

Math 200 - Quiz 5

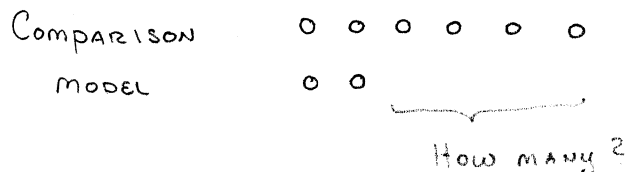
March 3, 2010

Name key

Score _____

Show all work. Supply explanations when necessary.

1. (1 point) Use a subtraction model to model $6 - 2$. Explain.



$6 - 2 = 4$
BECAUSE 6 IS
4 MORE THAN 2.

2. (1 point) State the whole number addition property that justifies each of the following. Explain your reasoning.

(a) $(1 + 3) + 2 = (3 + 1) + 2$



$1 + 3 = 3 + 1$ COMMUTATIVE PROPERTY -- CHANGED ORDER OF 3 & 1

(b) $(2 + 7) + (8 + 9) = (8 + 9) + (2 + 7)$

COMMUTATIVE PROPERTY -- CHANGED ORDER OF $(2+7)$ & $(8+9)$

3. (1 point) Find a digit to replace the x so that $3x5_{\text{seven}} = 180$.

$$3 \cdot 49 + x \cdot 7 + 5 = 180$$

$$147 + 7x + 5 = 180 \rightarrow 7x + 152 = 180$$

$$7x = 28 \Rightarrow \boxed{x = 4}$$

4. (1 point) Use the missing addend model to model $8 - 5$.

$8 - 5 = \square$ MEANS THE SAME AS

$\square + 5 = 8$. $\square = 3$

5. (1 point) Briefly describe, with an example, one of the following addition fact strategies: counting on, doubles, making 10.

COUNTING ON:

$8 + 2 = 10$

COUNT ON 2 FROM 8:



DOUBLES:

$6 + 5 = 11$

MAKE DOUBLES TO MAKE IT EASIER

$6 + 5 = 1 + 5 + 5 = 1 + 10 = 11$

MAKING 10:

$7 + 4$

MAKE 10 TO MAKE IT EASIER

$7 + 4 = 7 + 3 + 1 = 10 + 1 = 11$