1) Mary and Kate picked up a map of the zoo at the main entrance. The actual distance between the entry point and the Avian Center was 2.3 miles. The distance on the map was 9.2 inches. Determine the scale factor that was used to design the map.

2) Fiona used a scale factor of 1 foot = 0.8 inch to make a scale drawing of a park in the neighborhood. She drew a slide that was 6 inches long. Find the actual length of the slide.

3) A theme park in Washington, D.C., has various exhibits on popular monuments. The Washington Monument stands 554.7 feet tall. If the exhibit of the monument was created with a scale factor of 1 inch = 64.5 feet, determine the height of the exhibit.

4) Amanda and her friends used a hand-curated trail map and went on a hike to a nearby waterfalls. The actual distance between the start point and the waterfalls was 89 miles. The distance was scaled down to 178 inches on the map. Determine the scale factor used.

5) Isabel built a miniature house with dominoes based on the actual dimensions of her house. She used a scale factor of 1 inch = 1.55 feet and her miniature house measured 16.8 inches in height. Find the original height of the house.
1) Mary and Kate picked up a map of the zoo at the main entrance. The actual distance between the entry point and the Avian Center was 2.3 miles. The distance on the map was 9.2 inches. Determine the scale factor that was used to design the map.

\[ \text{Scale factor} = \frac{0.25 \text{ mile}}{1 \text{ inch}} = 0.25 \text{ mile/inch} \]

2) Fiona used a scale factor of 1 foot = 0.8 inch to make a scale drawing of a park in the neighborhood. She drew a slide that was 6 inches long. Find the actual length of the slide.

\[ \text{Actual length} = \frac{6 \text{ inches}}{0.8} = 7.5 \text{ inches} \]

3) A theme park in Washington, D.C., has various exhibits on popular monuments. The Washington Monument stands 554.7 feet tall. If the exhibit of the monument was created with a scale factor of 1 inch = 64.5 feet, determine the height of the exhibit.

\[ \text{Height of exhibit} = \frac{554.7 \text{ feet}}{64.5} = 8.6 \text{ inches} \]

4) Amanda and her friends used a hand-curated trail map and went on a hike to a nearby waterfalls. The actual distance between the start point and the waterfalls was 89 miles. The distance was scaled down to 178 inches on the map. Determine the scale factor used.

\[ \text{Scale factor} = \frac{0.5 \text{ mile}}{1 \text{ inch}} = 0.5 \text{ mile/inch} \]

5) Isabel built a miniature house with dominoes based on the actual dimensions of her house. She used a scale factor of 1 inch = 1.55 feet and her miniature house measured 16.8 inches in height. Find the original height of the house.

\[ \text{Original height} = 16.8 \text{ inches} \times 1.55 = 26.04 \text{ feet} \]