

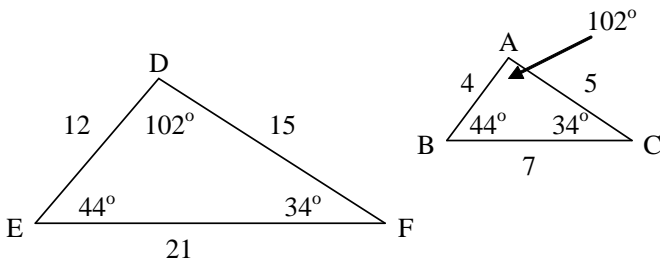
UNIT 5 Part 2 Review: Similar Figures and Scale

Name: _____

Date: _____ Period: _____

SHOW SETUPS and STEPS for each problem on the review. Use extra paper if necessary.

Use the figures below to answer the questions 1-5.



- Which angle corresponds to $\angle A$?
- Which angle corresponds to $\angle C$?
- Which side corresponds to \overline{CB} ?
- Which side corresponds to \overline{AC} ?
- Are these figures similar?

ANSWER SHEET

1. _____

2. _____

3. _____

4. _____

5. _____

6. _____

7. _____

8. _____

9. _____

10. _____

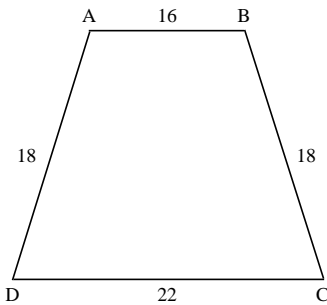
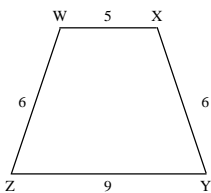
11. _____

12. _____

13. _____

14. _____

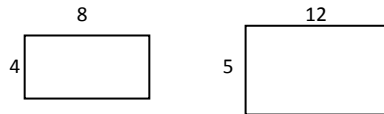
6. Is trapezoid ABCD similar to trapezoid WXYZ?



7. Are the following similar:

Two triangles with sides 4 : 16 : 10 and 2 : 8 : 5.

8. Similar?



9. Are two squares similar if one has a side = 10 cm and the other has a side = 6 cm?

Find the scale factor for each of the following.

10. **Boy:** 72 inches and **Action Figure:** 6 inches **FIND THE SCALE FACTOR FOR THE BOY (figure to boy):**

- A. $\frac{1}{12}$ B. $\frac{1}{10}$ C. $\frac{1}{7}$ D. $\frac{12}{1}$

11. **Dog:** 24 inches and **Stuffed Animal:** 8 inches **FIND THE SCALE FACTOR FOR THE STUFFED ANIMAL (dog to stuffed animal):**

- A. $\frac{3}{1}$ B. $\frac{1}{4}$ C. $\frac{1}{3}$ D. $\frac{1}{5}$

12. Identify the Scale factor of the Flute.
(piccolo : flute)

Flute	Piccolo
36	18

13. Identify the Scale factor of the map.
(actual : map)

Map Distance	Actual Distance
1 inch	50 miles

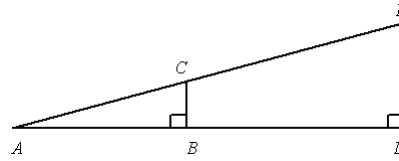
14. Identify the Scale factor of the Ukulele.
(guitar : ukulele)

Guitar	Ukulele
36	18

Using what you know about proportions, solve the following.

15. Standing next to each other, a 48-inch tall gorilla and a black bear cast shadows that are 87 inches and 103 inches, respectively. What is the height of the black bear, to the nearest tenth of inch?

16. If length AB is 16 cm, BD is 19 cm, and CB is 8 cm, then what is the length of ED?



ANSWER SHEET

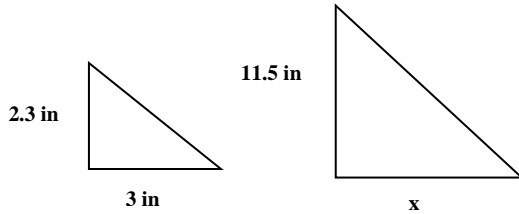
15. _____

16. _____

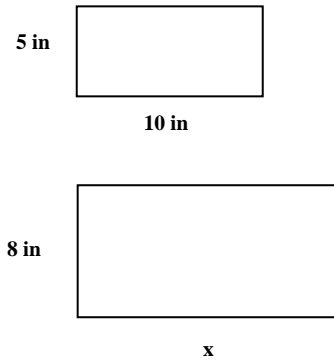
17. _____

18. _____

17. The two triangles are similar. Find the measurement for x .



18. These figures are similar. Find the value of x .



19. _____

20. _____

19. In order to determine the height of the flagpole in the school yard, Cindy is going to use similar triangles. The length of Cindy's shadow is 3 feet. Measuring the length of the shadow of the pole at the same time, she finds it to be 12 feet. Using this information and the fact that Cindy's height is 5.5 feet, give the height of the pole to the nearest hundredth of a foot.

20. A flagpole casts a shadow that is 14 feet long. At the same time a 4-foot-tall bench casts a shadow that is 5.6 feet long. How tall is the flagpole?