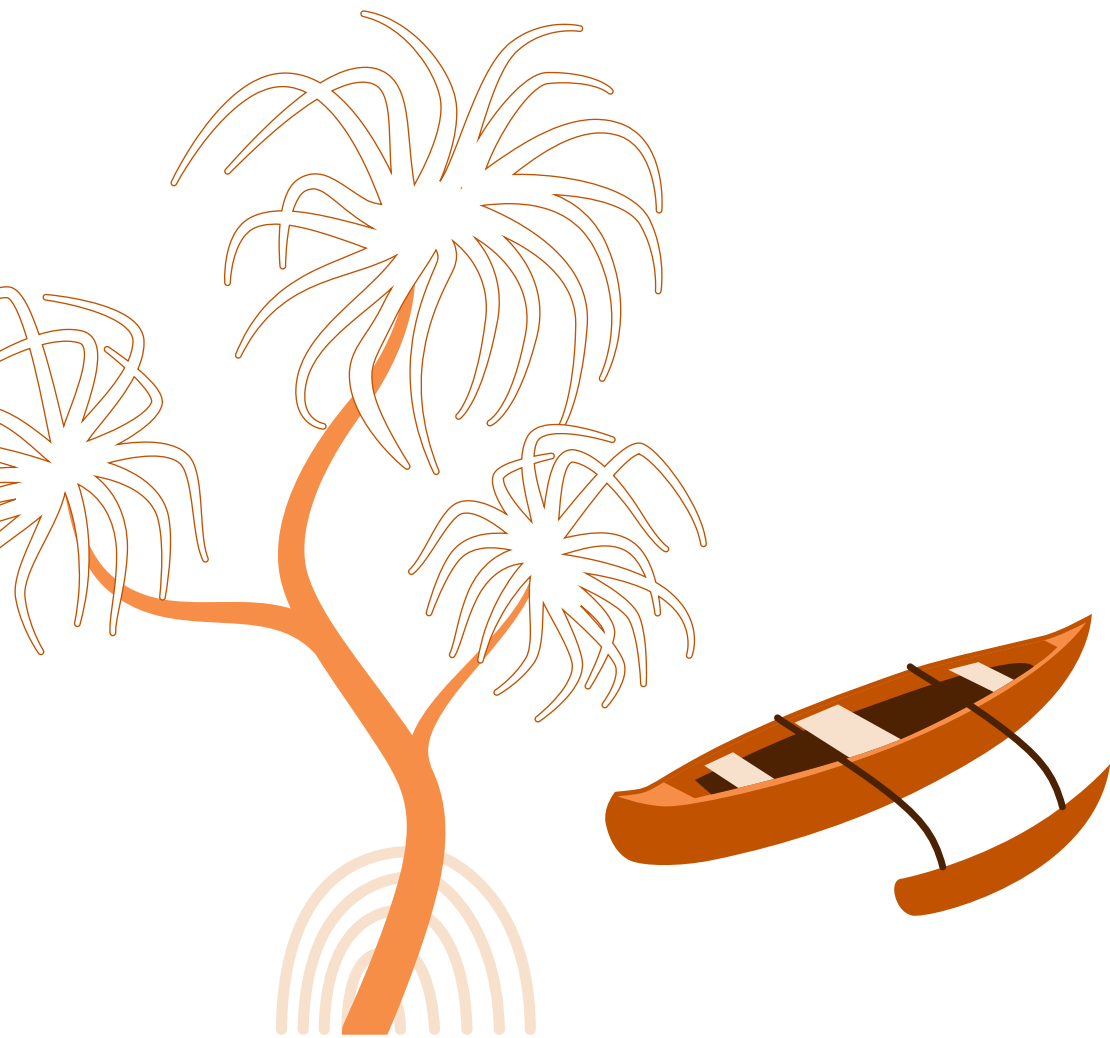


Unit 2: Ratios and Proportional Relationships

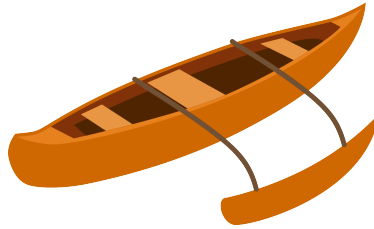


SBAC alignment for *Unit 2: Ratios and Proportional Relationships Activity 1*

Claim(s)	Claim 1: Concepts and Procedures Students can explain and apply mathematical concepts and carry out mathematical procedures with precision and fluency.
Assessment Target(s):	1 E: Draw, construct, and describe geometrical figures and describe the relationships between them.
Content Domain:	Geometry
Standard(s):	7.G.1 Solve problems involving scale drawings of geometric figures, including computing actual lengths and areas from a scale drawing and reproducing a scale drawing at a different scale. 7.RP.2 Recognize and represent proportional relationships between quantities.
DOK:	2

Unit 2: Ratios and Proportional Relationships *Activity 1*

Two builders are drawing a large wa'a (canoe) that they saw at the Bishop Museum.



Wa'a

- The first builder drew the wa'a on a sheet of paper that is 10 inches wide and 4 inches tall. To fit the drawing on the paper, the builder had to use the scale of 1 inch = $\frac{8}{5}$ yards.
- The second builder drew the wa'a on a sheet of paper that is 5 inches wide and 2 inches tall.

Which ratio represents the scale of the second drawing? Show your work to justify your answer.

- (a) $\frac{1}{2}$ yard to $\frac{8}{5}$ inches
- (b) $\frac{8}{5}$ yards to $\frac{1}{2}$ inch
- (c) $\frac{4}{5}$ yard to $\frac{1}{2}$ inch
- (d) $\frac{4}{5}$ yard to 1 inch

SBAC alignment for *Unit 2: Ratios and Proportional Relationships Activity 2*

Claim(s)	Claim 1: Concepts and Procedures Students can explain and apply mathematical concepts and carry out mathematical procedures with precision and fluency.
Assessment Target(s):	1 A: Analyze proportional relationships and use them to solve real-world and mathematical problems. 2 C: Interpret results in the context of a situation.
Content Domain:	Ratios and Proportional Relationships
Standard(s):	7.RP.2 Recognize and represent proportional relationships between quantities.
DOK:	2

Unit 2: Ratios and Proportional Relationships *Activity 2*

Kekoa has been tracking the growth of a 'ohe (bamboo) in his backyard and he has made a graph representing the height, y in centimeters, and the weeks x he has been tracking the 'ohe. The graph is a straight line through the origin and the point $(1, 9.5)$.

Which statement **must** be true?

- (a) It takes the 'ohe 9.5 weeks to grow 1 centimeter.
- (b) The relationship between x and y is **not** a proportional relationship.
- (c) The 'ohe grows 9.5 centimeters per week.
- (d) The graph crosses the point that is 1 unit above and 9.5 units to the right of the origin.

