DUE JANUARY 5th! Name_____ ID: 1

Beat the Basics 5

Date_____ Algebra____

Evaluate each expression.

1) $3 \cdot (5 \cdot 3) \div 5$

2) $3^2 - (5 - 1)$

Evaluate each using the values given.

3) $y - x - x$; use $x = 1$, and $y = 3$

4) $3 - (b - a)$; use $a = 5$, and $b = 5$

Write each as an algebraic expression.

5) the quotient of q and 8

6) the product of u and 7

7) the difference of 15 and 4

8) x squared

Evaluate each expression.

9) $-8 - -\frac{2}{3}$

10) $\frac{7}{6} + -\frac{1}{2}$

11) $\frac{6}{5} - \frac{1}{4}$

12) $\frac{2}{3} + \frac{7}{5}$

13) $-\frac{4}{5} \cdot -\frac{1}{4}$

14) $-\frac{1}{9} \cdot -\frac{5}{3}$

15) $\frac{-11}{10} \div \frac{-3}{8}$

16) $2 \div \frac{-10}{9}$

Solve each equation.

17) $4 + \frac{n}{10} = 3$

18) $-5 = \frac{x - 8}{2}$

19) $8 = \frac{p}{3} + 3$

20) $2 + 8r - r = 2$

21) $6x - 11 = 3 - 8(-5x + 6)$

22) $\frac{13}{30} = \frac{3}{2}x + \frac{4}{3}$

Round each to the place indicated.

23) 8.2125; hundredths

24) 3.21944; thousandths

Solve each of the following word problems by any method. Show all of your work. Answer each question in a full sentence.

25) The currency in Poland is the Zlotych. The exchange rate is approximately 18 Zlotych to $6. At this rate, how many Zlotych would you get if you exchanged $12?

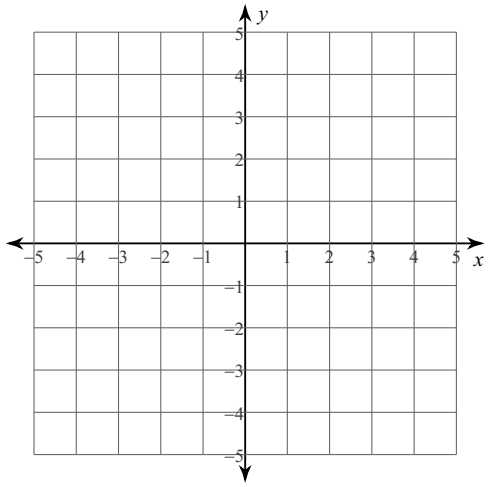
26) The currency in Peru is the Nuevo Sole. The exchange rate is approximately $6 = 19 Nuevos Soles. At this rate, how many Nuevos Soles would you get if you exchanged $12?

27) Adam had some candy to give to his three children. He first took six pieces for himself and then evenly divided the rest among his children. Each child received three pieces. With how many pieces did he start?

28) Joe wanted to make note cards by cutting pieces of paper in half. Before starting he got six more pieces to use. When he was done he had 30 half-pieces of paper. With how many pieces did he start?

For number 29: Plot each point and label it with the correct letter.
For number 30: State the coordinates of each point and lable with the correct letter.

29) $J(-3, -4)$ $I(5, 3)$ $H(-3, -2)$
$G(3, 3)$ $F(3, -1)$



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