

Section 2.4: Applications of Ratios

1. The ratio of the height of an object in a photograph to the actual height is 1:100.
The height of a statue in the photograph is 5 cm. How tall is the statue?
2. At a certain time of day, a person's shadow is twice her height.
 - a) What ratio describes this relationship?
 - b) At this time of day, Gene's shadow measures 320 cm. What is his height?
3. A model car is constructed using a scale of 1 cm to 0.20 m.
 - a) What is the ratio of a length on the model to the length on the car?
 - b) The length of the model car is 15 cm. How long is the car?
4. A flea is very difficult for the human eye to see.
Jose looks at a drawing of a flea in a book.
The drawing uses the scale 5:1.
The actual length of a flea is 2 mm. How long is the drawing?
5. A scale on a map is 1 cm to 250 km. What does this mean?
6. When Tammy was 4, the ratio of Tammy's age to her father's age was 1:7. What will the ratio of their ages be when Tammy's father is 48?