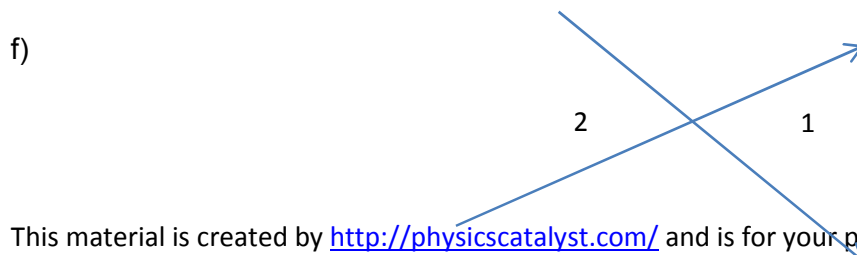
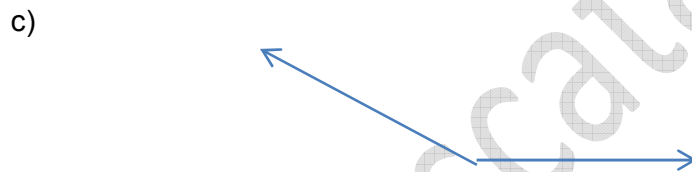
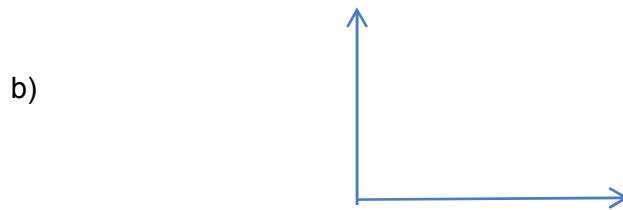
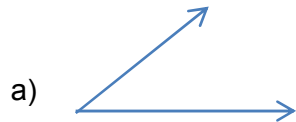
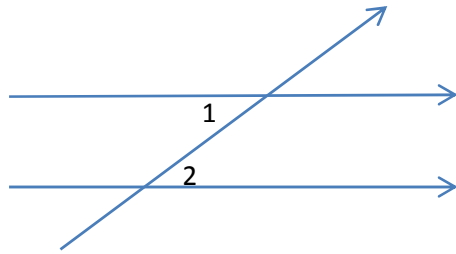


# Geometry Formative assessment

1. Write the type of angles



g)


**Solution**

- a) Acute angle
- b) Right angle
- c) Obtuse angle
- d) Straight angle
- e) Reflex angle
- f) Vertically opposite angle
- g) Alternate interior angles

**6) True or False statement**

- a) Pairs of vertically opposite angles is always equal
- b) The sum of the angles of a triangle is  $180^\circ$
- c) If the sum of two adjacent angles is  $45^\circ$ , then two adjacent angles are acute angles
- d) If a line is perpendicular to one of two parallel lines, then it is also perpendicular to the other
- e) Two lines are intersected by the transversal, and then the corresponding angles are equal
- f) Can we have a triangle where all the interior angles are more than  $60^\circ$ ?
- g) Sum of two complementary angles is equal to  $90^\circ$
- h) Sum of all the exterior angles of any polygon is always  $360^\circ$

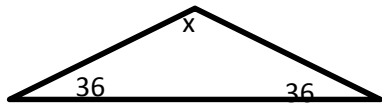
**Solution**

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- a) True
- b) True
- c) True
- d) True
- e) False
- f) False
- g) True
- h) True

### Multiple choice Questions

7) Find the value of x



- a) 98
- b) 100
- c) 108
- d) 96

**Solution (c)**

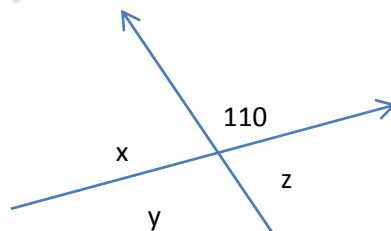
$$X+36+36=180 \Rightarrow x=108$$

8. A pair of angles is called linear pair if the sum of two adjacent angles is?

- a) 180
- b) 90
- c) 270
- d) 360

**Solution (a)**

9)



Find the value of x,y and z

- a)  $x=110,y=70,z=80$

- b)  $x=70, y=110, z=60$   
 c)  $x=70, y=100, z=70$   
 d)  $x=70, y=110, z=70$

**Solution (d)**

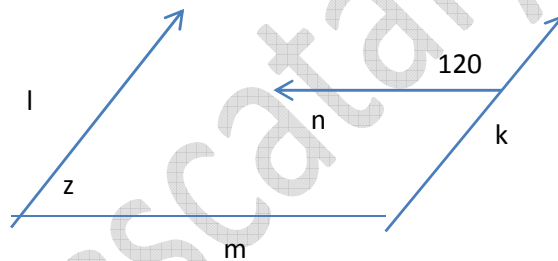
Vertically opposite angle theorem and linear pair axiom can be used to find the answer

10. An exterior angle of the triangle is  $110^\circ$ . And its two opposite interior angles are in the ratio 5:6. What are the values of those angles?

- a) 50,60  
 b) 25,30  
 c) 35,42  
 d) 40,48

**Solution (a)**

11.

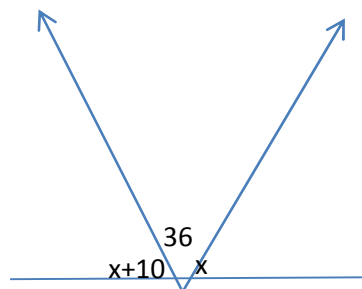


Lines  $l \parallel k$  and  $m \parallel n$ . Find the value of angle  $z$

- a) 45  
 b) 60  
 c) 70  
 d) 50

**Solution (b)**

12.



Find the value of x

- a)  $67^\circ$
- b)  $71^\circ$
- c)  $57^\circ$
- d) None of these

**Solution (a)**

**Fill in the blanks**

- a) Sum of two supplementary angles is .....
- b) Two lines parallel to the same line is ..... each other
- c) An acute angle is always less than .....
- d) Angles forming a linear pair are .....
- e) If one angle of triangle is equal to the sum of other two angles, then the triangle is .....
- f) if two straight lines intersect ,the adjacent angles are .....

**Solutions**

- a) 180
- b) parallel
- c) 90
- d) supplementary
- e) right angle triangle
- f) Supplementary

**Table Type Question**

|                     |    |    |    |    |
|---------------------|----|----|----|----|
| Angle               | 30 | 80 | 11 | 87 |
| Complementary angle |    |    |    |    |
| Supplementary angle |    |    |    |    |

**Solution:**

Complementary =  $90 - x$   
 Supplementary =  $180 - x$