Lab Framework

Text: CORD

Unit number and title: Unit 3, Converting English and Metric Measures

Developed by: Barbara Samojedny

Washougal High School

Date: July 25, 2008

CHOCOLATE CHIP COOKIES Lab Plan

Teacher: Teacher Prep/Lesson Plan

Lab Objective:

Students will convert a recipe from English to metric and prepare that recipe.

Statement of pre-requisite skills needed:

Students must be familiar with English to metric conversion charts, precision measuring and kitchen safety.

Vocabulary:

preheat

cream

gram

milliliter

cup

teaspoon

Materials list:

- 1. enough ingredients for 6 batches of cookies according to the recipe of your choice
- 2. 6 sets of metric measuring cups and spoons
- 3. cookie sheet, mixing bowl, wooden spoon, rubber scraper, pot holder for each group

GLEs (State Standards) addressed

Math

1.2.3 Apply unit conversions within measurement systems, U.S. or metric, to maintain an appropriate level of precision.

Reading

- 1.3.2 Understand and apply <u>content/academic vocabulary</u> critical to the meaning of the text, including vocabularies relevant to different contexts, cultures, and communities.
- 3.3.3 Apply understanding of complex information including functional documents to perform a task.

Leadership:

2.3 The student will analyze the complex responsibilities of the leader and follower and demonstrate the ability to both lead and follow.

In the lab, one student will be the main cook and will assign appropriate jobs to the other members. The main cook will also create the work plan, indicating which tasks are to be completed when and by whom. They are in charge of making sure the materials order is accurate.

SCAN Skills/ Workplace Skills

Reading:

Locates, understands, and interprets written information in prose and in documents such as manuals, graphs, and schedules to perform tasks.

Writing

Records information completely and accurately

Arithmetic:

Performs basic computations

Listenina:

Receives, attends to, interprets, and responds to verbal messages and other cues

Reasoning:

Applies rules and principles to a new situation, or determines which conclusions are correct when given a new set of facts and a set of conclusions.

Sociability:

Relates well to others.

Set up information:

Students are to be given a copy of a recipe for chocolate chip cookies using English measurements. Students are to convert this recipe to metric using appropriate conversion numbers.

Students will be divided into groups to be equally placed in 6 kitchen areas. One member of the group will be assigned to be the main cook or leader of the group. This person will perform the written part of the planning worksheet including assigning jobs to others in the group.

Lab organization:

Following the computations, students are to proceed to the kitchen area where ingredients are set out. Students will then follow the lab plans and prepare the recipe using the metric measuring utensils.

Teacher assessment of student learning:

Successful completion of the recipe conversion. Successful preparation of a standard chocolate chip cookie recipe.

Summary of learning: (to be finished after student completes lab) Discuss importance of accurate measurements. Discuss the ability to convert English to metric as a possible skill used in the food service industry.

Optional activities:

Students could search for other recipes using metric measurements.

Career Applications:

Chef

Restaurant Owner



Student Instructions:

Statement of the problem:

You want to prepare chocolate chip cookies but you only have metric measuring utensils available. You have a recipe that is written with English measurements.

Grouping instructions and roles:

You will be divided into 6 groups. Each group will have a main cook selected by the teacher. This main cook will assign the other jobs and prepare a work plan for the time we will spend in the kitchen. The other jobs are assistant cook, dishwasher, dish dryer, tablesetter, and room duties.

Procedure:

1.	Coı	evert the following amounts to metric:
	•	2 ½ cups flour
		2/ 1:4

- 3/4 cup white sugar ³/₄ cup brown sugar
- 2 eggs
- 1 teaspoon baking soda
- 1 teaspoon salt
- 1 teaspoon vanilla extract
- 12 ounces chocolate chips 1 cup shortening
- 2. Prepare the work plan as a group, with the main cook writing.
- 3. Proceed into the kitchen and follow the instructions on the recipe.
- 4. Evaluate the cookies.

Cookie Evaluation:

Rate the cookies from 1-5 with 5 being the highest score. The scores should indicate whether you liked the characteristic, not the intensity of the characteristic.

Color
Sweetness
Texture
Flavor
Shape

Overall score

Applied Math Council

https://wa-appliedmath.org/