Introducing Percents

CCSS: 6.RP.A.3c: Find a percent of a quantity as a rate per 100 (e.g., 30% of a quantity means $\frac{30}{100}$ times the quantity); solve problems involving finding the whole, given a part and the percent.

Launch

© MP4, MP7

Describe two part-to-whole situations that could relate to each ratio. Use words to describe one situation. Use a picture to describe the other situation.
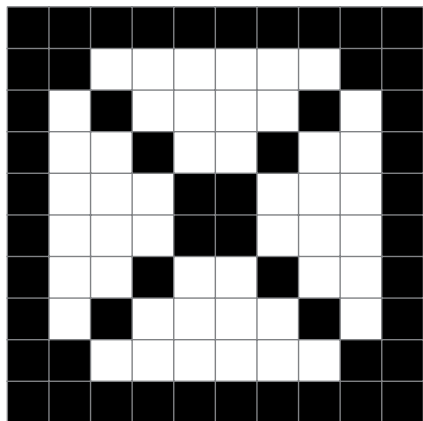
$$\frac{0}{100} \qquad \frac{50}{100} \qquad \frac{100}{100}$$

Words

Picture

Reflect Would the task have been different if the ratios were $\frac{0}{92}$, $\frac{46}{92}$, and $\frac{92}{92}$? Explain.

Got It?

PART 1 Got It

What percent of the crossword puzzle is black?

PART 2 Got It

Write $\frac{3}{100}$ as a percent.

Got It?

PART 3 Got It (1 of 2)

At your last soccer game, 15 out of every 20 spectators wore sunglasses. What percent of the spectators wore sunglasses?

PART 3 Got It (2 of 2)

At the same soccer game where 15 out of every 20 spectators were wearing sunglasses, 18 out of every 25 spectators were wearing hats. Were hats or sunglasses more popular?
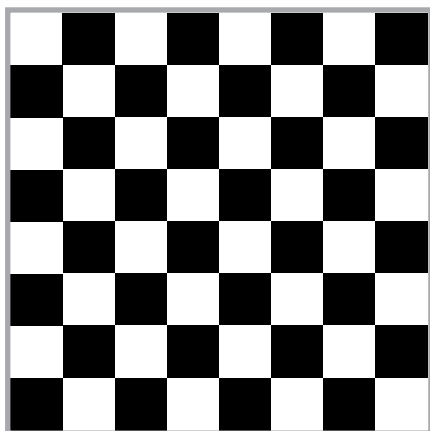
Close and Check

Focus Question

© MP1, MP3

What is a common language for comparing ratios? What is the value of having a common language for comparing ratios?

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Do you know HOW?

1. Look at the checkerboard below. What percent of the squares are white?

[____] %

2. Complete the table.

Ratio	Fraction	Percent
7 : 10	$\frac{}{100}$	70%
4 : 5	$\frac{}{100}$	[__] %
8 : [__]	$\frac{32}{100}$	[__] %
[__] : 50	$\frac{}{100}$	6%
9 : [__]	$\frac{}{100}$	45%

Do you UNDERSTAND?

3. Writing How does using percents help when comparing the ratios 7 out of 20 and 11 out of 25?

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4. Error Analysis At a football game, 21 out of 25 people wore a red shirt. Your friend states that 4% of the people did not wear a red shirt. Explain the mistake your friend made. What percent of people did not wear a red shirt?

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