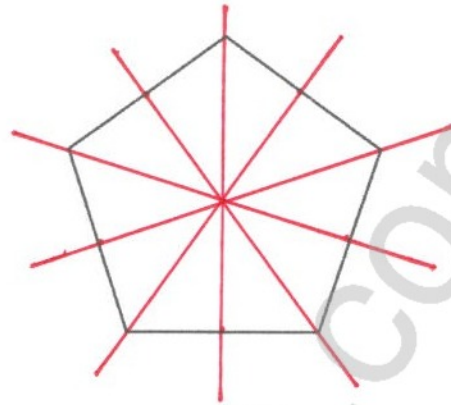
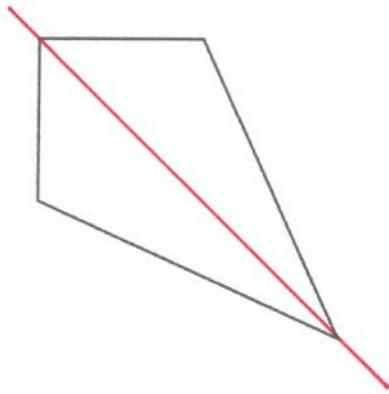


A Symmetry and Properties of Shapes

- 3 Draw **all** the lines of symmetry on each of these shapes.

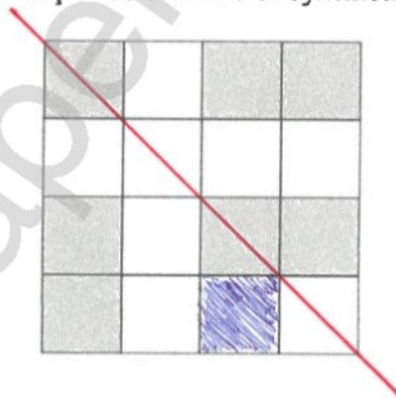


[2]

- 2 Write down the number of lines of symmetry of a kite.

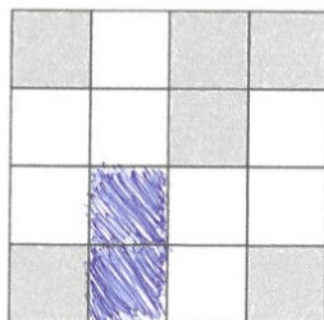
.....1..... [1]

- 3 (a) Shade **one** square so that the shape has one line of symmetry.



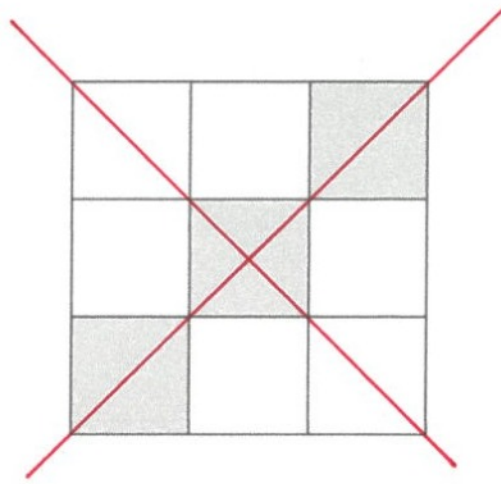
[1]

- (b) Shade **two** squares so that the shape has rotational symmetry of order 2.



[1]

1

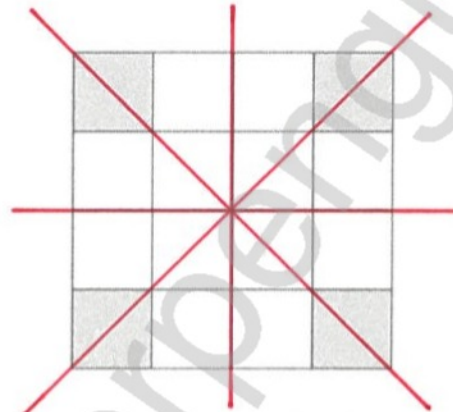


(a) Complete the statement.

The diagram has rotational symmetry of order 2 [1]

(b) On the diagram, draw all the lines of symmetry. [2]

1

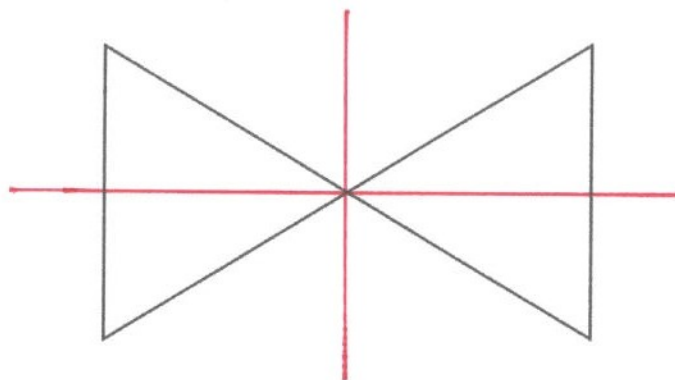


(a) Write down the order of rotational symmetry of this diagram.

