

### Chapters 3 & 8 (Geometry) Final Review

#### Multiple Choice

Identify the choice that best completes the statement or answers the question.

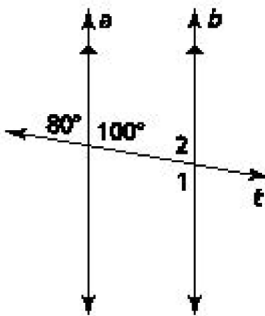
**Find the sum of the interior angle measures of the polygon.**

\_\_\_\_ 1.



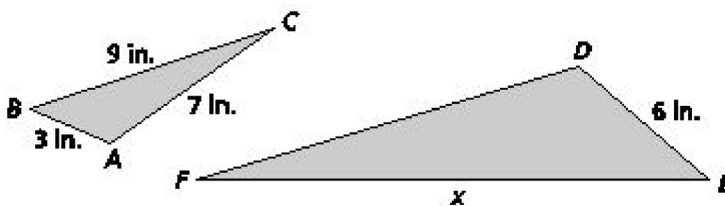
- a.  $360^\circ$
- b.  $720^\circ$
- c.  $380^\circ$
- d.  $270^\circ$

\_\_\_\_ 2. What is the measure of  $\angle 1$ ?



- a.  $80^\circ$
- b.  $90^\circ$
- c.  $100^\circ$
- d.  $180^\circ$

\_\_\_\_ 3. The figures are similar.



What is the value of  $x$ ?

- a. 2 inches
- b. 7.7 inches
- c. 14 inches
- d. 18 inches

Name: \_\_\_\_\_

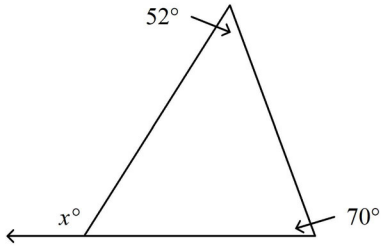
ID: A

\_\_\_\_ 4. What value of  $x$  makes the equation below true?

$$\frac{x}{2} - 6 = -14$$

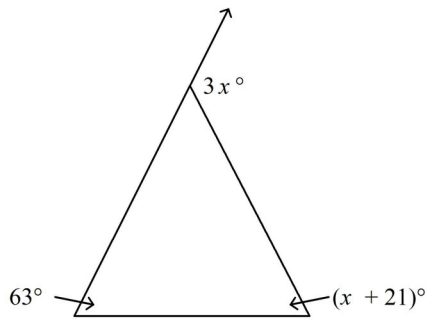
- a. -40
- b. -16
- c. -10
- d. -4

\_\_\_\_ 5. Find the measure of the exterior angle.



- a.  $70^\circ$
- b.  $52^\circ$
- c.  $122^\circ$
- d.  $58^\circ$

\_\_\_\_ 6. Find the measure of the exterior angle.

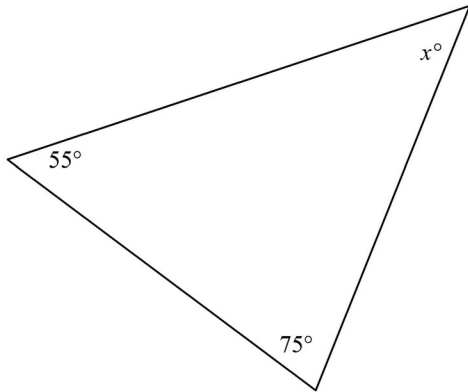


- a.  $126^\circ$
- b.  $42^\circ$
- c.  $24^\circ$
- d.  $63^\circ$

Name: \_\_\_\_\_

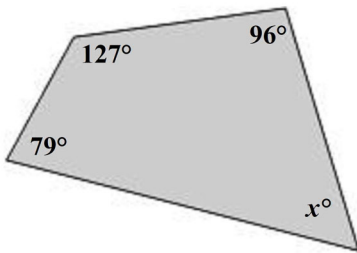
ID: A

\_\_\_\_ 7. Find the measure of the interior angle.



