

Practical Geomentry (constructions) Ex 18.2 Q1

Answer:

Steps of construction:

Step I: Draw AC = 6 cm.

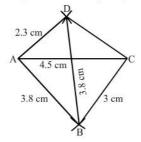
Step II: With A as the centre and radius 3.8 cm, draw an arc.

Step III : With C as the centre and radius 3.0 cm, draw an arc to intersect the arc drawn in Step II at B.

Step IV: With B as the centre and radius 3.8 cm, draw an arc on the other side of AC.

Step V : With A as the centre and radius 2.3 cm, draw an arc to intersect the arc drawn in Step IV at D.

Step VI: Join BA, DA, BC and CD to obtained the required quadrilateral.



Practical Geomentry (constructions) Ex 18.2 Q2

Answer:

Steps of construction:

Step I: Draw AC = 6 cm.

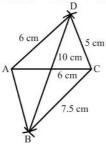
Step II: With A as the centre and radius 6 cm, draw an arc.

Step III : With C as the centre and radius 5 cm, draw an arc to intersect the arc drawn in Step II at D.

Step IV: With D as the centre and radius $10~\mathrm{cm},~\mathrm{draw}$ an arc on the other side of the line segment AC.

Step V : With C as the centre and radius 7.5 cm, draw an arc to intersect the arc drawn in Step IV at B.

Step VI: Join BA, DA, BC and CD to obtained the required quadrilateral.



Practical Geomentry (constructions) Ex 18.2 Q3

Answer:

If we consider a triangle ABD from the given data, then

AB = 3 cm

BD = 4 cm

AD = 7.5 cm

AB + BD = 3 + 4 = 7 cm

However, we know that the sum of the lengths of two sides of a triangle is always greater than the third side

Therefore, construction is not possible from the given data.