..... 4 [1]

(b) On the diagram, draw all the lines of symmetry. [2]

1

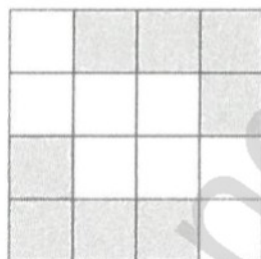


(a) Complete this statement.

The diagram has rotational symmetry of order2..... [1]

(b) On the diagram, draw all the lines of symmetry. [2]

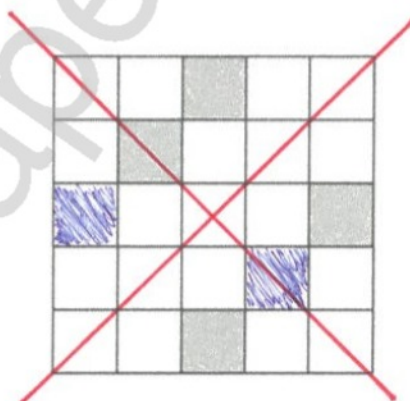
1



Write down the order of rotational symmetry of the diagram.

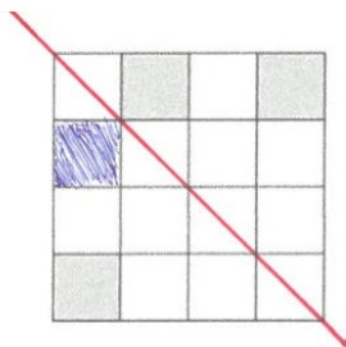
.....2..... [1]

3



Shade **two** more small squares to make a pattern with two lines of symmetry. [1]

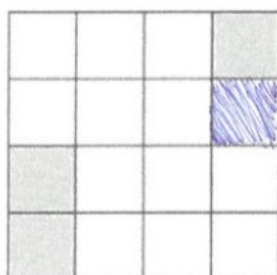
1 (a)



Shade **one** more small square so that the diagram has one line of symmetry.

[1]

(b)



Shade **one** more small square so that the diagram has rotational symmetry of order 2.

[1]

3 A quadrilateral has rotational symmetry of order 2 and no lines of symmetry.

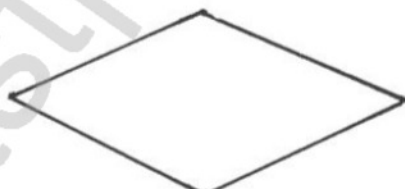
Write down the mathematical name of this quadrilateral.



..... Parallelogram [1]

1 A quadrilateral has rotational symmetry of order two, two lines of symmetry and its angles are **not** right angles.

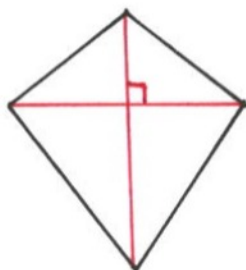
What is the special name of this quadrilateral?



..... Rhombus [1]

- 3 A quadrilateral has one line of symmetry.
The diagonals of the quadrilateral cross at right angles.

Write down the mathematical name of the quadrilateral.

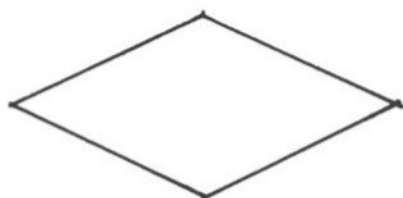


Kite

[1]

- 4 A quadrilateral has all sides equal and exactly two lines of symmetry.

Write down the mathematical name of this quadrilateral.



Rhombus

[1]

- 4 (a) Write down the mathematical name of the quadrilateral that has rotational symmetry of order 2 but no lines of symmetry.

Parallelogram

[1]

- (b) Write down the mathematical name of the quadrilateral that has exactly one line of symmetry.

Kite

[1]

1 A quadrilateral has these properties

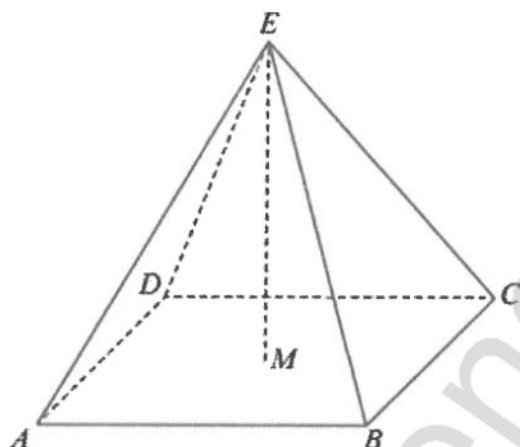
- the diagonals are the only lines of symmetry
- it has rotational symmetry of order 2.

Write down the mathematical name of this quadrilateral.

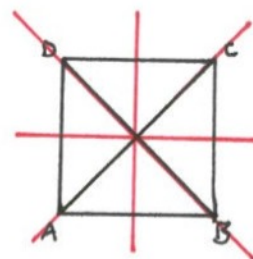
Rhombus

[1]

3



NOT TO SCALE



(plan view)

The diagram shows a pyramid $ABCDE$ with a square base.
 M is the centre of the square base.
 E is vertically above M .

(a) Write down the number of planes of symmetry of this pyramid.

4

[1]

(b) Using two of the letters from A, B, C, D, E and M , complete the statement about the pyramid.

The axis of rotational symmetry passes through the points E and M

[1]