- a.  $45^\circ$
- b.  $130^\circ$
- c.  $55^\circ$
- d.  $50^\circ$

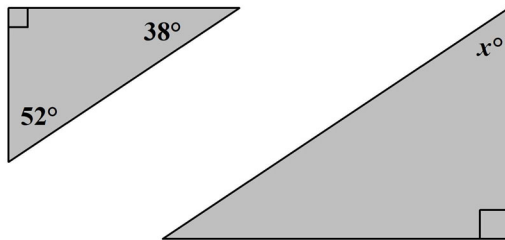
\_\_\_\_ 8.



- a.  $58^\circ$
- b.  $360^\circ$
- c.  $63^\circ$
- d.  $418^\circ$

**The triangles are similar. Find the value of  $x$ .**

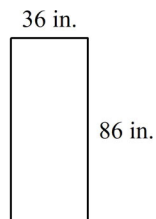
\_\_\_\_ 9.



- a. 38
- b. 14
- c. 90
- d. 52

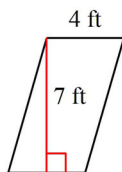
**Find the area.**

\_\_\_\_ 10.



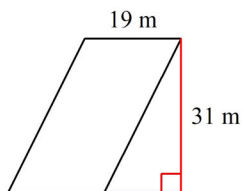
- a. 3,058 in.<sup>2</sup>                      c. 244 in.<sup>2</sup>  
b. 1,548 in.<sup>2</sup>                      d. 3,096 in.<sup>2</sup>

\_\_\_\_ 11.



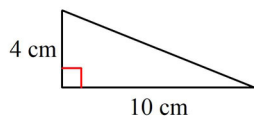
- a. 22 ft<sup>2</sup>                              c. 28 ft<sup>2</sup>  
b. 14 ft<sup>2</sup>                              d. 29 ft<sup>2</sup>

\_\_\_\_ 12.



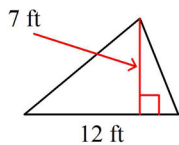
- a. 294.5 m<sup>2</sup>                          c. 589 m<sup>2</sup>  
b. 100 m<sup>2</sup>                              d. 594 m<sup>2</sup>

\_\_\_\_ 13.



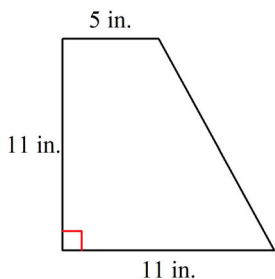
- a. 14 cm<sup>2</sup>                              c. 20 cm<sup>2</sup>  
b. 28 cm<sup>2</sup>                              d. 40 cm<sup>2</sup>

\_\_\_\_ 14.



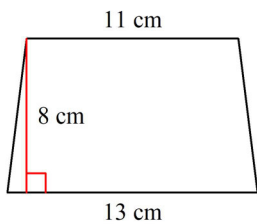
- a. 19 ft<sup>2</sup>
- b. 42 ft<sup>2</sup>
- c. 38 ft<sup>2</sup>
- d. 84 ft<sup>2</sup>

\_\_\_\_ 15.



- a. 88 in.<sup>2</sup>
- b. 27 in.<sup>2</sup>
- c. 8 in.<sup>2</sup>
- d. 121 in.<sup>2</sup>

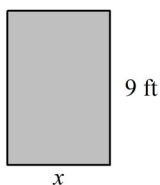
\_\_\_\_ 16.



