

BOISE, OCTOBER, 1915

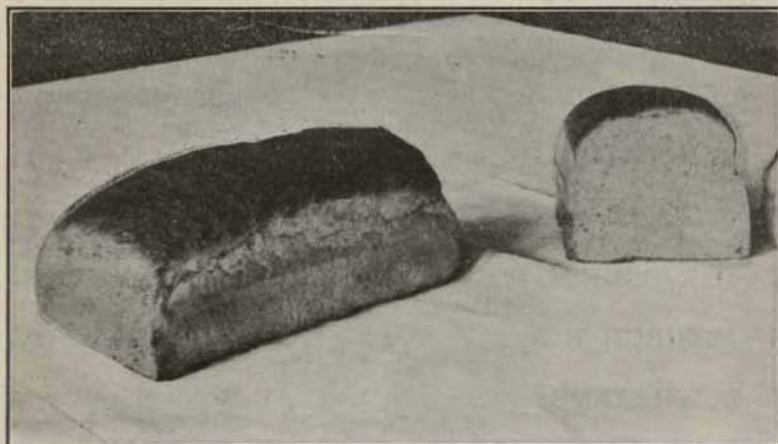
EXTENSION BULLETIN No. 14

UNIVERSITY OF IDAHO

EXTENSION DEPARTMENT

O. D. CENTER
DIRECTOR

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FIRST YEAR COOKING BULLETIN

BREAD

IDAHO COOKING CLUBS

COOPERATIVE EXTENSION WORK IN AGRICULTURE
AND HOME ECONOMICS OF THE STATE OF IDAHO.

UNIVERSITY OF IDAHO
EXTENSION DEPARTMENT
COLLEGE OF AGRICULTURE

AND
U. S. DEPARTMENT OF AGRICULTURE
COOPERATING

BOYS' AND GIRLS' CLUB WORK

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FOREWORD

TO THE COUNTY SUPERINTENDENTS

Much of the success of this work depends on your interest, the interest of your teachers, and that of the girls of your county. Encourage teachers, club advisors and club members to read and study the bulletin. With your personal interest and cooperation, the result of the work spells *Success*.

In selecting club advisors, choose only those who are deeply interested in the welfare and advancement of the girls of the community. The advisor may be a teacher, or any other wide-awake woman who does well the work of her club. Application blanks may be obtained by request sent to the State Club Supervisor, University Extension Department, Boise, Idaho.

TO THE CLUB ADVISOR

Read the directions carefully and send for Farmers' Bulletin 389, "Bread and Bread Making," U. S. Department of Agriculture, Washington, D. C. This bulletin is free and will give you many helpful suggestions. Your Congressman will be glad to send copies to the entire club.

THE PLAN

The plan is practically the same as last year; that is, to secure the agreement of five or more girls enrolled in the schools of the state—rural or town—who are between the ages of ten and eighteen years, to enter the contest by completing the work assigned in the Bread Bulletin. Fill in the names of the club members on three application blanks, sending one to your county superintendent and the others to the State Club Supervisor at Boise.

The work may be started at any time, the teacher or the club advisor giving directions and the girls doing the work at home. A loaf should then be brought to the club to be discussed and judged. Every girl must make not less than ten bakings of bread before one loaf is entered for contest. By this method a better result will be obtained through practice, and skillful habits will be established. By doing the work at home, the mothers can give many helpful suggestions.

RULES OF THE CONTEST

The recipe given will make two loaves. Select one of the two for entry. The loaf must be not less than twenty-four hours old. All work done on the bread entered must

be the contestant's, and entries must be accompanied by name, age, address, and date of baking. The size of baking pan should be the standard bread pan, $2\frac{3}{4}$ inches by $4\frac{1}{2}$ inches by 9 inches. A sheetiron pan will bake better than a bright tin one.

The club advisor shall enter, on blanks secured from the State Club Supervisor, the scores made at ~~each of the ten~~ ^{three} bakings by the club members, and these score cards, together with the report on the final contest loaf, shall constitute a part of the record of the work done by each club member, which record shall be filed in the office of the University Extension Department, Boise.

