

7-3 PROJECTS BUBBLE TEAS

7.RP.A, 7.NS.A; SMP1,2,3,4,5,6,7,8

Consider the list of requirements for the project as a scoring guide.

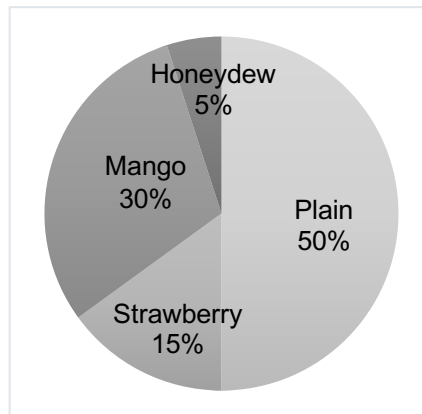
Your after-school club is planning to make and sell bubble teas at your school's carnival. You expect to make and sell 200 bubble teas. Below are the ingredients for the Bubble Tea recipe your club will use.

Bubble Tea Recipe Ingredients (Serving Size: 4)

- 8 bags black tea
- 4 cups hot water
- $\frac{3}{4}$ cup quick-cooking tapioca pearls
- 3 Tbsp Bubble Tea flavored powder
- 2 Tbsp milk
- Honey to taste



FAVORITE BUBBLE TEAS



Before purchasing the Bubble Tea flavor powders, your club members survey 80 students to find out what flavors they like. The results from the survey are illustrated in the graph above.

(Go to the next page for the project requirements.)

7-3 PROJECTS
BUBBLE TEAS
Continued

Show or explain all your reasoning clearly.

1. For 200 Bubble Teas, determine the amount of each flavor you predict you will sell based on the survey results.
2. Research the products you need to purchase and provide the following information:
 - a. The purchase location and brand of each product.
 - b. The price for one package, container, etc. of each product and the amount within a single package, container, etc. (Example: 1 bag is 16 ounces).
 - c. Any calculations you do in order to determine the amount of each item you need to purchase and the total cost per item.
 - d. The total amount you will spend in all, including other supplies you may need to purchase (like cups).
 - e. The unit price per tea to charge in order to break even.
3. How much will you charge per Bubble Tea? How did you come up with your price?
4. How much profit do you expect to make as a dollar value and percent?
5. Based on your calculations, is the amount/percent of profit worth setting up a booth at the carnival to sell the teas? Why or why not?