- a. 12 cm<sup>2</sup>
- b. 104 cm<sup>2</sup>
- c. 96 cm<sup>2</sup>
- d. 32 cm<sup>2</sup>

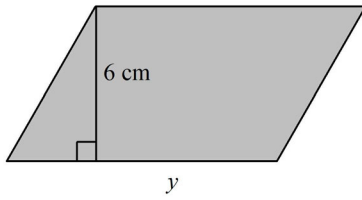
**Write and solve an equation to find the missing dimension of the figure. Check your solution.**

\_\_\_\_ 17. Area = 54 ft<sup>2</sup>



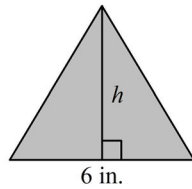
- a. 486 ft
- b. 6 ft
- c. 18 ft
- d. 7 ft

\_\_\_ 18. Area =  $60 \text{ cm}^2$



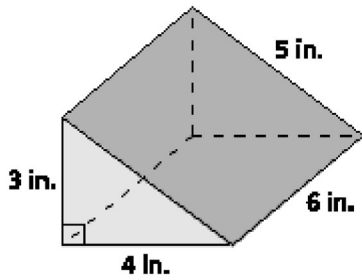
- a. 12 cm
- b. 10 cm
- c. 24 cm
- d. 20 cm

\_\_\_ 19. Area =  $15 \text{ in.}^2$



- a. 5 in.
- b. 2.5 in.
- c. 3 in.
- d. 7.5 in.

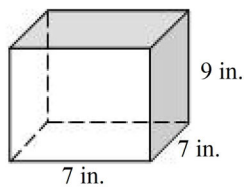
\_\_\_ 20. A right triangular prism and its dimensions are shown below. What is the total surface area, in square inches, of the right triangular prism?



- a. 84
- b. 96
- c. 180
- d. 360

**Find the surface area of the prism.**

\_\_\_ 21.



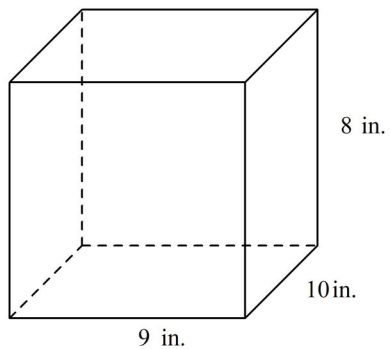
- a.  $301 \text{ in.}^2$
- b.  $175 \text{ in.}^2$
- c.  $350 \text{ in.}^2$
- d.  $287 \text{ in.}^2$

Name: \_\_\_\_\_

ID: A

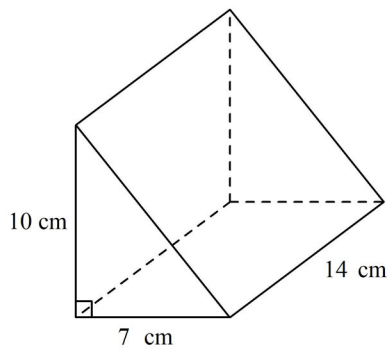
**Find the volume of the prism.**

\_\_\_ 22.



- a.  $108 \text{ in.}^3$
- b.  $27 \text{ in.}^3$
- c.  $320 \text{ in.}^3$
- d.  $720 \text{ in.}^3$

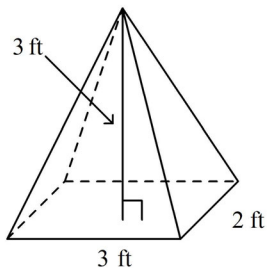
\_\_\_ 23.



- a.  $980 \text{ cm}^3$
- b.  $490 \text{ cm}^3$
- c.  $31 \text{ cm}^3$
- d.  $132 \text{ cm}^3$

**Find the volume.**

\_\_\_ 24.



- a.  $8 \text{ ft}^3$
- b.  $6 \text{ ft}^3$
- c.  $9 \text{ ft}^3$
- d.  $3 \text{ ft}^3$

**Chapters 3 & 8 (Geometry) Final Review  
Answer Section**

**MULTIPLE CHOICE**

1. A
2. C
3. D
4. B
5. C
6. A
7. D
8. A
9. D
10. D
11. C
12. C
13. C
14. B
15. A
16. C
17. B
18. B
19. A
20. A
21. C
22. D
23. B
24. B