FIRST YEAR COOKING BULLETIN

BREAD

PREPARED BY JESSIE M. HOOVER, PROFESSOR OF HOME ECONOMICS,
UNIVERSITY OF IDAHO

CARE OF THE DISH CLOTH AND DISH TOWELS

Dish cloths and dish towels should be hemmed. Lint and thread from unhemmed cloths are likely to stick to dishes.

A damp, greasy dish cloth breeds disease. The disease germs are transferrred to dishes, and then to the people who eat from them. Wash the dish cloth with hot water and soap after using it. Rinse it and hang to dry, in the sun if possible. Have a sufficient number of them so that fresh ones may be used each day.

Never use dish towels or cloths for anything except dishes.

CARE OF THE HANDS

Before touching or preparing any food, wash hands thoroughly with soap and water. Scrub the nails with a nail brush, and clean with an orange wood stick (a wooden toothpick may be used).

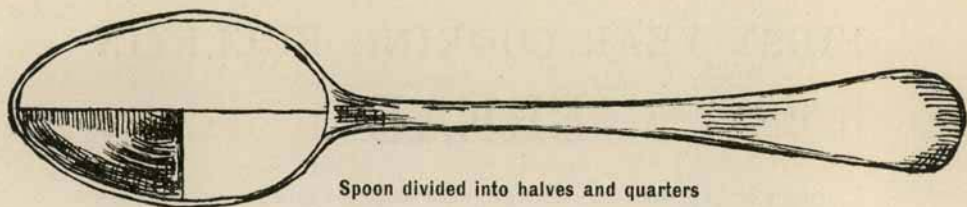
Keep a damp towel at hand on which to wipe fingers if they become soiled or sticky.

Always wipe them after touching hair, handkerchief, or after taking care of the fire.

To keep hands from chapping, after washing dishes, wash hands thoroughly with soap and water, rinse to remove all soap, and dry. Then rub them with mutton tallow or a simple hand lotion.

DIRECTIONS FOR MEASURING

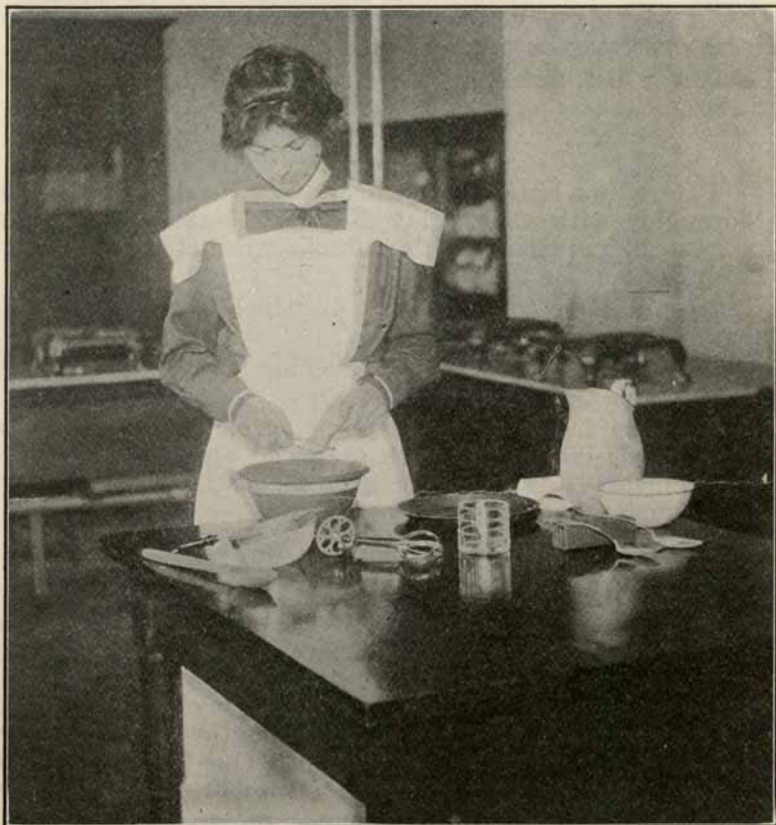
Correct measurements are essential in getting the proper proportions of ingredients. In case of dry ingredients, "full" means that the measure is level full, and is obtained by scraping over the top with the flat edge of a knife, thus removing all excess. One-half spoonful is obtained by taking a spoonful and cutting through lengthwise of the bowl and scraping the extra half away. One-fourth spoonful is obtained by dividing the half. A measure is full of liquid when it will hold no more.



