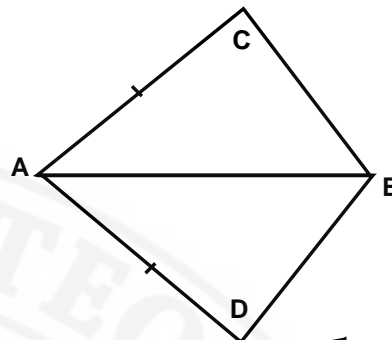


1. Line segment joining the mid point of any side with the opposite vertex is
(a) altitude (b) median (c) perpendicular bisector (d) angle bisector
2. The length of perpendicular drawn from the opposite vertex to any side is
(a) altitude (b) median (c) perpendicular bisector (d) angle bisector
3. The point of intersection of all the altitudes of a triangle is
(a) orthocentre (b) incentre (c) circumcentre (d) centroid
4. The point of intersection of the perpendicular bisector of all sides of a triangle is
(a) orthocentre (b) incentre (c) circumcentre (d) centroid
5. In a triangle, the angle opposite to the longest side is:
(a) greater than 60° (b) measure of 50°
(c) greater than 90° (d) none of these
6. The point of intersection of all the medians of a triangle is
(a) orthocentre (b) incentre (c) circumcentre (d) centroid
7. In a triangle ABC, if $2\angle A = 3\angle B = 6\angle C$, then the measure of $\angle A$ is
(a) 30° (b) 75° (c) 90° (d) 60°
8. In a triangle ABC, if $2\angle A = 3\angle B = 6\angle C$, then the measure of $\angle B$ is
(a) 30° (b) 75° (c) 90° (d) 60°
9. In a triangle ABC, if $2\angle A = 3\angle B = 6\angle C$, then the measure of $\angle C$ is
(a) 30° (b) 75° (c) 90° (d) 60°
10. In a triangle ABC, if $\angle A - \angle B = 33^{\circ}$ and $\angle B - \angle C = 18^{\circ}$, then the measure of $\angle A$ is
(a) 88° (b) 55° (c) 37° (d) 60°
11. In a triangle ABC, if $\angle A - \angle B = 33^{\circ}$ and $\angle B - \angle C = 18^{\circ}$, then the measure of $\angle B$ is
(a) 88° (b) 55° (c) 37° (d) 60°
12. In a triangle ABC, if $\angle A - \angle B = 33^{\circ}$ and $\angle B - \angle C = 18^{\circ}$, then the measure of $\angle C$ is
(a) 88° (b) 55° (c) 37° (d) 60°
13. In a triangle ABC, if $\angle A + \angle B = 65^{\circ}$ and $\angle B + \angle C = 140^{\circ}$, then the measure of $\angle A$ is
(a) 40° (b) 25° (c) 115° (d) 60°
14. In a triangle ABC, if $\angle A + \angle B = 65^{\circ}$ and $\angle B + \angle C = 140^{\circ}$, then the measure of $\angle B$ is
(a) 40° (b) 25° (c) 115° (d) 60°
15. In a triangle ABC, if $\angle A + \angle B = 65^{\circ}$ and $\angle B + \angle C = 140^{\circ}$, then the measure of $\angle C$ is
(a) 40° (b) 25° (c) 115° (d) 60°

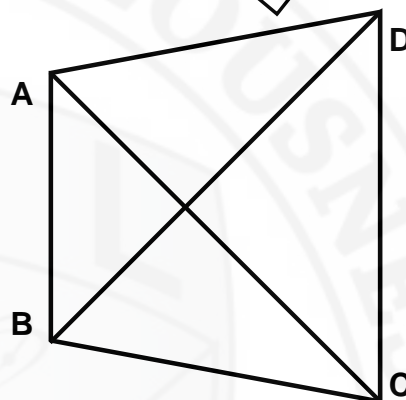
1. In quadrilateral ABCD, $AC = AD$ and AB bisect $\angle A$ and $\triangle ABC \cong \triangle ABD$. The relation between BC and BD is

