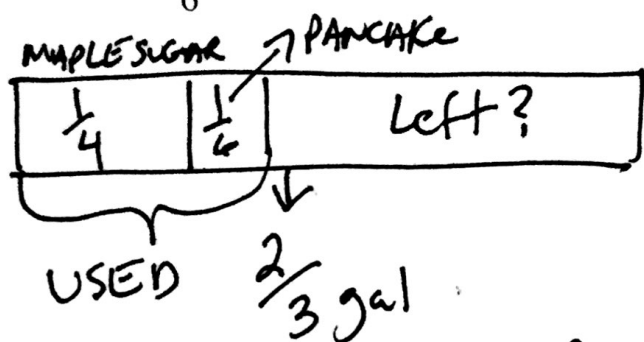


With the remaining  $\frac{2}{3}$  gallon of syrup, he used  $\frac{1}{4}$  gallon making maple sugar and  $\frac{1}{6}$  gallon for pancakes. How much syrup did he have left?



LCM

3, 6, 9, 12  
4, 8, 12  
6, 12

Roberto had  $\frac{1}{4}$  gallon of syrup left

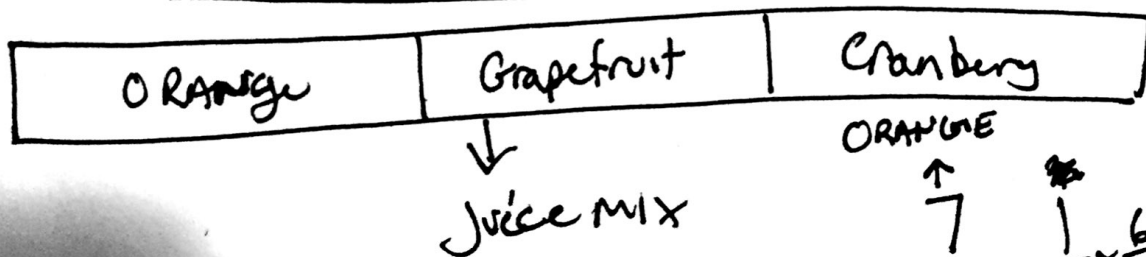
$$\frac{24}{34} \left( \frac{13}{43} + \frac{12}{62} \right) \rightarrow \text{ADD USED}$$

$$\frac{8}{12} - \left( \frac{3}{12} + \frac{2}{12} \right)$$

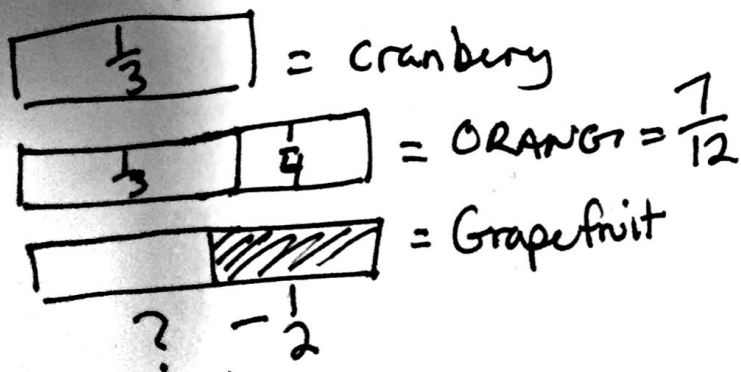
$$\frac{8}{12} - \frac{5}{12} = \frac{3}{12} \text{ or } \frac{1}{4}$$

$$\frac{3}{12} \div \frac{3}{3} = \frac{1}{4}$$

Roberto made a juice mix. He used  $\frac{1}{4}$  gallons less cranberry juice than orange juice. He used  $\frac{1}{2}$  gallons more orange juice than grapefruit juice. If he used  $\frac{1}{3}$  gallons of cranberry juice, how much grapefruit juice did he use?



2, 4, 6, 8, 12



OR ORANGE -  $\frac{1}{2}$   
What is ORANGE?

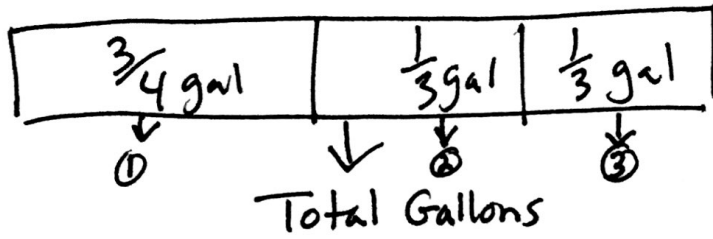
$$\frac{1}{3} \times \frac{4}{4} + \frac{1}{4} \times \frac{3}{3} = \frac{4}{12} + \frac{3}{12} = \frac{7}{12}$$

$$\frac{7}{12} - \frac{1}{2} \times \frac{6}{6} =$$

$$\frac{7}{12} - \frac{6}{12} = \frac{1}{12} \text{ gal}$$

Roberto used  $\frac{1}{12}$  gallons of Grapefruit juice to make his mix

Roberto made three batches of maple syrup. The first batch was  $\frac{3}{4}$  gallon of maple syrup. The next two batches were  $\frac{1}{3}$  gallon each. How much syrup did he make? Draw a diagram to support your answer.



$$\frac{3}{4} + \frac{1}{3} + \frac{1}{3}$$

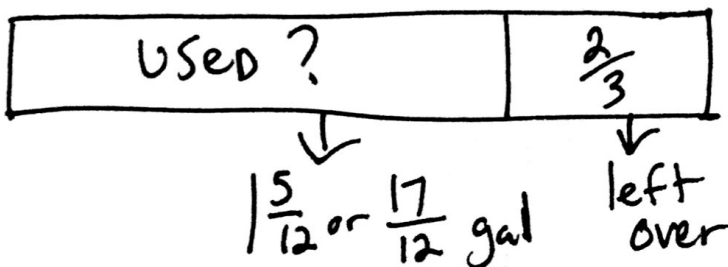
$$\frac{3}{4} \times \frac{3}{3} + \frac{2}{3} \times \frac{4}{4}$$

$$\frac{9}{12} + \frac{8}{12} = \frac{17}{12} = 1 \frac{5}{12} \text{ gal}$$

$$\frac{12}{12} \quad \frac{5}{12}$$

Roberto made  $1 \frac{5}{12}$  gallon of syrup.

Using the syrup he collected, Roberto did some cooking. When he was done, he had  $\frac{2}{3}$  gallon. How much syrup did he use? Explain your answer using a diagram, numbers, and words.



Roberto used  $\frac{3}{4}$  gal of syrup.

$$3, 6, 9, 12$$

$$\frac{17}{12} - \frac{2}{3} \times \frac{4}{4}$$

$$\frac{17}{12} - \frac{8}{12} = \frac{9}{12}$$

Reduce

$$\frac{9}{12} \div \frac{3}{3} = \frac{3}{4}$$