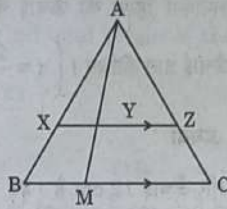




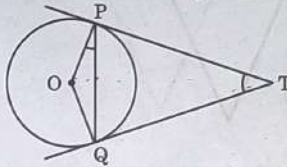
25. In the given figure,  $XZ$  is parallel to  $BC$ .  $AZ = 3$  cm,  $ZC = 2$  cm,  $BM = 3$  cm and  $MC = 5$  cm. Find the length of  $XY$ .



### SECTION - C

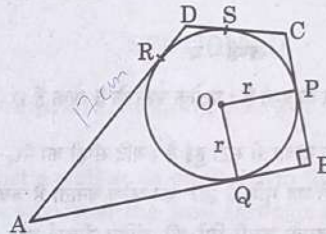
(This section comprises of Short Answer (SA-II) type questions of 3 marks each.)

26. The centre of a circle is  $(2a, a - 7)$ . Find the values of 'a' if the circle passes through the point  $(11, -9)$ . Radius of the circle is  $5\sqrt{2}$  cm.
27. (a) Two tangents  $TP$  and  $TQ$  are drawn to a circle with centre  $O$  from an external point  $T$ . Prove that  $\angle PTQ = 2\angle OPQ$ .



OR

- (b) In the given figure, a circle is inscribed in a quadrilateral  $ABCD$  in which  $\angle B = 90^\circ$ . If  $AD = 17$  cm,  $AB = 20$  cm and  $DS = 3$  cm, then find the radius of the circle.



28. Half of the difference between two numbers is 2. The sum of the greater number and twice the smaller number is 13. Find the numbers.