- (a) $BC > BD$ (b) $BC < BD$
(c) $BC = BD$ (d) $BC = (1/2)BD$



2. In quadrilateral ABCD, $AD = BC$ and $\angle DAB = \angle CBA$. If $\triangle ABD \cong \triangle BAC$. The relation between $\angle ABD$ and $\angle BAC$ is

- (a) $\angle ABD > \angle BAC$ (b) $\angle ABD < \angle BAC$
(c) $\angle ABD = \angle BAC$ (d) $\angle ABD = (1/2)\angle BAC$



3. $\triangle ABC$ is right triangle in which $\angle A = 90^\circ$ and $AB = AC$. The values of $\angle B$ and $\angle C$ will be

- (a) $\angle B = \angle C = 60^\circ$ (b) $\angle B = \angle C = 30^\circ$
(c) $\angle B = \angle C = 45^\circ$ (d) $\angle B = \angle C = 50^\circ$

5. The measure of each angle of an equilateral triangle is:

- (a) 60° (b) 30° (c) 45° (d) 40°

6. If the vertical angle of an isosceles triangle is 40° then measure of other two angles will be

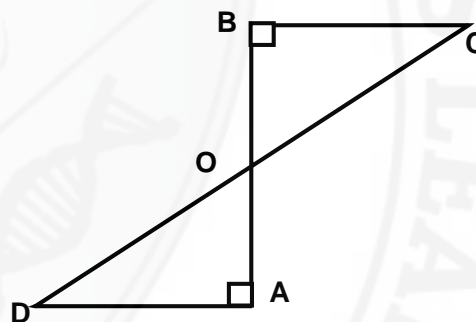
- (a) $60^\circ, 60^\circ$ (b) $70^\circ, 70^\circ$
(c) $50^\circ, 50^\circ$ (d) $75^\circ, 75^\circ$

7. If $\angle A, \angle B$ and $\angle C$ of $\triangle ABC$ are equal then triangle is:

- (a) Equilateral (b) Isosceles
(c) Scalene (d) none of these.

8. AC and BD are equal perpendicular to line segment AB. If $\triangle BOC \cong \triangle AOD$, then the relation between OC and OD is

- (a) $OD > OC$ (b) $OD < OC$
(c) $OD = OC$ (d) $OD = (1/2)OC$

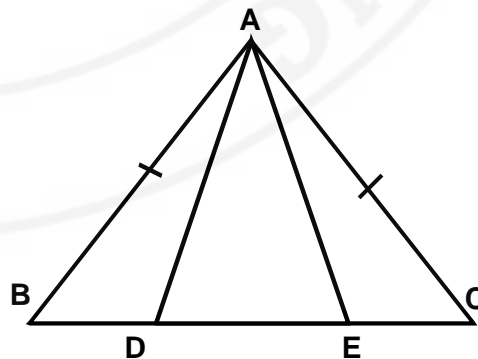


9. If M is the midpoint of hypotenuse AC of right triangle ABC then $BM = \frac{1}{2}$ _____

- (a) AC (b) BC (c) AB (d) none of these

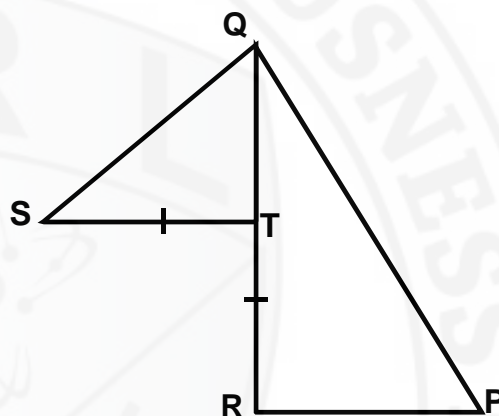
10. In fig. $AB = AC$ and $BF = CD$. If $\triangle ACD \cong \triangle ABE$ then AD =

- (a) AC (b) AE (c) AB
(d) none of these



- In a triangle, the angle opposite to the longer side is:
(a) larger (b) 90° (c) smaller (d) none of these
- In a triangle side opposite to larger angle is
(a) longer (b) shorter (c) equal (d) none of these
- In a triangle, the sum of its two sides is _____ third side.
(a) equal to (b) less than (c) greater than (d) none of these
- The point of intersection of the angle bisector of all internal angles of a triangle is
(a) orthocentre (b) incentre (c) circumcentre (d) centroid

