Rutgers Learning Centers

At Camden Campus

MATH: TEXTBOOK READING

Textbook example worksheet

When reading through a math or science textbook, you will encounter many examples. They are meant to help you understand concepts. The following method will help you get the most out of most examples.

- 1. Read the entire textbook example below. Now read just the question.
- 3. Write out the question to be solved. Compare your version with original.

Textbook example

Question:

A ladder is placed against a wall at a height of four feet up the wall and three feet from the wall on the ground. What is the length of the ladder

4. Work out the problem on your own.

Solution:

The ladder makes a triangle with the wall and the ground. We identify the height up the wall and the distance the base of the ladder is from the wall with the sides of the triangle. The length of the ladder will be the hypotenuse of our triangle. Using the Pythagorian theorem: $c^2 = a^2 + b^2$,

and substitution:

a = height up wall = 4

b = distance from wall = 3

c = length of ladder

$$c^2 = 4^2 + 3^2 = 16 + 9 = 25$$

$$c^2 = 25$$

$$c = 5$$

The length of the ladder is five feet.

6. Write the formula you used. Identify any problems you had using it.

Compare your solution with the example's.

2. Fold the paper in half. Go to 3.

5.