:	Computer Aided Machine Drawing				Sub Code:	18ME36A	Branch:	MECH.
Date:	09/09/2019	Duration:	90 min's	Max Marks:	50	Sem / Sec:	3 (A&B)	

Scheme & Solution

1. Draw BSW thread profile for a pitch of 60mm. Indicate all dimensions and proportions.

10 Marks

Solution:

Scheme:

Calculation – 2 Marks

Dimensions – 2 Marks

Sketch - 6 Marks

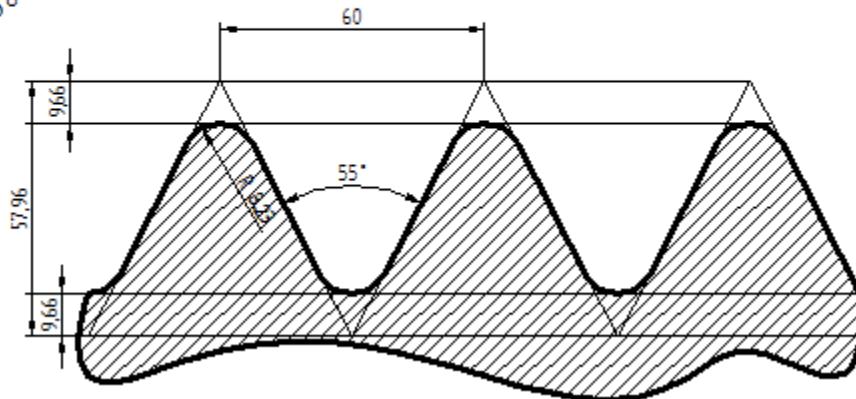
Pitch $P = 60\text{mm}$

Height of thread $= H = 0.966 P = 57.96\text{mm}$

$a=d= H/6 = \frac{57.96}{6} = 9.66\text{mm}$

$R = 0.1373 P = 8.23\text{mm}$

Angle $2\theta = 55^\circ$



2. A hexahedron of 40mm sides is cut by a section plane, so that the true shape of section is a rhombus of sides of maximum length. Draw the sectional top view and true shape of section. And also find the inclination of section plane with the reference plane.

20 Marks

Solution:

Scheme:

XY line VP & HP - 2 Marks

Front view - 4 Marks

Sectional Top view - 5 Marks

Section plane - 4 Marks

True Shape - 5 marks

Solution:

Scheme:

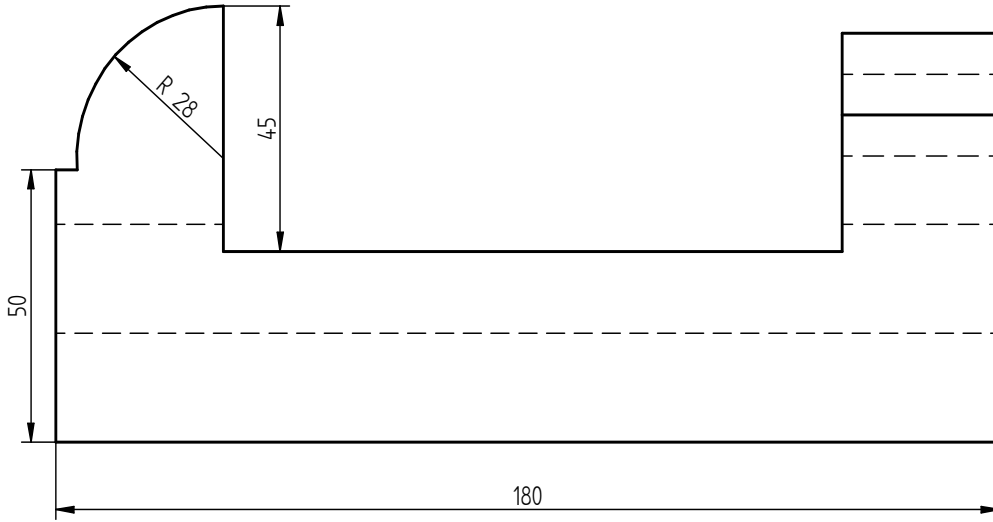
Dimensions – 2 marks

Front view – 6 marks

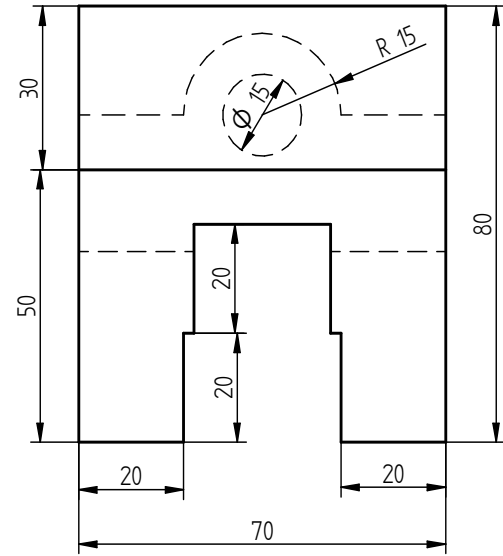
Top View – 6 Marks

Side view - 6 Marks

FRONT VIEW



LEFT SIDE VIEW



TOP VIEW