- In fig, PQR is a triangle in which T is a point on QR and if S is a point such that $RT = ST$: then $PQ + PR$ ____ QS
(a) $PQ + PR > QS$ (b) $PQ + PR < QS$
(c) $PQ + PR = QS$ (d) $PQ + PR = \frac{1}{2} QS$
- The sum of three altitudes of triangle is _____ the sum of its three sides.
(a) equal to (b) less than
(c) greater than (d) none of these

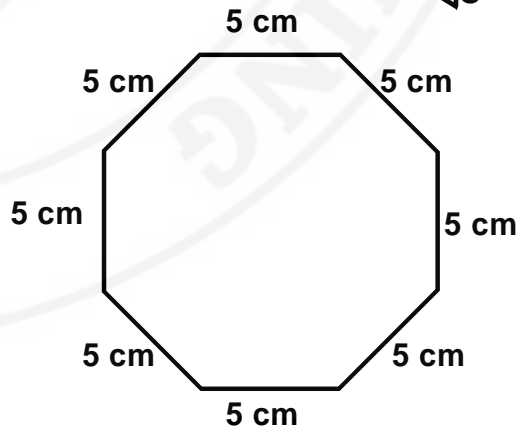


- In a right angled triangle, _____ is the longest side.
(a) perpendicular (b) hypotenuse (c) base (d) none of these
- In fig, $\angle B < \angle A$ and $\angle C < \angle D$ then relation between AD and BC is
(a) $AD > BC$ (b) $AD < BC$
(c) $AD = BC$ (d) none of these



- In a triangle ABC, $\angle A = \angle B = 62\frac{1}{2}^\circ$ then the longest side is
(a) AC (b) BC (c) AB (d) none of these

- How many equilateral triangles each of 1 cm and fill the given hexagonal rangoli?
(a) 200 (b) 300 (c) 150 (d) 250



1. How many equilateral triangles each of 1 cm and fill the given star rangoli?
(a) 200 (b) 300 (c) 150 (d) 350

2. In a triangle ABC, $AC > AB$ and bisector of $\angle A$ meets BC at D then $\angle ADB$ is:
(a) acute angle (b) right angle
(c) obtuse angle (d) linear angle

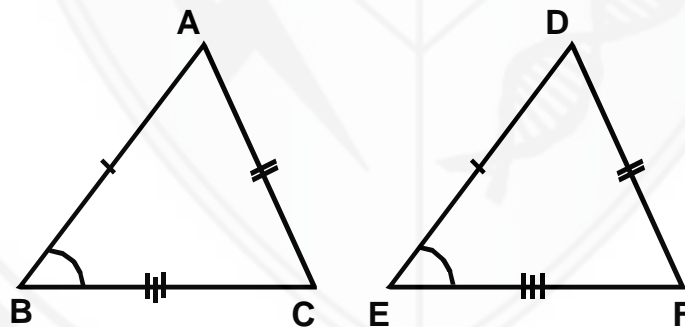
3. The difference between any two sides of a triangle is _____ the third side.
(a) equal to (b) less than (c) greater than (d) half

4. If two angles of a triangle are unequal then the side opposite side to the smaller angle is:
(a) greater (b) 90° (c) smaller (d) none of these

5. The sides opposite to two equal angles of a triangle are:
(a) not equal (b) congruent (c) may be congruent (d) not congruent

6. Which one of the following is the value of congruency?
(a) SAS (b) ASS (c) SSA (d) none of these

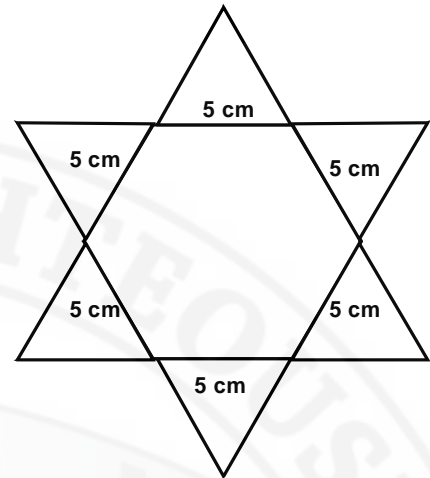
7. By which congruence rule following triangles are congruent ?
(a) SAS (b) ASS (c) AAS (d) SSS



