

Complete in this handout:

1. Members of a family decided to invest into their kids' college fund. Each month mom contributes \$200. Dad decided to beat her contribution and contributes \$250 a month. Grandma decided to contribute even more and puts in \$350 each month. Grandpa wants to be the most generous and contributes \$400 each month. How long will it take to accumulate \$60,000 in the college fund?

2. Each noon East and West Camps located 30 km apart send messengers to each other.. This time the messenger from the East Camp can run 9 km/h, while the messenger from the West Camp can run 15 km/h.

I. How long will it take the messenger from the ...

a). ... East Camp to reach the West Camp?

b). ... West Camp to reach the East Camp?

II. When will the two messengers meet?

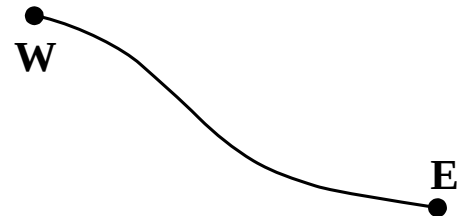
III. How far from the East Camp will the messengers meet?

3. Present as decimal fractions:

$$\frac{1}{10} + \frac{4}{100} + \frac{2}{1000} =$$

$$3 + \frac{2}{10} + \frac{4}{100} + \frac{5}{1000} =$$

$$3 + \frac{2}{10} + \frac{5}{1000} =$$



4. A boat moves 18 km/h in a lake. How long will it take to cover ...

a). ... 63 km in still water?

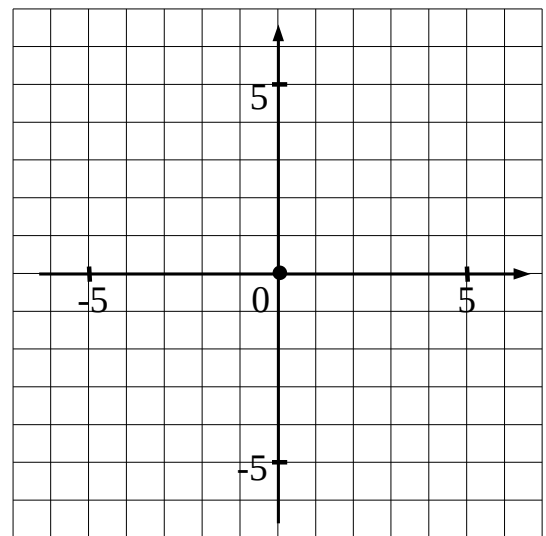
b). ... 48 km when it moves down a river flowing 6 km/h?

c). ... to come back the same 48 km when moving upstream?

5. Plot vectors $\vec{e}=(3,2)$, $\vec{g}=(-1,3)$,
and $\vec{x}=(0,-3)$.

$$\vec{e}+\vec{g}= (\quad , \quad) \qquad \vec{e}+\vec{x}= (\quad , \quad)$$

$$\vec{x}+\vec{g}= (\quad , \quad) \qquad \vec{e}+\vec{e}= (\quad , \quad)$$



Complete in your notebook:

6. Calculate:

$$a) \frac{\frac{1}{2} + \frac{1}{3}}{\frac{1}{2} - \frac{1}{3}} =$$

$$b) \frac{\frac{1}{2} - \frac{1}{3}}{1 - \frac{3}{4}} =$$

$$c) \frac{1 - \frac{7}{12}}{\frac{1}{2} + \frac{1}{4}} =$$

(Answers: 1 – 50 months, 2a – 3 h 20 min, 2b – 2 h, 2-II – 1:15 PM, 2-III – 11¼ km,
4a – 3 h 30 min, 4b – 2 h, 4c – 4 h; 6c – 5, 6b – ⅔, 6c – 5/9)