Road Trip Munchies

Four friends are taking a road trip. Bryan spent $36 on snacks for everyone to share, but they had trouble deciding how much each should chip in for the food. Jessica suggested that they split the bill equally, but Sasha didn’t think that was fair because not everyone would eat the same amount. So Kyle volunteered to keep track of what everyone ate so they could split the bill fairly. Kyle found that he ate $\frac{5}{12}$ of the food, Sasha ate $\frac{1}{4}$ and Jessica ate $\frac{1}{6}$.

Answer the following questions. You cannot use a calculator and must show work for your answers.

1. What fraction of the food did Bryan eat?

2. Order the people from the person who ate the least to the person who ate the most.

3. Based on the proportion of what they ate, how much should each person pay?

4. Let $x = \text{the total amount paid for food in dollars}$. Circle each expression below that could be used to represent Sasha’s share of the cost.

| $\frac{1}{4}x$ | $4x$ | $0.25x$ | $\frac{x}{4}$ | $\frac{x}{0.25}$ | $x \div \frac{1}{4}$ |

5. Let $x = \text{the total amount paid for food in dollars}$. Write as many expressions as you can to represent Kyle’s share of the cost.