

NWEA Assessment Item Illustrating 3.G.A.2

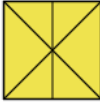

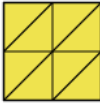
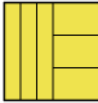
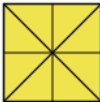

© 2020 NWEA (EXCEPT FOR COMMON CORE STATE STANDARDS © 2010 NATIONAL GOVERNORS ASSOCIATION CENTER FOR BEST PRACTICES AND COUNCIL OF CHIEF STATE SCHOOL OFFICERS). ALL RIGHTS RESERVED. USED WITH PERMISSION FROM NWEA; VISIT <https://www.nwea.org/> FOR TERMS OF USE.

Domain: Geometry

3.G.A: Reason with shapes and their attributes.

Calculator Availability: No

Choose the three squares that appear to be partitioned into parts with equal areas.

<input type="checkbox"/> A.		<input type="checkbox"/> B.	
<input type="checkbox"/> C.		<input type="checkbox"/> D.	
<input type="checkbox"/> E.		<input type="checkbox"/> F.	

Alignment: 3.G.A.2: Partition shapes into parts with equal areas. Express the area of each part as a unit fraction of the whole. For example, partition a shape into 4 parts with equal area, and describe the area of each part as $\frac{1}{4}$ of the area of the shape.

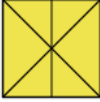

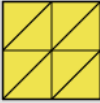
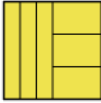


This item assesses the first part of the standard. By requiring the students to identify three correct responses, this item reinforces the understanding that when partitioning a shape into parts with equal areas, the shape can be partitioned in multiple different ways as long as all partitions have the same area.

Coherence: Students began partitioning shapes in grade 1^{1.G.A.3} and continued in grade 2.^{2.G.A.3} The work that students do in the grade 3 Geometry domain supports the work that students with fractions in grade 3.^{3.NF.A.1, 3.NF.A.2} This work also supports their understanding of area models.^{3.OA.A, 3.MD.C.7} Partitioning shapes can also help students better understand area models—both how to construct them and how to relate them to multiplication.^{3.MD.C.7}

Rigor: This item attends to students' conceptual understanding of what it means to partition a shape into equal areas.

Answer Key:

Choose the three squares that appear to be partitioned into parts with equal areas.

<input type="checkbox"/> A.		<input type="checkbox"/> B.	
<input checked="" type="checkbox"/> C.		<input type="checkbox"/> D.	
<input checked="" type="checkbox"/> E.		<input checked="" type="checkbox"/> F.	

Learn More

Learn more with the [Math Assessment Item Alignment Professional Development Modules](#).

All content linked to within this resource was free for use when this resource was published in August 2020. Over time, the organizations that manage that external content may move or remove it or change the permissions. If the content is no longer available, please email info@studentsachieve.net.