Elementary School: Perimeter, Area, Surface Area, and Volume Assessment

1. A closed plane figure formed by three or more line segments that only intersect at their endpoints is called?

- a. Pyramid b. Rectangle c. Polygon
- d. Cube

Correct feedback: Yes, the answer is a polygon

Incorrect feedback: Sorry, the answer is polygon. Please review the vocabulary for elementary school measurement.

- 2. The amount of space inside a two dimensional shape or object is called?
  - a. Volume
  - b. Perimeter
  - c. Diameter
  - d. Area

Correct feedback: Yes, the answer is a area

Incorrect feedback: Sorry, the answer is area. Please review the vocabulary for elementary school measurement.

3. Which is the correct label for an area word problem

| a. | cm              |     |
|----|-----------------|-----|
| b. | cm <sup>2</sup> |     |
| c. | cm <sup>3</sup> |     |
|    |                 | 0.1 |

d. None of the above

Correct feedback: Yes, the answer is cm<sup>2</sup>

Incorrect feedback: Sorry, the answer is cm<sup>2</sup>. Please review the using tiling and multiplication to determine the area of a polygon PowerPoint.

- 4. The area around a polygon is called?
  - a. Volume
  - b. Perimeter
  - c. Diameter
  - d. Area

Correct feedback: Yes, the answer is a perimeter

Incorrect feedback: Sorry, the answer is perimeter. Please review the vocabulary for elementary school measurement.

- 5. The amount of space a three dimensional object takes up is called?
  - a. Volume
  - b. Perimeter
  - c. Diameter
  - d. Area

Correct feedback: Yes, the answer is volume

Incorrect feedback: Sorry, the answer is volume. Please review the vocabulary for elementary school measurement.

## 6. Two methods to find the area of a rectangle are

a. Formula and tiling

- b. Multiply perimeter by 2
- c. Drawing the rectangle on graph paper and count the squares
- d. None of the above

Correct feedback: Yes! Two methods for finding the area of a rectangle are applying the formula and tiling.

Incorrect feedback: Sorry! Two methods for finding the area of a rectangle are applying the formula and tiling. Please review the using tiling and multiplication to find the area of a polygon PowerPoint.

- 7. Which is a correct label for a volume word problem
  - a. cm b. cm<sup>2</sup> c. cm<sup>3</sup>
  - d. None of the above

Correct feedback: Yes, the correct label for a volume word problem is cm<sup>3</sup>

Incorrect feedback: Sorry, the correct label for a volume word problem is cm<sup>3</sup>.

8. Background skills students should practice when using formulas to solve for area, surface area, and volume are

- a. Calculator use
- b. Order of operations
- c. Number recognition
- d. All of the above

Correct feedback: Yes, all of the above skills are background skills students should practice when using formulas to solve for area, surface area, and volume.

Incorrect feedback: Sorry, all of the above skills are background skills students should practice when using formulas to solve for area, surface area, and volume.

9. What is the volume of a rectangular prism with a length of 5in, width of 3in, and a height of 4 in?

| a.              | 60 in <sup>2</sup> |
|-----------------|--------------------|
| <mark>b.</mark> | 60in <sup>3</sup>  |
| c.              | 55 in <sup>2</sup> |
| d.              | 55 in <sup>3</sup> |

Correct feedback: Yes, the area of the prism is answer 60in<sup>3</sup>

Incorrect feedback: Sorry, the area is 60in<sup>3</sup>. Please review the finding the volume of three dimensional objects PowerPoint.

10. What is the area of a square with a length of 3 in?
a. 9 in<sup>2</sup>
b. 9 in<sup>3</sup>
c. 6 in<sup>2</sup>
d. 6in<sup>3</sup>

Correct feedback: Yes, the area of the prism is answer 9 in<sup>2</sup>

Incorrect feedback: Sorry, the area is  $9 \text{ in}^2$ . Please review the using tiling and multiplication to determine the area of a polygon PowerPoint.