## NCERT Solutions for Class 7 Maths Chapter 6 The Triangle and its Properties Ex 6.1

Ex 6.1 Class 7 Maths Question 1.
In $\triangle P Q R, D$ is the mid-point of $\overline{\mathrm{QR}}$,
$\overline{\mathrm{PM}}$ is
$\overline{\mathrm{PD}}$ is


If $\mathrm{QM}=\mathrm{MR}$ ?
Solution:
$\overline{\mathrm{PM}}$ is altitude.
$\overline{\mathrm{PD}}$ is median.
No, $Q M \neq M R$.

Ex 6.1 Class 7 Maths Question 2.
Draw rough sketches for the following:
(a) In $\triangle A B C, B E$ is a median.
(ib) In $\triangle \mathrm{PQR}, \mathrm{PQ}$ and PR are altitudes of the triangle.
(c) In $\triangle X Y Z, Y L$ is an altitude in the exterior of the triangle.

Solution:

(a)

(c)

## Ex 6.1 Class 7 Maths Question 3.

Verify by drawing a diagram if the median and altitude of an isosceles triangle can be same. Solution:
$\triangle A B C$ is an isosceles triangle in which $A B=A C$


Draw AD as the median of the triangle.
Measure the angle ADC with the help of protractor we find, $\angle A D C=90^{\circ}$
Thus, $A D$ is the median as well as the altitude of the $\triangle A B C$. Hence Verified.

