

Cycle 20

1. Solve the following questions:-

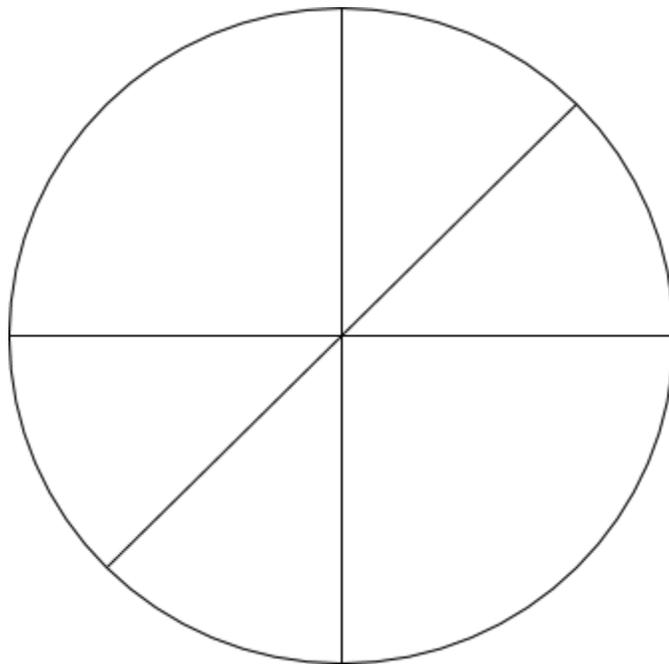
a. $1\frac{2}{3} + 4\frac{3}{5}$

b. $6\frac{1}{4} - 2\frac{1}{5}$

c. $8\frac{1}{3} \times 4\frac{2}{5}$

d. $7\frac{1}{2} \div 3\frac{3}{4}$

2. Rohan's teacher asked him to divide a circular sheet in such a way that each part is represented as $\frac{1}{6}$ th of the sheet. Following is the workpiece he submitted:-



Upon seeking justification, Rohan said that he divided the sheet into 6 parts. Hence, each part represents $\frac{1}{6}$ th of the sheet. Did Rohan perform the task correctly? Justify your answer. If his answer was incorrect, what could be the correct division of this sheet?

3. "Oh, look! It's such a bright, sunny day. The warmth of the sun rays is so soothing. It's a perfect time for fishing. What do you think, Naina?" asked Shweta. "Well, I don't mind accompanying you but can we ask Jyoti, Pooja, and Riya? They might want to join too!" said Naina. Shweta agreed by saying, "Yes, we can surely do that. It's always

good to have company for outdoor activities.”. All of the girls decided to meet after $2\frac{1}{2}$ hours outside the City park. Naina took up the charge of preparing sandwiches for everybody, Shweta was asked to prepare lemonade, Jyoti and Pooja arranged fishing rods and Riya decided to bake cookies. Answer the following questions:-

- a. Naina thought of preparing 2 sandwiches for one person. According to her, she would need $\frac{1}{3}$ rd cucumber, $\frac{1}{4}$ th tomato, and $\frac{1}{3}$ rd boiled potato to prepare one sandwich. How many cucumbers, tomatoes, and boiled potatoes she would need to prepare all of the sandwiches?
- b. Shweta has $10\frac{1}{2}$ spoons of sugar at her home to prepare lemonade. However, to make a perfect glass of lemonade, she needs to put exactly 2 spoons of sugar in one glass. Will she be left with sugar at her home after preparing lemonade? If yes, how much is left?
- c. According to her Grandmother’s recipe, Riya had to have $\frac{1}{4}$ th cup of chocolate chips to bake 10 cookies. However, while preparing the batter, she added a $\frac{1}{8}$ th cup more of chocolate chips. What is the total amount of chocolate chips Riya had put in to bake cookies?