## DELHI PUBLIC SCHOOL, SRINAGAR

Subject:- Mathematics
Worksheet
Topic:- Quadrilaterals
Q1) The measure of two angles of a parallelogram are in a ratio 3:2 find the measure of each angle of a parallelogram

Q2) The diagonals of a rectangle PQRS intersect each other at $O$. if angle POS $=40$, find $<$ ROQ and <ORQ


Q3) the ratio of two sides of a parallelogram is 2:5 and its perimeter is 70 find the sides of a parallelogram

Q4) In the following figure KLMN is a parallelogram and a line segment KO and PM bisect the angles K and M respectively .show that KO || PM


Q5) The adjacent sides of a parallelogram differ by 30 cm . if its perimeter is 160 cm , find its sides

Q6) In the figure , $A B C D$ is a rectangle $D P$ and $P Q$ are perpendiculars to $A C$ from $D$ and $B$ respectively
(a) Is $A B=C D$
(b) $\angle B Q A=\angle D P C$
(c) $\angle B A Q=\angle D C P$
(d) Is $\triangle B Q A \cong \triangle D P C$ ? state the congruence condition
(e) Is $B Q=D P$ ? state the reason in each case


Q7) prove that opposite angles of a parallelogram are equal

Q8) in figure $A B C D$ is a quadrilateral with $\angle B=56 \square$ and $\angle D=104 \square$. If $\angle B A D$ and $\angle B C D$ are in a ratio 2:3 find the value of $<1$ and $<2$


