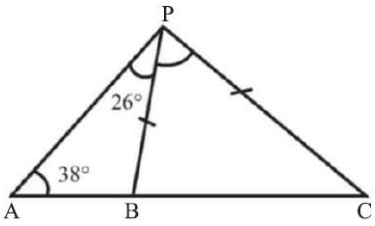
STANDARD 7TH: CHAPTER 4

Angles and Pairs of Angles

Q.1 Choose the correct alternative:

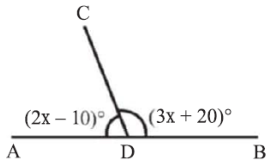
1. Find the supplementary angle of 64^0
   a. 106^0
   b. 116^0
   c. 126^0
   d. 96^0

2. Find $m\angle BPC$



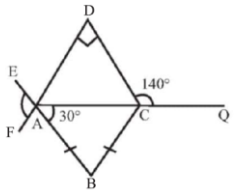
   a. 52^0
   b. 42^0
   c. 62^0
   d. 32^0

3. Find the smallest angle of the following figure?



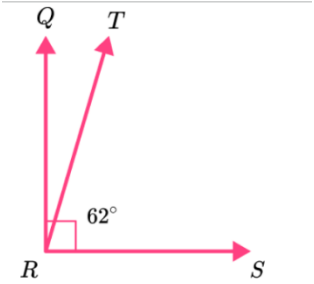
   a. 60^0
   b. 58^0
   c. 48^0
   d. 78^0

4. Find $\angle FAE$?



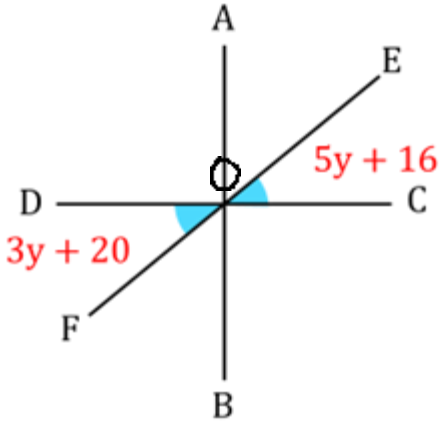
a. 79^0
b. 60^0
c. 80^0
d. 75^0

5. The pair of angles are complementary. Find the measure of angle *QRT*.



a. 30^0
b. 28^0
c. 26^0
d. 25^0

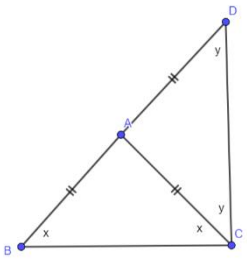
6. If three lines AB, CD and EF intersect each other at a common point 'O' such that AB is perpendicular to CD, determine the value of y and ∠AOE.



a. $y = 2\ and\ \angle AOE = 64$
b. $y = 4\ and\ \angle AOE = 64$
c. $y = 2\ and\ \angle AOE = 68$
d. $y = 6\ and\ \angle AOE = 64$

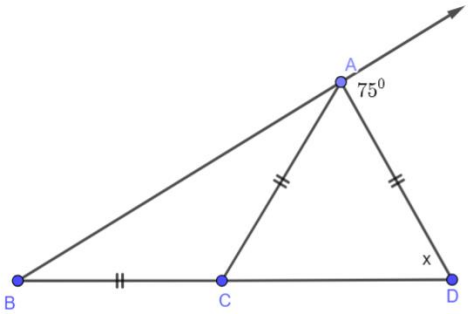
7. Of all quadrilaterals with same area which of the following has list perimeter.
    a. Parallelogram
    b. Rectangle
    c. Square
    d. Trapezium

8. Find the value of $\angle BCD$



    a. 80^0
    b. 88^0
    c. 95^0
    d. 90^0

9. In the figure, find the value of x

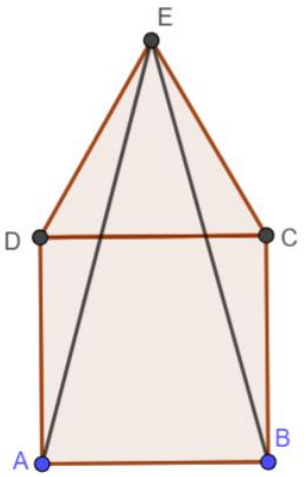


    a. 37.5^0
    b. 50^0
    c. 40^0
    d. 60^0

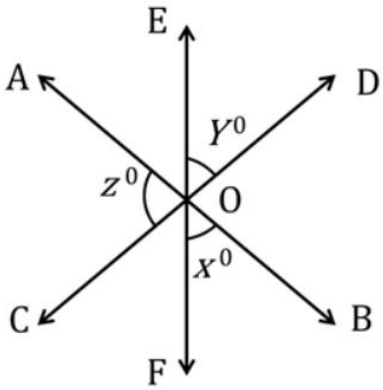
10. Angle more than 180^0 and less than $360^0$is called
    a. Right angle
    b. Obtuse angle
    c. Reflex angle
    d. Acute angle

Q. 2 Solve

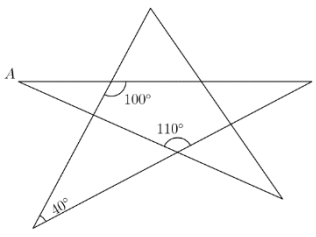
1. In the figure quadrilateral ABCD is square and DCE is an equilateral triangle, then find $\angle DAE$



2. In the given figure, AB, CD and EF intersect at O. Find the values of *x*, *y* and *z* if it is being given that x:y:z =2:3:5



3. Find the measure of angle A

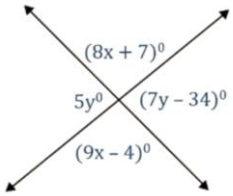


4. If the degree measures of the angles of a triangle are in the ratio $3 : 3 : 4$, what is the degree measure of the largest angle of the triangle?

5. Define and state the difference between:
   a) Adjacent angle
   b) Linear Pair angle

6. Prove that two angles supplementary to the same angle are congruent.

7. Find the value of x and y.



8. Prove that Measure of exterior angle is equal to sum of its remote interior angle.

9. Prove that angles across two intersecting lines are the same.

10. Find the value of a and b.