Spoon divided into halves and quarters

Table of Equivalents and Abbreviations

3 teaspoons (t.) equal.....	1 tablespoon (tb.)
16 tablespoons (tb.) equal.....	1 cup (c.)
2 cups (c.) equal.....	1 pint (pt.)
2 cups (c.) butter equal.....	1 pound (lb.)
4 cups (c.) flour equal.....	1 pound (lb.)
2 cups (c.) granulated sugar equal.....	1 pound (lb.)
2 tablespoons (tb.) butter equal.....	1 ounce (oz.)
2 tablespoons (tb.) liquid equal.....	1 ounce (oz.)
4 tablespoons (tb.) flour equal.....	1 ounce (oz.)



BREAD

Bread is called the "staff of life" because it contains almost all the elements necessary to support life. When butter is added, it is a well balanced food. The quality of bread does much to determine the health of the family.

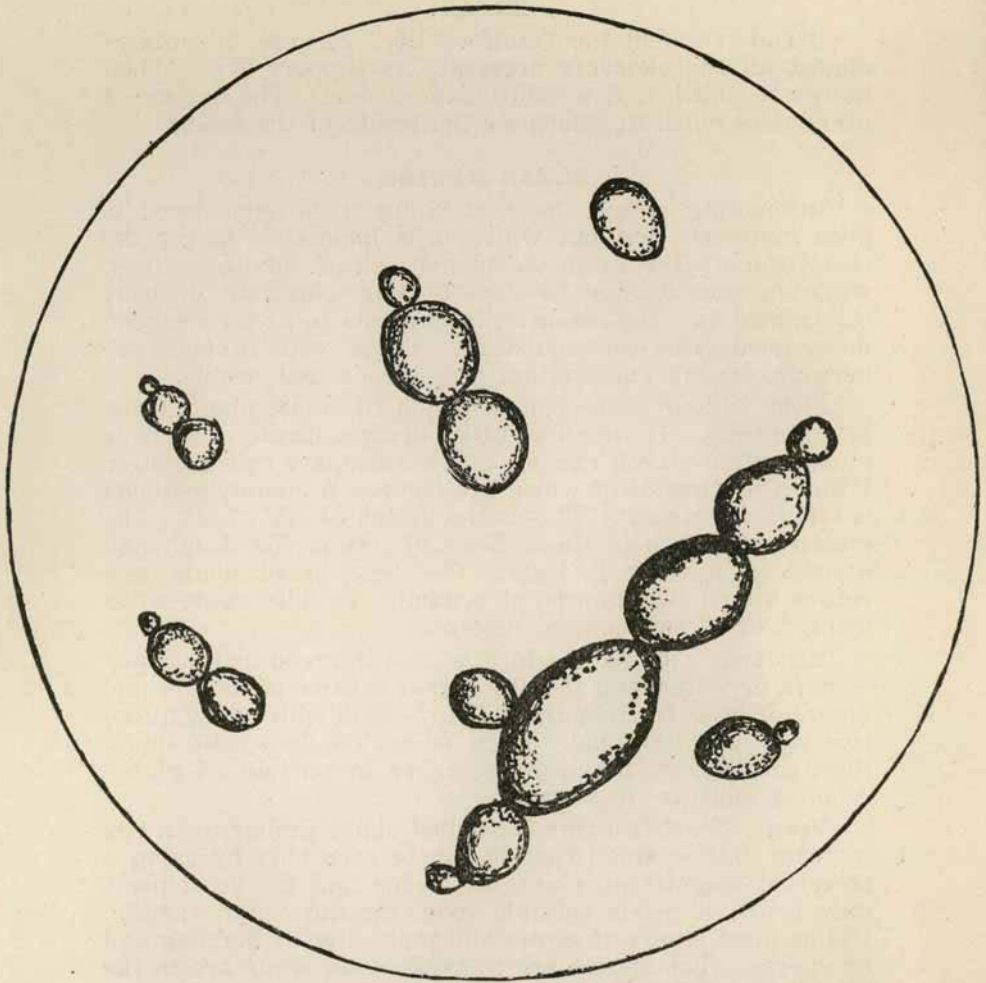
BREAD MAKING

In making bread, the first thing to be considered is good materials, without which it is impossible to get the best results. Too often we blame lack of success to luck, while in fact it may be due to poor materials, or poor workmanship. The essential ingredients in bread are good flour, good yeast and moisture. These, with proper temperature, rising and baking, give the desired results.

