EXERCISE 4.5   PAGE NO: 82
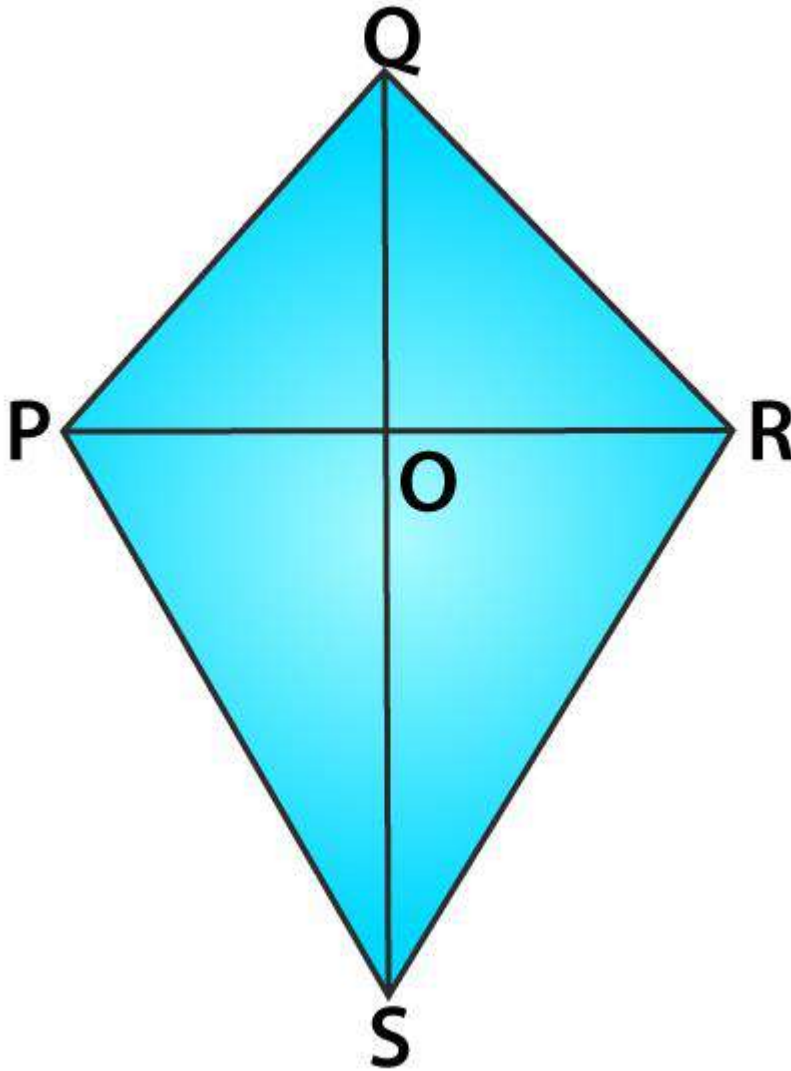
1. Draw a rough sketch of a quadrilateral PQRS. Draw its diagonals. Name them. Is the meeting point of the diagonals in the interior or exterior of the quadrilateral?

Solutions:

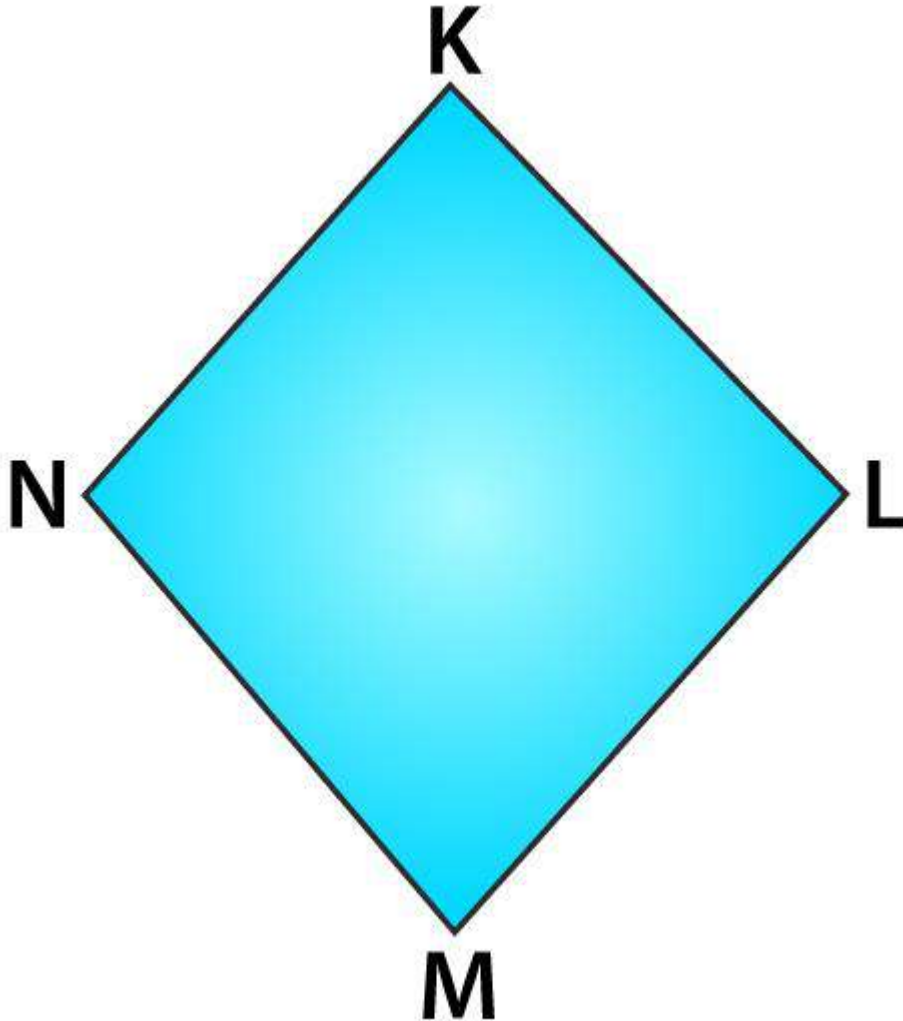PR and QS are the diagonals. They meet at point O, which is in the interior of the quadrilateral.

2. Draw a rough sketch of a quadrilateral KLMN. State,

(a) two pairs of opposite sides,

(b) two pairs of opposite angles,

(c) two pairs of adjacent sides,

(d) two pairs of adjacent angles.

Solutions:

(a) Two pairs of opposite sides are
$\overline{KL}, \overline{NM}$ and $\overline{KN}, \overline{ML}$

(b) Two pairs of opposite angles are ∠KLM, ∠KNM and ∠LKN, ∠LMN

(c) Two pairs of adjacent sides are
$\overline{KL}, \overline{KN}$ and $\overline{NM}, \overline{ML}$ or $\overline{KL}, \overline{LM}$ and $\overline{NM}, \overline{NK}$

(d) Two pairs of adjacent angles are ∠K, ∠L and ∠M, ∠N or ∠K, ∠L and ∠L, ∠M