

Discovery: Special Parallelograms

1. What do you know about the sides and angle measurements of a rectangle?

2. What do you know about the sides and angle measurements of a rhombus?

3. What do you know about the sides and angle measurements of a square?

In this discovery, we are going to investigate the properties of the diagonals of rectangles, rhombuses, and squares using objects found in everyday life.

- a. What object do you have? _____
This is a (circle one) square rhombus rectangle
Its diagonals measure _____ cm and _____ cm.
Measure the angle that the diagonals make when they cross each other. _____
Measure the two angles that are formed when the diagonals meet each vertex.
Vertex 1: ____ and ____ Vertex 2: ____ and ____
Vertex 3: ____ and ____ Vertex 4: ____ and ____
- b. What object do you have? _____
This is a (circle one) square rhombus rectangle
Its diagonals measure _____ cm and _____ cm.
Measure the angle that the diagonals make when they cross each other. _____
Measure the two angles that are formed when the diagonals meet each vertex.
Vertex 1: ____ and ____ Vertex 2: ____ and ____
Vertex 3: ____ and ____ Vertex 4: ____ and ____
- c. What object do you have? _____
This is a (circle one) square rhombus rectangle
Its diagonals measure _____ cm and _____ cm.
Measure the angle that the diagonals make when they cross each other. _____
Measure the two angles that are formed when the diagonals meet each vertex.
Vertex 1: ____ and ____ Vertex 2: ____ and ____
Vertex 3: ____ and ____ Vertex 4: ____ and ____

d. What object do you have? _____

This is a (circle one) square rhombus rectangle

Its diagonals measure _____ cm and _____ cm.

Measure the angle that the diagonals make when they cross each other. _____

Measure the two angles that are formed when the diagonals meet each vertex.

Vertex 1: ____ and ____ Vertex 2: ____ and ____

Vertex 3: ____ and ____ Vertex 4: ____ and ____

e. What object do you have? _____

This is a (circle one) square rhombus rectangle

Its diagonals measure _____ cm and _____ cm.

Measure the angle that the diagonals make when they cross each other. _____

Measure the two angles that are formed when the diagonals meet each vertex.

Vertex 1: ____ and ____ Vertex 2: ____ and ____

Vertex 3: ____ and ____ Vertex 4: ____ and ____

f. What object do you have? _____

This is a (circle one) square rhombus rectangle

Its diagonals measure _____ cm and _____ cm.

Measure the angle that the diagonals make when they cross each other. _____

Measure the two angles that are formed when the diagonals meet each vertex.

Vertex 1: ____ and ____ Vertex 2: ____ and ____

Vertex 3: ____ and ____ Vertex 4: ____ and ____

Drawing Conclusions

1. What can you conclude about the diagonals of a rhombus? _____

2. What can you conclude about the diagonals of a rectangle? _____

3. What can you conclude about the diagonals of a square? _____
