Maths : Practical Geometry

1. Construct a triangle similar to a given triangle ABC with its sides equal to 6/5 of the corresponding sides of the triangle ABC (scale factor 6/4).

2. Construct a Δ PQR which the base PQ = 4.5 cm, /R = 35° (/ denote angle) and the median from R to RG is 6 cm.

3. Construct a Δ PQR in QR = 5 cm, /_P = 40° and the median PG from P to QR is 4.4 cm. Find the length of the altitude from P to QR.

4. Draw Δ PQR such that PQ = 6.8 cm, vertical angle is 50° and the bisector of the vertical angle meets the base at D where PD = 5.2 cm.

5. Draw a tangent at any point R on the Circle of radius 3.4 cm and center at P.

6. Draw a circle of radius 4.5 cm. Take a point on the Circle. Draw the tangent at that point using the alternate segment theorem.

7. Draw the two tangents from a point which is 5 cm away from the center of a circle of diameter 6 cm. Also, measure the lengths of the tangents.