1. Draw the X and Y plane with the RULER (Cartesian coordinate system). Mark and then connect the following points with the RULER.

   A(0,0)→ B(6,10)→C(9,0)→D(0,6)→E(12,6)→A(0,0)

2. Compose and solve an equation to answer the following question:

   Lena is 5 years older than Andrew. Sum of their ages is 21. How old is each of them? (*hint: make an auxiliary drawing; make one of the kids an x, write an expression for another one using x, write an equation, just like in the class. Solve it, write the answers: L: and A:*)

3. A cookie costs the same as two packs of chewing gum. Together, a cookie and one pack of gum cost 75 cents. How much does the cookie cost? (*hint: make the cheapest item x and make an auxiliary drawing*).

4. You have a number of 8 - ounce cups and 12 - ounce cups. Would you be able to measure exactly …

      (a) … 28 ounces of water? Show how.

      (b) … 34 ounces of water? Show how.

      (c) … 31 ounces of water?   Show how.

5. Compute: (*surprise your parents by writing an answer to **c.** and **d.** without making a calculation- remember what we learned in the class*)

a. 25×25 b. 27×102 c. $11{,}111 \times 11{,}111$ d. $111{,}111{,}111 \times 111{,}111{,}111$

6. Compute using long division:

1662÷6   1770÷3   1672÷8   1111÷11

7.   A cow weighs 20 times as much as sheep weights. Together the cow and the sheep weights 2100 lb.

a.   How many pounds does the sheep weight?

b. How many pounds does the cow weight?

8. Solve the following equations:

$2x-23=21$ $26+3y=5$ $4z+7=39$

9. There are 93 students in the 1st, 2nd and 3rd grades altogether.

The number of students in the 1st and 2nd grades is 62, and in 2nd and 3rd grades

is 64. How many students are there in each grade?

10. Replace the addition with multiplication:

Example: $x + x + x + x = x \times 4 = 4x$ 15+15+15+15+15=15x5

a. $35 + 35 + 35 + 35 + 35$

b. $a + a + a + a + a + a + a$

c. $x + x + x + x + x$

d. $\underbrace{82 + 82 + \ldots + 82;}_{\text{10 times}}$

e. $\underbrace{82 + 82 + \ldots + 82;}_{\text{100 times}}$

f. $\underbrace{15 + 15 + \ldots + 15;}_{x \text{ times}}$

g. $\underbrace{a + a + \ldots + a;}_{n \text{ times}}$