EQUIVALENT EXPRESSIONS

SIMPLIFY THE FOLLOWING EXPRESSIONS. SHOW ALL OF YOUR WORK!

1. -8(-5b+7)+5b

2. 10x+36-38x-47y

3. -16-10(19c+17)

4. 0.2s + 3(1.2r-3.3s)

5. $\frac{1}{3}$t - $\frac{2}{3}$t(5-3r)

6. 15.7 + (3x-5.2x)-5.3

FOR EACH OF THE FOLLOWING QUESTIONS, DETERMINE IF THE TWO EXPRESSIONS ARE EQUIVALENT OR NOT. SHOW ALL OF YOUR WORK!

7. 5+3(1-x) & 8-8x

8. 2(6-3x)+x & 2(3x)+x

9. 1+4(3x-10)-12x & -9

10. 0.125-10(0.75-0.375x)+0.625x & -0.125(59-35x)

ANSWER THE FOLLOWING QUESTIONS. SHOW ALL OF YOUR WORK!

11. THE WIDTH OF A RECTANGLE IS REPRESENTED BY 5+2y. THE LENGTH IS TWICE AS LONG AS THE WIDTH. WHAT IS THE PERIMETER OF THE RECTANGLE? CHOOSE ALL THAT APPLY.

A. 4(5+2y)

B. 6(5+2y)

C. 20+8y

D. 30+12y

12. TELL WHETHER EACH STATEMENT IS TRUE OR FALSE. CIRCLE THE CORRECT RESPONSE.

A. 2(3-4y)=6-4y   TRUE OR FALSE

B. 3+5(9+2n)=48+5n   TRUE OR FALSE

C. 9-3(y-2)=3-3y   TRUE OR FALSE

D. 3(6x-2)-7=18x-13   TRUE OR FALSE