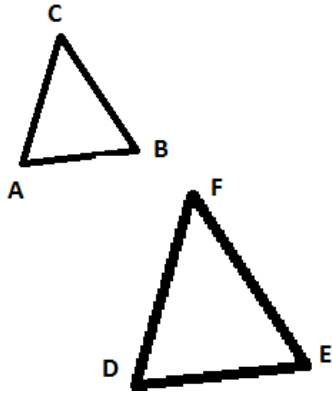


Name: _____
Date: _____
Class: _____

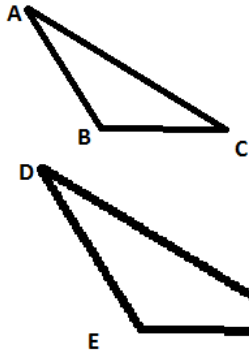
Geometry
Unit 4
HW 4-2

1) If 2 triangles are similar with a scale factor of 4 find the sides of the larger triangle
($\triangle ABC \sim \triangle DEF$)



$$AC = 4, CB = 5, DE = 24$$

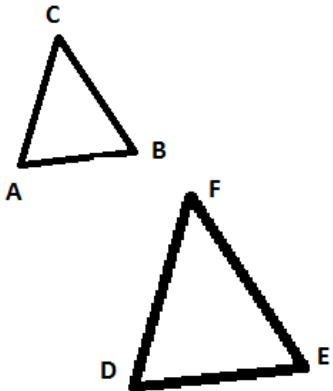
2) Are these triangles similar?



$$AB = 4, AC = 10, BC = 7$$

$$DE = 14, DF = 35, EF = 24.5$$

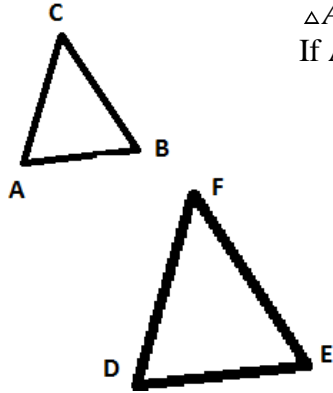
3) If these two triangles are similar find the missing sides ($\triangle ABC \sim \triangle DEF$)



$$AC = 9, CB = 2x - 2, DF = 36, FE = 7x, DE = 33$$

4) Two triangles are similar with the ratio 2:3. If the corresponding sides are represented by $2x + 7$ and $4x - 15$ find each of these sides lengths.

5)

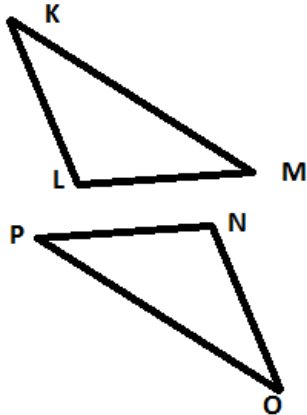


$$\triangle ABC \sim \triangle DEF \quad SF \rightarrow 3:7$$

If $AC = 2x - 3$, $DE = 4x - 8$, and $DF = 3x + 6$, find AB

6) Using the diagram for #5 if $AC = 10$, $DF = 12.5$, $AB = 16$, $DE = 19.2$, and $m\angle C = m\angle F$; is $\triangle ABC \sim \triangle DEF$?

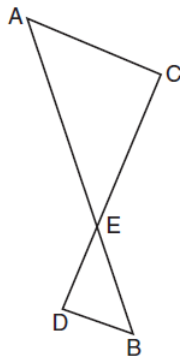
7)



$$\triangle LKM \cong \triangle NOP$$

If $KM = 4x + 6$, $LM = x^2 + x - 1$, and $NP = 2x^2 - 4x + 3$ find OP.

8) As shown in the diagram below, \overline{AB} and \overline{CD} intersect at E , and $\overline{AC} \parallel \overline{BD}$.



Which triangles are similar?
Which sides correspond?