

Let's Do Lunch!

Reporting Category	Computation and Estimation
Topic	Solving single-step and multistep addition, subtraction, and multiplication problems
Primary SOL	4.4 The student will d) solve single-step and multistep addition, subtraction, and multiplication problems with whole numbers.
Related SOL	4.4a, b, c

Materials

- Empty cans, cartons, and other food containers for basic food items that may be part of a Thanksgiving meal (e.g., cans for yams, corn, or green beans; boxes for stuffing mixes, instant mashed potatoes, or prepared desserts such as frozen pies; bread and drink containers). (Note: This may be a good lesson to have students price items. If so, remind them to be reasonable with their pricing and make sure prices accommodate the budget.)
- Shopping for Thanksgiving Lunch handout (attached)
- Calculators

Vocabulary

add, subtract, multiply, divide, estimate, estimation, sum, difference, product, quotient

Student/Teacher Actions (what students and teachers should be doing to facilitate learning)

Note: Before holding this activity, place empty *priced* food containers around the room so students can “shop” and make purchases. Organize shopping so all students are not in one area at the same time.

1. Present the following word problem to the class: “We are planning a Thanksgiving lunch for a family of five. We all love turkey, mashed potatoes, gravy—the works! Don’t forget the pumpkin pie! Mom just got paid and is ready to go grocery shopping. It would be nice to help her plan so that she can spend wisely. She does not want to spend more than \$50 for all of the food. How can we help mom plan for exactly the amount of food she needs to purchase to feed this family of five and stay within her budget?”
2. Illustrate for students how to find a total cost of a purchase, but not using the items on display. For example, “If I went to the store and purchased 3 boxes of tissues and each box cost \$1.50, how much would I spend on the 3 boxes?” Elicit student suggestions, and allow them to display their work on the board. Make note of different strategies that can be used to find the total cost.
3. Distribute copies of the Shopping for Thanksgiving Lunch handout. The first item on the sheet has been partially completed, so students need only to determine the cost of the turkey based on the cost per pound. Make sure they understand that the cost is for each pound of turkey, but do not direct them in finding the solution. Allow them to use their own strategies. Encourage them to work together and talk within their groups.

4. Have students “shop” for the other items on the list, choosing the items and the number or quantity of each that they want to buy. They must list each item purchased (e.g., can of green beans), the cost of each item (e.g., \$0.85), the number or quantity purchased (e.g., 3), and the cost for the 3 cans (\$2.55). They must also indicate the strategy they used to arrive at their total—i.e., add \$0.85 three times or multiply \$0.85 by 3. They should show all of their work and submit it with their completed handout.

Assessment

- **Questions**
 - If the turkey cost \$1.75/pound, how would this change your plan and your purchases?
 - If we were feeding eight people instead of just five, how would that change your plan? Would you still be able to feed everyone with only \$50, or would you need to spend more?
- **Journal/Writing Prompts**
 - Your mother invited the neighbors to join the family for Thanksgiving lunch, so now there will be 10 people for lunch. How will you plan for extra food, including turkey? Explain your change in plans. There is one rectangular table in your dining room and a round table in the kitchen. Illustrate seating for all 10 people, using both tables.
 - Using your Shopping for Thanksgiving Lunch handout, estimate the cost of each food item (3 cans of green beans ~ \$3.00). Total your estimates. Explain how this total compares to the actual total cost and whether you are over budget or under budget.

Extensions and Connections (for all students)

- Have students work in small groups to plan for a class party, working within a budget of \$100. Instead of bringing in empty containers, have students draw pictures of items they will purchase. Have them record their purchases, using the same format as they used in the main activity.
- Have students collect funds for a local food pantry. Challenge them to make a plan to buy as much food as possible for the money that they collect.

Strategies for Differentiation

- Have students calculate what the tax would be on their totals. Then, have them explain how the tax would affect their purchases.
- Use store flyers instead of physical models for the shopping activity.
- Use play money.
- Have calculators available for students to check calculations.
- Allow students to work in pairs or small groups.
- Adapt the Shopping for Thanksgiving Lunch handout to meet needs of students.

Shopping for Thanksgiving Lunch

Name _____ Date _____

Directions

Shop for the items listed below. Remember, you are feeding a family of five, and one can of green beans will not feed the whole family. Plan and shop for a reasonable amount to feed the family. For each item you purchase, list the item, the cost, the number or quantity, and the cost. At the end, total your purchases and find how close to your budget you are (find the difference). If you go over the budgeted amount, you will need to decide how to change your plan to meet your budget. Show all of your work by attaching your worksheet to this sheet.



Food category	Item purchased	Cost of item	Number of items or quantity purchased	Strategy used to determine total cost (+, -, x, ÷)	Cost of purchase
Meat	12-pound turkey	\$1.25/pound	1		
Vegetable					
Vegetable					
Another side dish of your choice					
Bread					
Drink(s)					
Dessert					
Total cost of meal					