## A Trip on the Mayflower (5.MD.1)

Summary
Students will apply their knowledge of converting ounces to pounds to a real world problem.
Main Core Tie
Mathematics Grade 5
Strand: MEASUREMENT AND DATA (5.MD) Standard 5.MD. 1
Time Frame
1 class periods of 90 minutes each
Group Size
Small Groups
Life Skills
Thinking \& Reasoning, Communication, Character, Social \& Civic Responsibility, Systems Thinking

## Materials

Task Sheet
Item List
Student Recording Template
Paper
Pencils
Graph paper

## Background for Teachers

Teachers need to understand the conversion between ounces and pounds. They also need to be familiar with the journey of the Mayflower.

## Student Prior Knowledge

Students need to be able to convert between ounces and pounds to complete this task.
Intended Learning Outcomes
Students will be able to select items they would need to travel on the Mayflower and add the corresponding weights to total 150 pounds. CCSS.MATH.CONTENT.5.MD.A. 1 Convert among different-sized standard measurement units within a given measurement system (e.g., convert 5 cm to 0.05 m ), and use these conversions in solving multi-step, real world problems.

## Strategies for Diverse Learners

Supports for struggling students include:
Practice with converting units
Strategies for choosing items
Strategies for combining numbers to 16
Break the problem into groups of 50 pounds
Extensions

## Additional activities include:

Extension activities found in the lesson plan
Use advertisements to determine the cost of the items
Use the length of the trip to determine how the food could be rationed to last the length of the trip
Bibliography
Adapted from: Smith, Margaret Schwan, Victoria Bill, and Elizabeth K. Hughes. "Thinking Through a Lesson Protocol: Successfully Implementing High-Level Tasks." Mathematics Teaching in the Middle School 14 (October 2008): 132-138.

Authors
David Smith
Patricia Stephens-French

