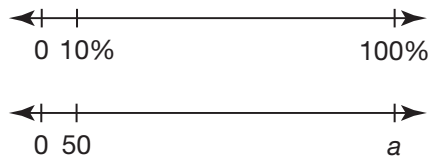# Applying Percents: Finding the Whole

You can draw a number line model to help you solve this problem:

>   Darlene spent 10% of her allowance and saved the rest.
>   The amount she spent was 50 cents. How much is
>   Darlene's allowance?

In the problem, 50 cents is the part and 10% is the percent.
You need to find Darlene's allowance, *a.*



The model shows 10% as the percent, 50 cents as the part, and *a*,
the whole you are trying to find.

A proportion can also help you find the whole.

$\frac{10}{100} = \frac{50}{a}$

$a = 500$

500 cents = $5.00

Darlene's allowance is $5.00.

Think: 10 times what number equals 50?
Since 10 × 5 = 50, then
multiply 100 × 5 to get 500.

For **1** through **3**, draw a number line model to help you solve the
problem.

**1.** Li rode her bike 25% of the way to school. She rode 5 blocks. How
many blocks does Li live from school?

_____

**2.** Bob brought 40% of the collected canned goods to the food pantry. If
Bob brought 160 cans to the pantry, how many cans were collected?

_____

**3.** Sid memorized 60% of his lines for the class play. He memorized
60 lines. How many lines long was Sid's part in the play?

_____