1. Thom has a scale model of his car. The scale factor is $1: 12$. If the actual car has 16 -inch wheels, what size are the wheels on the scale model?
A. 1.3 in

2. An architect created the scale drawing below showing a wall of a child's playhouse. If the scale of the drawing is $1 \mathrm{in}=6 \mathrm{ft}$, what is the actual width of the playhouse?
A. 18 ft
B. 12 ft
C. 6 ft
D. 24 ft

3. On a scale drawing, the scale is $\frac{1}{2}$ inch $=1$ foot. What are the dimensions on the scale drawing for a room that is 22 feet by 17 feet?
A. $\frac{17}{12}$ in. by $9 \frac{1}{2}$ in
B. $5 \frac{1}{2}$ in. by $4 \frac{1}{4} \mathrm{in}$.
C. $1 \frac{5}{17}$ in. by $1 \frac{1}{3}$ in.
D. 11 in . by $8 \frac{1}{2} \mathrm{in}$.
4. On a map, the scale is 1 inch $=125$ miles. What is the actual distance between two cities if the map distance is 4 inches?
A. 525 mi
B. 505 mi
C. 500 mi
D. $281 \frac{1}{4} \mathrm{mi}$
5. What is the scale factor of a drawing if the scale is 1 inch $=6$ feet?
A. $\frac{1}{72}$
B. $\frac{1}{6}$
C. 6
D. 72
6. On a scale drawing, the scale is $\frac{1}{4}$ inch $=1$ foot. What are the dimensions on the scale drawing for a room that is 15 feet by 16 feet?
A. $3 \frac{3}{4}$ in. by 4 in .
B. $5 \frac{1}{4}$ in. by $3 \frac{1}{4} \mathrm{in}$.
C. $4 \frac{3}{4}$ in. by $2 \frac{1}{3}$ in.
D. 8 in. by $8 \frac{1}{2} \mathrm{in}$.
7. The house shown below was drawn using a scale of $2 \mathrm{in}=5 \mathrm{ft}$. What is the actual height of the house?

A. $21 \frac{1}{4} \mathrm{ft}$
B. $21 \frac{1}{4} \mathrm{in}$
C. 85 ft
D. 3.4 ft
8. What is the scale factor in problem \#7?
A. $2: 5$
B. $1: 30$
C. $1: 60$
D. $4: 15$
9. On a blueprint, a guest bedroom has dimensions 3 cm by 5 cm . If the blueprint is drawn using the scale of $1 / 2 \mathrm{~cm}=2 \mathrm{ft}$, what is the actual AREA of the guest bedroom?
A. 12 square ft
B. 20 square ft
C. 240 square ft
D. 15 square ft
10. What is the perimeter of the guest bedroom mentioned in \#9?
A. 16 feet
B. 64 feet
C. 32 feet
D. 240 feet
11. A model airplane is made using a scale of $11 / 2$ inches $=10$ feet. What is the scale factor?
A. $3: 20$
B. 3: 10
C. $1: 80$
D. $1: 60$
12. A map has a scale of $1 / 2$ inch $=75$ miles. If two cities are $33 / 4$ inches apart, how many miles apart are they really?
A. 562.5 miles
B. 140.625 miles
C. 40 miles
D. 325 miles
13. Andrew can walk a distance of 9 km in 4 hours. How long would he take to cover a distance of 13.5 km?
A. 7 hours
B. 6.5 hours
C. 5.5 hours
D. 6 hours
14. William jogs 11 km in 5 hours. How long would he take to cover a distance of 16.5 km ?
A. 7 hours
B. 7.5 hours
C. 8 hours
D. 8.5 hours
15. Sunny can read 60 pages in 5 hours. How many pages can he read in 7 hours?
A. 96 pages
B. 72 pages
C. 48 pages
D. 84 pages
16. Sam can cover a distance of 12 km in 2 hours by walking. How much distance can he cover in 4 hours?
A. 20 km
B. 28 km
C. 24 km
D. 26 km
17. A machine produces 24 items in 4 hours. How many items does the machine produce in 6 hours?
A. 40 items
B. 38 items
C. 32 items
D. 36 items
18. Nathan bought 4 pounds of chicken for $\$ 8$. How many pounds can he buy for $\$ 20$ ?
A. 32 pounds
B. 10 pounds
C. 8 pounds
D. 12 pounds
19. A model of a dinosaur skeleton was made using a scale of 1 in . : 12 in . in a museum. If the size of the tail of the dinosaur in the model is 6 in., then find the actual length of its tail.
A. 60 in
B. 72 in
C. 62 in
D. 18 in
20. A model of a house was drawn using a scale 2 in. $=12 \mathrm{ft}$. If the model measures 10 inches in length, then find the actual length of the house.
A. 120 ft
B. 60 ft
C. 2.4 ft
D. 24 ft
