

FOOD INNOVATIONS

Project: Develop a main dish containing a minimum of 10 grams of fiber in a one-cup serving, which appeals to families with children between the ages of 2-15.

Original Prototype Formula(s): Present an original prototype formula(s) and the modified versions(s) after each lab test and alteration described below, including the final formula(s). Changes from the previous version should be highlighted in each modified formula. The final formula(s) may be from any stage of development, sufficient evidence is given to support the choice of the final formula(s) at the best option for manufacturing.

Product Testing Method: Groups will test their formula in focus groups and modify it two times. Focus groups should follow the following guidelines:

Test #1 - minimum five (5) individuals **25pt lab grade**

Test #2 – minimum ten (10) individuals, who are part of the intended consumer audience(s) of the product. **25pt lab grade**

Include a copy of the method of evaluation for each stage of testing and include a sample of both negative and positive results from each stage. Selection of final product may occur at any stage of product testing.

Nutrition Information: Create a nutrition fact label for the product, following FDA guideline, which includes the following items:

- Serving size
- Amount per serving
- % Daily Value of:
 - calories
 - Fat
 - Total fat
 - Total carbohydrates
 - Protein
 - Fiber
 - Sodium
 - Cholesterol
- Ingredients
- Allergy warnings
- Consumption instructions

<http://ndb.nal.usda.gov> may be used to obtain the nutritional content of each ingredient used in formulas.

Equipment, Safety, and Sanitation: Develop a list of equipment used and safety precautions taken to ensure a safe test kitchen and sanitary product.

Actual and Suggested Pricing: Determine the actual cost of producing one serving and one package of the product. Develop a suggested price for retailing the product.

Extra Credit- Product Packaging: The suggested product packaging should be an actual size, 3-D model of the intended product container. It should be appealing to the target audience and contain all of the appropriate information to be ready for sale. Minimum information required:

- Product Name
- Nutrition Fact Label
- Ingredient List
- Allergy Warning
- Consumption Instructions (directions for preparing, heating, etc.)
- Net Weight

The drawing or model must be neat, legible, professional, and visually appealing.

Project submission 125 pts: Group paper to be submitted for grade must include the following:

- Title page including:
 - Kitchen #
 - Period
 - Names of each group member
- Typed Original prototype formula that was used to modify recipe
- Typed Modified version(s) of formula #1 & #2
- Label Final formula indicating changes made to original formula
- Written review including:
 - Product testing process
 - Results of evaluation from both formulas.
 - Why & what changes were made.
 - Results of evaluation from testing groups.
- Copy of evaluation used for review(s)
- Nutrition Facts Panel for final formula
- Equipment, Safety and Sanitation
- Typed list of cost of ingredients with actual cost and suggested pricing for the final version to be sold to the public.

