Name: _____ Period: ____ 6th Math 4/24 TUES

STAAR REVIEW HOMEWORK #2

☺ Please show work for EVERY problem. ☺

1 Which pair of expressions are equivalent?

A 14 x (8 + 3) *and* (14 x 8) + 3

B 19 – (6 x 3) *and* (19 – 6) x 3)

C 18 – (7 + 5) *and* (18 – 7) + 5

D 17 – (9 +3) *and* 17 - (3 + 9)

HINT: Solve each expression. Two will be equal.

2 A bunch of grapes weighed 0.95 pounds. Which fraction is equivalent to the weight of the grapes in pounds?

F $\frac{19}{95}$ *lb*

G $\frac{95}{10}$ *lb*

H $\frac{19}{100}$ *lb*

J $\frac{19}{20}$ *lb*

HINT: First, say the decimal correctly. Then, write the fraction. Finally, simplify.

3 The stem-and-leaf plot shows the number of text messages sent one day.

Number of Messages

Stem	Leaf
1	6
2	0 9
3	2 3 3 6
4	1

2|5 means 25 text messages

Which statement about the data is true?

A The mean is 30, and the range is 25.

B The mean is 33, and the range is 15.

C The mean is 32, and the range is 21.

D The mean is 25, and the range is 30.

HINT: First, write your numbers least to greatest. Then, find the range and the mean.

4 Which expression best shows the prime factorization of 750?

F $2 \times 3 \times 5^3$

G $2 \times 3 \times 5^2$

H $2 \times 3 \times 5 \times 25$

J $2 \times 3 \times 5^2 \times 25$

HINT: Draw a factor tree for 750.

5 Micah used a formula to find the total cost, in dollars, for repairs she and her helper, Kaylon, made to a furnace. The expression below shows the formula she used, with 4 being the number of hours she worked on the furnace and 2 being the number of hours Kaylon worked on the furnace.

$$20 + 35\ (4 + 2) + 47$$

What is the total cost for repairing the furnace?

A $189

B $269

C $277

D $377

HINT: Use PEMDAS to solve.