Flour. Flour is the soil in which the yeast plants grow and multiply. If bread is to be of first quality, the flour must contain starch and an elastic substance called gluten. When a few grains of wheat are chewed, a gummy material is left in the mouth. This is the gluten of the wheat. The gluten helps to hold the bubbles of gas in the dough and assists in making it light. The best bread flour feels rather sharp like powdered cement. It falls apart after being pressed between the fingers.

Moisture. The liquid which is used in bread making may be milk or water, and the proportion is three parts of liquid (more or less) to one part of flour. Milk adds to the nutritive value of the bread. Hard wheat requires more liquid than soft wheat, because its larger proportion of gluten requires moisture to soften it.

Yeast. Yeast is a tiny one-celled plant, similar to an egg in form, but so small that it can be seen only by using a powerful magnifying glass. In order that the yeast plant may grow, it needs suitable food, moisture and warmth. Unlike most plants, it grows and multiplies by budding and by spores. The spores are to yeast what seeds are to the wheat plant. People who live in larger towns usually get compressed yeast, because the yeast plants are fresh and moist and just ready to grow when planted. When one lives far from the market, it is more convenient to use dry yeast. Dry yeast is made up of yeast plants and some ingredient, such as corn meal, which acts as a binder. Dry yeast can be kept for weeks, or even months, in a tightly covered can or jar, and it is not affected by an uneven temperature. In Idaho many housekeepers use liquid or potato yeast. This is very good if one is careful to keep the jars thoroughly clean, emptying and scalding them often.



YEAST PLANTS

Sugar, Salt and Shortening. These are added to make the bread taste better and to help make a tender crumb. Sugar gives immediate food for the yeast plant. Salt makes bread taste better, but should not be used too freely. Shortening makes bread more tender, but if used too generously will delay the growth of the yeast plants.

Temperature. Bread will rise best at a temperature of from 77 to 95 degrees Fahrenheit. The temperature should be kept uniform—too much heat will kill the yeast plant, and too low a temperature stops its growth. In winter it is usually best to mix the bread in the morning, so that

the yeast may not become chilled. By heating the flour the rising process may be hastened. Some use potato water, as it makes the yeast grow faster. It also makes the bread moist.

Processes. A sponge is a mixture of dissolved yeast with equal parts of flour and liquid. Sugar, salt and melted fat may be added to this mixture. With the long process, a sponge is set and a small amount of yeast is used. The short process requires more yeast and the bread is stiffened at once. For hard wheat the long process is usually best, while the short process is satisfactory for soft wheat.

Baking. To test the temperature of the oven, put a piece of white paper into it and if it browns in six minutes, the oven is ready. If the loaf is brushed with water before it is placed in the oven, it does not crust so soon and a better flavor results. In baking, the loaf should continue to rise for the first fifteen minutes, after which it should brown for twenty minutes. The heat should then be reduced until the baking is finished. It generally requires sixty minutes to bake a loaf of the size your recipe mentions. It is very important that bread be thoroughly baked, since in baking the starch becomes soluble, gluten is hardened, the yeast is killed, alcohol and carbon dioxide are driven off, and flavors are developed. Careful baking improves the appearance of the bread.

To Test Bread. To determine when bread is baked, (1) the loaf shrinks from the sides of the pan; (2) remove from pan and press the sides, and if they rebound, it is done.

To Care for Bread. When bread is removed from the oven, it should be placed on wire racks to cool so that the air may pass all around it. When cold, store in receptacles which have been thoroughly washed and scalded. The bread should not be wrapped. To freshen stale bread, put loaf into hot oven and the moisture will be driven in, making a moist crumb and a crisp crust.

