

## Math 4. Homework 4.



1. Find the numbers that are represented by the figures in the following problems.

A)

1.  $\bigcirc + 12 = \triangle$

2.  $\square : \triangle = 7$

3.  $\triangle + 5 = \hat{\square}$

4.  $4 \cdot \hat{\square} = 100$

B)

1.  $\square : 9 = \square$

2.  $\triangleright + \square = 84$

3.  $3 \cdot \square = 162$

4.  $90 - \bigcirc = \triangleright$

2. Compute using the most convenient way:

$$23 \times 15 + 15 \times 77 =$$

$$79 \times 21 - 69 \times 21 =$$

$$340 \times 7 + 16 \times 70 =$$

$$250 \times 61 - 25 \times 390 =$$

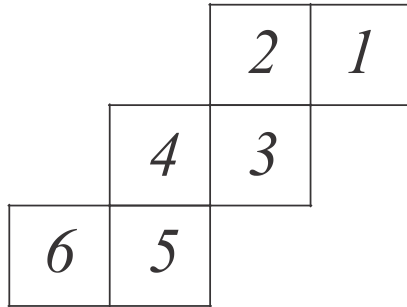
$$67 \times 58 + 33 \times 58 =$$

3. Solve the equations

$$5(x + 25) = 10(x + 10)$$

$$28 - 4x = 50 + 3x - 45$$

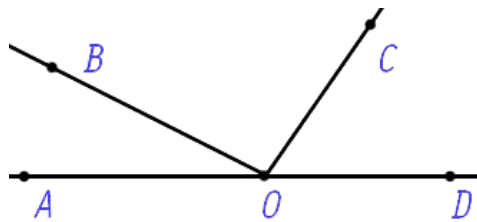
4. On a picture below is the surface of a cube. List three pairs of numbers on the opposite sides of this cube.



5. \* 3 lines intersect at 1 point and form 6 angles. One is  $44^\circ$ , another is  $38^\circ$ . Can you find all other angles?

6. \*Right angle is divided into 3 angles by 2 rays. One of this angles by  $20^\circ$  more than the other and by  $20^\circ$  less the third one. What are the measures of these 3 angles?

7. On the picture below  $\angle BOD = 152^\circ$ ,  $\angle COD = 55^\circ$ , angle  $\angle AOD$  is a straight angle. Find the measures of all other angles on the picture.



8. Draw all possible positions of a circle and a straight line on a plane. How many common points can the circle and the line have? (To draw circles, use a compass, to draw lines always use a ruler!)

**\*9. A goat is tied to a stake in the corner of a building with a 5-yard-long rope. What shape it will graze if the lengths of the walls are as follows:**

1.  $AB = 6$  yards and  $BC = 7$  yards

2.  $AB = 4$  yards and  $BC = 5$  yards

