

Percentage Decrease Word Problem Guided Lesson Explanation

For all of the problems we need to determine the percentage decrease. We can use this simple formula to help us:

$$\frac{\text{difference of values}}{\text{larger value}} \times 100\%$$

1. Joe drank 12 cups of coffee (last week), 5 cups (this week).

$$\frac{12-5}{12} \times 100\% = \frac{7}{12} \times 100\% = 0.5833 \times 100\% = 58.33\% \text{ (58\% less coffee)}$$

2) Joe overtime pay = \$683, no overtime pay = \$512

$$\frac{683-512}{683} \times 100\% = \frac{171}{683} \times 100\% = 0.25 \times 100\% = 25\% \text{ less pay}$$

3) Order pizza = 26 pieces of pepperoni, Joe's pizza 6 pieces of pepperoni.

$$\frac{26-6}{26} \times 100\% = \frac{20}{26} \times 100\% = 0.7692 \times 100\% = 76.92\% \text{ (77\% less coffee)}$$

