

Homework/Extension

Step 5: Lines of Symmetry

National Curriculum Objectives:

Mathematics Year 4: (4G2b) [Identify lines of symmetry in 2-D shapes presented in different orientations](#)

Differentiation:

Questions 1, 4 and 7 (Varied Fluency)

Developing Match descriptions to the actual shapes by identifying lines of symmetry using simple regular polygons with up to 2 lines of symmetry. All shapes in 'standard' orientation.

Expected Match descriptions to the actual shapes by identifying lines of symmetry using regular polygons with up to 8 lines of symmetry. All shapes in the same 'non-standard' orientation in each question.

Greater Depth Match descriptions to the actual shapes by identifying lines of symmetry using irregular polygons with any number of lines of symmetry. All shapes in unique orientations.

Questions 2, 5 and 8 (Varied Fluency)

Developing Find the odd one out by identifying lines of symmetry using simple regular polygons with up to 2 lines of symmetry. All shapes in 'standard' orientation.

Expected Find the odd one out by identifying lines of symmetry using regular polygons with up to 8 lines of symmetry. All shapes in the same 'non-standard' orientation in each question.

Greater Depth Find the odd one out by identifying lines of symmetry using irregular polygons with any number of lines of symmetry. All shapes in unique orientations.

Questions 3, 6 and 9 (Reasoning and Problem Solving)

Developing Explain whether the statement is correct using simple regular polygons with up to 2 lines of symmetry. All shapes in 'standard' orientation.

Expected Explain whether the statement is correct using regular polygons with up to 8 lines of symmetry. All shapes in the same 'non-standard' orientation in each question.

Greater Depth Explain whether the statement is correct using irregular polygons with any number of lines of symmetry and parallel lines. All shapes in unique orientations.

More [Year 4 Properties of Shape](#) resources.

Did you like this resource? Don't forget to [review](#) it on our website.

Lines of Symmetry

1. Match the children's statements to the shapes they describe.



Lucy

My shape has 2 lines of symmetry.



Maya

My shape has 1 line of symmetry.



Robert

My shape has 2 lines of symmetry.



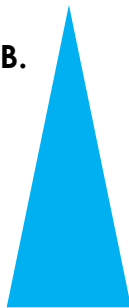
VF
HW/Ext

2. Circle the shape below that is the odd one out.

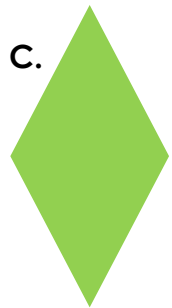
A.



B.



C.



VF
HW/Ext

3. Tim is finding shapes with lines of symmetry. He says,

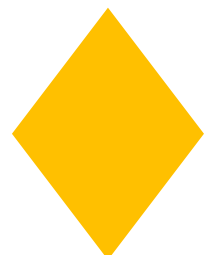


Both of my shapes have 2 lines of symmetry.

A.



B.



Is Tim correct? Explain your answer.



RPS
HW/Ext

Lines of Symmetry

4. Match the children's statements to the shapes they describe.



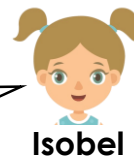
My shape has 3 lines of symmetry.

My shape has 2 lines of symmetry.



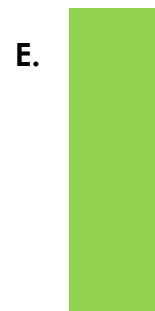
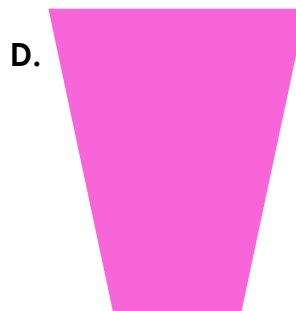
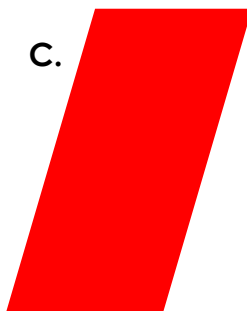
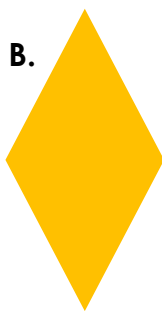
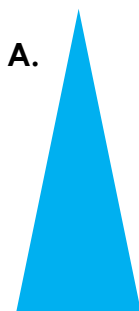
My shape has 5 lines of symmetry.

My shape has 6 lines of symmetry.



VF
HW/Ext

5. Circle the shape below that is the odd one out.

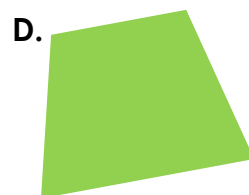
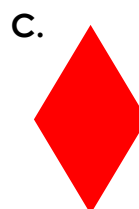
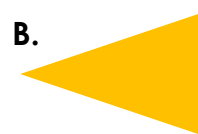
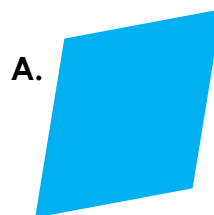


VF
HW/Ext

6. Areeba is finding shapes with lines of symmetry. She says,



All my shapes have 3 lines of symmetry.



Is Areeba correct? Explain your answer.



RPS
HW/Ext

Lines of Symmetry

7. Match the children's statements to the shapes they describe.



Emily

My shape has no lines of symmetry.



Helen

My shape has 7 lines of symmetry.



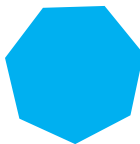
Daniel

My shape has 4 lines of symmetry.



Emma

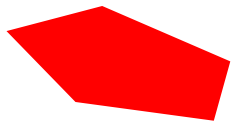
My shape has 1 line of symmetry.



VF
HW/Ext

8. Circle the shape below that is the odd one out.

A.



B.



C.



D.



E.



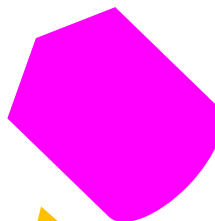
VF
HW/Ext

9. Steve is finding shapes with lines of symmetry. He says,



All my shapes have more than 1 line of symmetry and at least 1 pair of parallel lines.

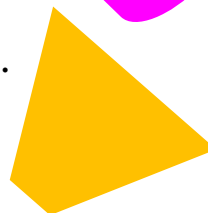
A.



B.



C.



D.



Is Steve correct? Explain your answer.



RPS
HW/Ext

Homework/Extension

Lines of Symmetry

Developing

1. Lucy – oval or rectangle; Maya – isosceles triangle; Robert – oval or rectangle
2. B as it only has 1 line of symmetry.
3. He is incorrect because both have a vertical and horizontal line of symmetry.

Expected

4. Jack – equilateral triangle; Jordan – pentagon; Brad – rectangle; Isobel – hexagon
5. C as it is the only shape that has no lines of symmetry.
6. She is incorrect because none of the shapes have 3 lines of symmetry.

Greater Depth

7. Emily – parallelogram; Helen – heptagon; Daniel – cross; Emma – partial circle
8. E as it is the only shape with 2 lines of symmetry.
9. He is incorrect because the parallelogram has no lines of symmetry.