Bread entered in this contest will be judged by the following score card:

SCORE CARD

Shape and size.....	10
Crust	10
Crumb	25
Grain and texture.....	20
Flavor	35

100

EXPLANATION OF THE SCORE CARD

The shape of the loaf should be symmetrical. Cracks in the loaf may be due to the following conditions: (1) The dough may have been too stiff; (2) the bread may not have been sufficiently light when placed in the oven; or (3) the oven may have been too hot, causing the bread to crust over before it had finished rising. If possible, the standard bread pan, $2\frac{3}{4}$ inches by $4\frac{1}{2}$ inches by 9 inches, should be used.

The crust should be about one-eighth inch deep, crisp and fairly tender. The color of the crust should be golden brown—an even color all over.

The bread should crumb when pressed between the fingers, and if the crumb is sticky and soggy, the bread is underdone. The color of the crumb should be creamy white. Heavy streaks in the bread are due to poor manipulation, or to too high a temperature before the bread is placed in the oven.

The grain should be fine and even. Coarse grain with large holes indicates that the dough was over-light, or that it was not thoroughly kneaded. Underdone bread is likely to produce fermentation in the stomach, caused by the growth of the yeast plant. The texture should be soft and velvety, not hard or horny; and cutting clean, not crumbling.

Bread should be sweet and nutty in flavor, not sour or bitter.

RECIPES

BREAD

2 c. of liquid, milk or water
1/2 to 1 yeast cake, or 1/2 to 1 c. liquid yeast
2 tb. shortening
1 t. or less salt
2 t. sugar
6 c. flour, more or less
See directions.

DIRECTIONS

All measurements are level. Soak yeast in warm water; scald milk, if used, and add to it sugar, shortening, cold water and salt. When the milk is lukewarm, add three cups of flour. Beat thoroughly to distribute the yeast plants. The more the batter is beaten, the less kneading the dough will require. If the long process is used, the batter or sponge is set to rise, and when it has doubled its bulk it should be stiffened by adding more flour. Knead until it is elastic and does not stick to the fingers. For hard wheat six cups of flour will probably be too much. For soft wheat this amount will be about right. Let the dough rise at a temperature of from 77 degrees F. to 95 degrees F. When it has doubled its bulk, knead down and let it rise again, or it may be moulded into a loaf. For soft wheat it is occasionally best to omit the second kneading, forming loaves instead. When the loaf has doubled its size it is ready to bake. With the short process bread, fresh compressed yeast, or liquid yeast, is used, and the sponge stage is omitted. Five hours is considered long enough for short process, and twelve hours for long process, bread.

Note: It is impossible to state the exact quantity of flour to be used, as the moisture content of the same variety of wheat may vary with the season. The commercial brands of flour which the housekeeper uses are blends of two or more varieties. The miller may change the blend from time to time, thus making it impossible to give exact proportions, or even exact methods of handling. Since the new flour is over-moist and under-cured, the housekeeper having sufficient storage room will do well to purchase the year's supply of flour before the new crop of wheat is sold, as this will insure the same grade of flour and also insure a perfectly cured article. Flour should be stored in a dry place.

If one has trouble with bread, it will be well to consult a neighbor who uses the same kind of flour, and learn her proportions and methods of procedure. It may be neces-

sary to try another brand of flour if one cannot overcome the difficulty, or even to change the recipe given in this bulletin.

SOURING OF BREAD

The souring of bread is due to impure yeast, or to dough that has been allowed to stand too long in a warm place before baking. Therefore, it is important to keep the yeast clean, and not to let the dough stand too long between kneadings.

LIQUID YEAST

In case yeast cakes, dry or compressed, are not easily had, the following recipe will be found satisfactory:

6 good-sized potatoes

2 tb. flour

$\frac{1}{2}$ c. sugar

Sufficient additional flour to make a batter

1 yeast cake, or 1 c. of liquid yeast

Boil the potatoes in enough water to more than cover. Drain off and save the water. Mash the potatoes and return to potato water, stirring constantly. Add sugar and flour, and cook until thickened, using enough more flour to make thin batter. When cool, add yeast cake softened in one-half cup lukewarm water. Stir down three times within twelve hours. Put away in jars that have been thoroughly washed and scalded with boiling water.