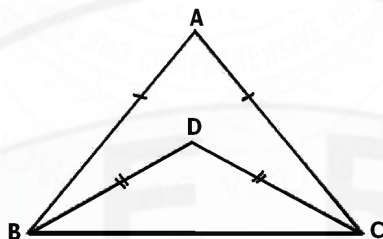
8. In a right triangle, if acute angle is double of other angle then hypotenuse is:
(a) equal to the smallest side (b) three times the smallest side
(c) twice the smallest side (d) smaller than any of the two sides

9. In a triangle ABC, if median $BE =$ median CF then triangle is:
(a) Equilateral (b) Isosceles (c) Scalene (d) none of these.

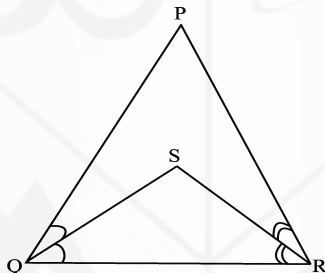
10. The perimeter of a triangle is _____ the sum of its medians.
(a) equal to (b) less than (c) greater than (d) half of



- If one angle of a triangle is equal to the sum of other two angles, then the triangle is
 (a) an Equilateral triangle (b) an Isosceles triangle
 (c) an obtuse triangle (d) a right triangle .
- In the given figure, the ratio $\angle ABD : \angle ACD$ is
 (a) 1 : 1 (b) 2 : 1 (c) 1 : 2 (d) 2 : 3

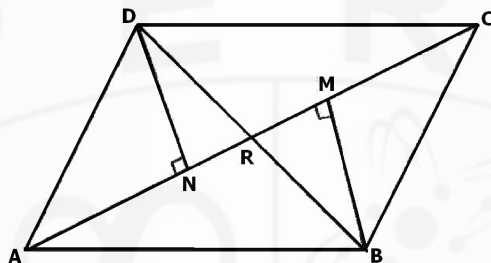


- $\angle x$ and $\angle y$ are exterior angles of a $\triangle ABC$, at the points B and C respectively. Also $\angle B > \angle C$, then relation between $\angle x$ and $\angle y$ is
 (a) $\angle x > \angle y$ (b) $\angle x < \angle y$ (c) $\angle x = \angle y$ (d) none of these
- In the given figure, $PQ > PR$, QS and RS are the bisectors of $\angle Q$ and $\angle R$ respectively, then
 (a) $SQ > SR$ (b) $SQ < SR$ (c) $SQ = SR$ (d) none of these



- If the bisector of vertical angle of a triangle is perpendicular to the base of triangle is
 (a) an Equilateral triangle (b) a scalene triangle
 (c) an obtuse angled triangle (d) an acute angled triangle .
- In a $\triangle ABC$ and $\triangle PQR$, three equality relations between same parts are as follows:
 $AB = QP$, $\angle B = \angle P$ and $BC = PR$
 State which of the congruence conditions applies:
 (a) SAS (b) ASA (c) SSS (d) RHS
- D, E, F are the midpoints of the sides BC, CA and AB respectively of $\triangle ABC$, then $\triangle DEF$ is congruent to triangle
 (a) ABC (b) AEF
 (c) BFD, CDE (d) AFE, BFD, CDE

8. In quadrilateral ABCD, BM and DN are drawn perpendicular to AC such that $BM = DN$. If $BR = 8$ cm, then BD is
(a) 4 cm (b) 2 cm (c) 12 cm (d) 16 cm



9. If $\triangle ABC \cong \triangle PQR$ and $\triangle ABC$ is not congruent to $\triangle RPQ$, then which of the following is not true:
(a) $BC = PQ$ (b) $AC = PR$ (c) $QR = BC$ (d) $AB = PQ$
10. D is a point on the side BC of a $\triangle ABC$ such that AD bisects $\angle BAC$. Then
(a) $BD = CD$ (b) $BA > BD$ (c) $BD > BA$ (d) $CD > CA$