CALIFORNIA STATE SCIENCE FAIR
2005 PROJECT SUMMARY

Name(s)
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Project Number
J1122

Project Title
Muffin Fluff: The Effect of Flour Type on Muffin Density

Abstract

Objectives/Goals
In this experiment, the goal is to find the effect of flour type on the density of muffins. Out of all the different flour types used, the experimenter believed that soy flour would create the densest muffin.

Methods/Materials
Different types of flour that were tested include oat flour, wheat flour, soy flour, all-purpose flour, and unbleached flour. One batch of muffins was made for each type of flour using the same recipe. After baking, the experimenter calculated each muffin#s density by measuring its weight and volume.

Results
After revieweing the collected data, the experimenter found that oat flour made the densest muffins.

Conclusions/Discussion
In conclusion, the experimenter's hypothesis was not supported. She also found that the gluten level in flour greatly affects the density of baked goods. Things that may have influenced the experimenter#s results could have been the consistency of oven temperature, the consistency of the room temperature, and how well the batter was mixed.

Summary Statement
My project explores the effect of flour type on muffin density.

Help Received
My mother and father helped me convert my raw data into computerized graphs.