



Sorting Shapes



Task

The story, Round is a Tortilla, tells us about common things that are circles, squares, rectangles, triangles, and ovals. Can you sort the shapes into just 3 groups? Be sure to justify your reasoning for each group.

Standards and Learning Targets

Standard 3.G.1 Understand that shapes in different categories (for example, rhombuses, rectangles, and others) may share attributes (for example, having four sides), and that the shared attributes can define a larger category (for example, quadrilaterals). Recognize rhombuses, rectangles, and squares as examples of quadrilaterals, and draw examples of quadrilaterals that do not belong to any of these subcategories.

Learning Target: Sort shapes into categories by the shapes number of sides and angles.

Lesson Outline

Anticipate: Before you begin this lesson, be sure to anticipate the ways students might sort the shapes using the <u>Picture Book Problem Monitoring Chart</u>.

Launch: Read aloud Round is a Tortilla. As you read, discuss the defining attributes for each shape. Talk about how each shape is alike and different to the previous shape in the story.

Give each group a set of food cards from the story. Then pose the task:



Gather student ideas. Then propose the following problem: The story, Round is a Tortilla, tells us about common things that are circles, squares, rectangles, triangles, and ovals. Can you sort the shapes into just 3 groups? Be sure to justify your reasoning for each group.

Shape Pictures from the story

School of

UTAH VALLEY UNIVERSITY

Round is a Tortilla Recording Sheet

EDUCATION

Explore: As students work with a partner or in small groups, monitor the groups they are creating. If students sort the shapes by types of things, let them and justify their reasoning. Then ask them if they can sort them another way. Purposefully select 2-3 groups to share their sorts and explain their reasoning.

Summarize: Allow students to share how they sorted the items from the story into only 3 groups. Then introduce the geometry term for shapes with three or more sides, polygon, and shapes with four sides, quadrilateral. The story had 2 types of quadrilaterals, square and rectangle. Discuss and define other types of quadrilaterals, rhombus, parallelogram, trapezoid and have groups identify quadrilaterals around us.

Extension Ideas:

- Sort shapes as polygon or not polygon
- Create a quadrilateral class book with examples of each type of quadrilateral using the language of the story

Thank you for using one of our Picture Book Tasks! We would love to know more about your students' strategies when solving the problem, ideas you had for improving the task, and other math problems you and your students noticed or wondered about after reading the book.

Please complete our Picture Book Task Survey so that we can learn more about your experience teaching, how students solve problems, and improve our Picture Book Task Bank.