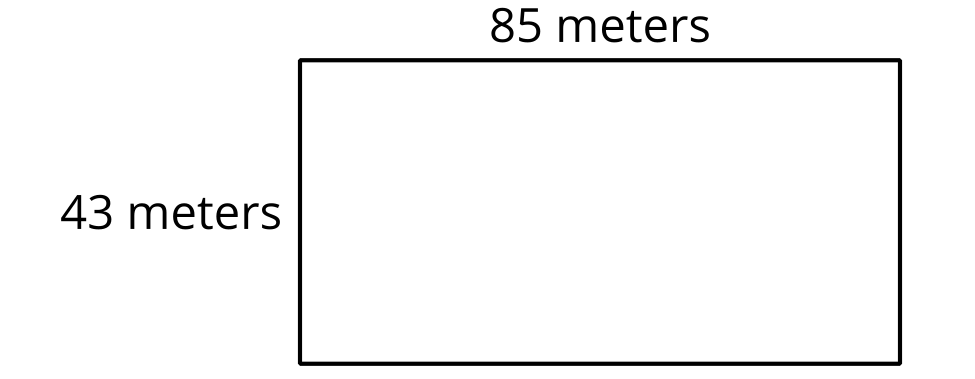
### Section D: Practice Problems

* 1. An author took a 4-hour airplane flight for a work trip. The plane flew 478 miles each hour. How many miles did she travel?
  2. A photographer took a 4-hour drive for his work trip. The car traveled 57 miles each hour. How many miles did he travel?
  3. How many miles further did the author travel than the photographer?
* (From Unit 6, Lesson 21.)

1. The diagram shows the side lengths of a sports field.
   1. What is the perimeter of the field? Explain or show your reasoning.
   * 
   1. What is the area of the field? Explain or show your reasoning.

* (From Unit 6, Lesson 22.)

1. The table shows the number of students who have different numbers of pets at a school.

* How many pets do all the students have together? Explain or show your reasoning.

|  |  |
| --- | --- |
| * number of pets | * number of students |
| * 1 | * 218 |
| * 2 | * 167 |
| * 3 | * 287 |
| * 4 | * 138 |

* (From Unit 6, Lesson 23.)

1. A builder is covering the floor of a rectangular room that is 23 feet by 25 feet with tiles that are 1 foot by 1 foot. The tiles are sold in boxes of 12.

* Diego says 59 boxes are needed to cover the floor, and that there will be a few leftover tiles.
  1. Is Diego's answer reasonable? Explain or show your reasoning.
  2. How many boxes of tiles would you get to cover this floor? Explain or show your reasoning.
* (From Unit 6, Lesson 24.)

1. Exploration

* Find a rectangular room at home or in the school.
  1. Which unit would you choose for measuring the length and width: inches, feet, or yards? Explain your reasoning.
  2. Measure the length and width to the nearest whole number.
  3. Find the perimeter and area of the room.
  4. Can you find a length and width pair for a room that would have the same perimeter but a different area?
  5. Can you find a length and width pair for a room that would have the same area but a different perimeter?

1. Exploration

* The area of a rectangle is 720 square centimeters. One side is 6 centimeters longer than the other. What is the perimeter of the rectangle? Explain or show your reasoning.



© CC BY 2021 Illustrative Mathematics®