

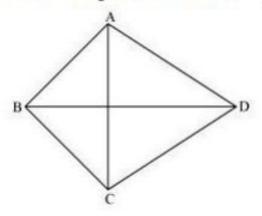
Understanding shapes-I polygons Ex 15.1 Q6

## Answer:

An n-sided convex polygon has n(n-3)2 diagonals.

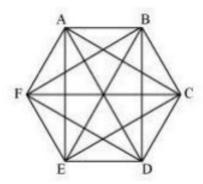
(i) A quadrilateral has 4(4-3)2 = 2 diagonals.

There are 2 diagonals in the convex quadrilateral.



(ii) A regular hexagon has 6(6-3)2=9 diagonals.

There are 9 diagonals in a regular hexagon.



## (iii) A triangle does not have any diagonal in it.