PARKER HOUSE ROLLS

2 c. scalded milk

1 t. salt

3 c. flour

1 yeast cake dissolved in

3 tb. butter

$\frac{1}{4}$ c. lukewarm water

2 tb. sugar

Flour

Add butter, sugar, and salt to milk; when lukewarm add dissolved yeast cake and three cups of flour. Beat thoroughly, cover, and let rise until light; cut down and add enough flour to knead (it will take about two and one-half cups). Let rise again, toss on slightly floured board, knead, pat, and roll out to one-third inch thickness. Shape with a biscuit cutter, first dipped in flour. Dip the handle of a case knife in flour and with it make a crease through the middle of each piece; brush over one-half of each piece with melted butter, fold and press the edges together. Place in a greased pan one inch apart, cover, let rise, and bake in a hot oven twelve or fifteen minutes. As rolls rise they will part slightly, and if hastened in rising are apt to lose their shape.

By varying the recipe given for bread, Parker House rolls and many other fancy breads may be made.

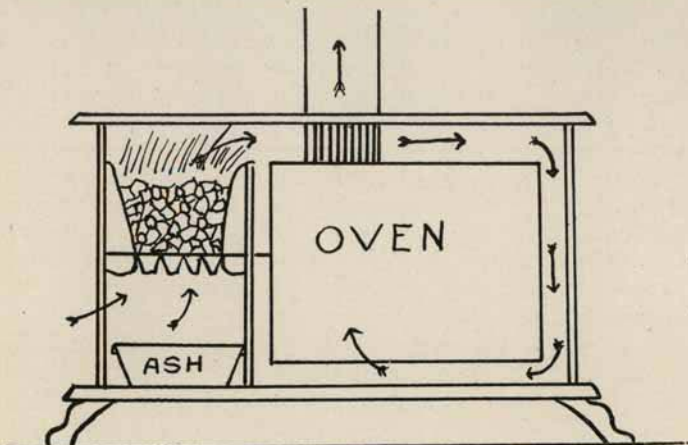
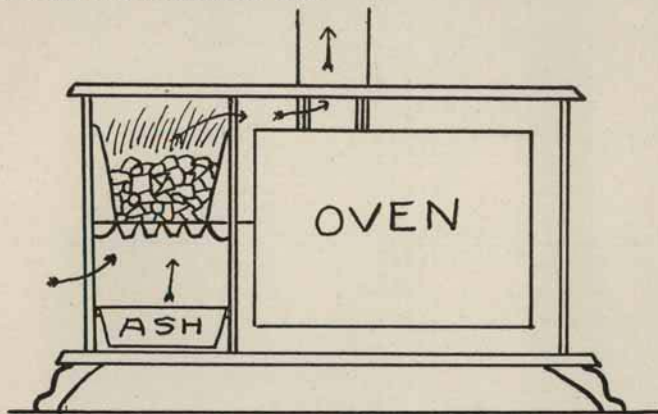
The Preparation of Fire for Baking

LAYING THE FIRE

After opening chimney damper and oven damper, dump the ashes from the grate. Fill the fire box one-third full of shavings or twisted paper. On this lay small sticks of soft wood crisscross, in order that the air may have free passage through it. Put two shovelfuls of coal on top of the wood. If wood is used instead of coal, lay two sticks of wood on top of kindling, so that air may circulate through.

STARTING THE FIRE

Light the fire by applying a lighted match, between the bars of the grate, to the shavings inside. When the kindling is all ablaze, add coal, if coal is to be used, until the fire box is level full, as it settles when the kindling burns. When the fire is well started, the fire box should never be kept more than three-fourths full.



TO HEAT THE OVEN

Close the oven, chimney and check dampers, keeping all others open.

TO CHECK FIRE

Slightly open the slide in the check damper. Entirely open the check damper at front of stove itself. All other dampers must be closed. Lifting a lid over the fire box will check fire more quickly.

FOR A STEADY, HOT FIRE

Rake out the ashes from beneath the grate. Fill the fire box three-fourths full of coal. Open the lower front and chimney dampers. See that oven and check dampers are closed. When the coal in the lower part of the fire box is glowing red, the top layer still black, and the flames yellow, close the dampers. When the top layer begins to glow add more coal, always keeping the black coals on top.



