

Unit Overview

Unit Length

Five 45-minute sessions

Objectives

The students will:

- Categorize the food they eat.
- Use grocery ads to determine solutions to math problems that require critical thinking and problem solving.
- Perform mathematical computations required to solve a problem.
- Work with others to successfully complete a task related to mathematics and agriculture.
- Record data on their daily eating habits.
- Create graphs that display data on food consumption.
- Analyze their daily eating habits in relation to the Food Guide Pyramid.
- Learn and use new vocabulary related to math, nutrition, and agriculture.

Brief Description

Through a series of activities, students analyze, using mathematical and scientific processes, the food they buy at the grocery store and understand that it ultimately comes from plants or animals.

This unit, *Edible Numbers*, is divided into two grade-level specific sections: Grades 3-4 and Grades 5-6. These grade-level specific units each contain three lessons: an introductory lesson, a scavenger hunt, and a concluding lesson. In each introductory lesson the students work in small groups to learn key concepts and vocabulary by creating group posters. The main lesson includes a scavenger hunt using grocery ads. Students look through the ads to find items that answer a particular mathematic, science, or agricultural-related question. Each concluding lesson has students analyze their own food intake and organize the data through a graphing exercise.

Curriculum Content Standards for California Public Schools

A concerted effort to improve student achievement in all academic areas has impacted education throughout California. The California Foundation for Agriculture in the Classroom provides educators with numerous resource materials and lessons that can be used to teach and reinforce the Curriculum Content Standards for California Public Schools. The lessons encourage students to think for themselves, ask questions, and learn problem-solving skills while learning the specific content needed to better understand the world in which they live.

Edible Numbers includes lessons that can be used to teach or reinforce many of the educational content standards covered in grades three through six. It can be used as a self-contained unit or as supplementary lessons to an already established curriculum.

The specific subject matter content standards covered in the lessons are listed on the sidebars of each lesson. A matrix chart showing how the entire unit is aligned with the Curriculum Content Standards for California Public Schools can be found on pages 60-71.



Unit Overview

Key Vocabulary

abundant
annual
average
bull
cattle
cereal
citrus
classification
cow
cylinder
dairy
difference
factor
fat
flower
Food Guide Pyramid
fruit
grain
leaf
least common multiple
mean
meat
multiple
nut
palindrome
pie graph
place value
prime
product
quotient
rectangular prism
root
row crop
seed
steer
stem
sum
tenth
tree
tuber
U.S. Recommended Daily
Allowance (USRDA)
vegetable
vine

Evaluation

Evaluation activities are incorporated into each lesson. Embedded assessment includes reading and writing, responding to open-ended questions, and giving group presentations. Students are also asked to apply what they learn to a related situation.

Visual Display Ideas

- Display the various graphs and posters students create.
- Display the various charts and graphs in the *Farm Facts Booklet* available from the American Farm Bureau Federation (page 51).
- Have students create a collage of food items in each section of the Food Guide Pyramid.
- Create a collage of grocery ads in the shape of a dollar sign.
- Post colorful pictures of food that grows in different ways.
- Create a display of interesting facts your students learn about agricultural products. Some of these facts can be obtained from the *Fun Agriculture Facts* on pages 27–36.