



Baking with Whole Wheat Flour 101

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1. **Why bake with whole wheat flour?** **A:** Whole wheat flour is “nutrient dense,” containing all three parts of the whole wheat kernel (bran, germ AND endosperm) and provides all the naturally occurring nutrients—including antioxidants. Enriched white flours (all-purpose, bread and cake), milled from the endosperm of the wheat kernel, provide carbohydrates and protein and three B-vitamins, iron, and folic acid.

- More: Grains of Truth, Wheatfoods.org; Whole Grains 101, Wholegrainscouncil.org

2. **How do I know flour is whole wheat flour?** **A:** If the package label says “whole wheat flour,” it’s 100% whole wheat flour—including the bran, germ and endosperm.

- Visit Educator resources, Kernel of Wheat and Kid Zone, www.namamillers.org



3. **Are all whole wheat flours the same?** **A:** Whole wheat flour is the product of the *class* of wheat from which it is milled—hard red, hard white, soft red or soft white. *Soft* wheat (lower protein) whole wheat flour is best for pastries, some cookies, and cakes; *hard wheat* (higher protein) whole wheat flour for breads. Whole wheat flours may be darker (milled from red wheat) or paler (milled from white wheat), coarse textured or fine-textured. None are bleached or enriched.

- Learn more: Wheat 101, texaswheat.org and Consumer resources/recipes, kswheat.com

4. **Can any recipe be baked with whole wheat flour?** **A:** *Any* recipe can be baked using up to half the flour as whole wheat flour with no changes made to the recipe.

Remember, *how you measure flour matters!* (See #5)

- **Example:** If the recipe calls for 1½ cups enriched white flour (such as all-purpose, bread or cake flour), use ¾ cup whole wheat flour and ¾ cup of the enriched flour.
- **Product color too dark?** Choose a “white whole wheat” flour (see food label). White whole wheat flour is milled from white wheat (hard or soft) instead of red wheat. White whole wheat flour is equivalent nutritionally to red whole wheat flour—both are unbleached flours.
- **Texture too fine or coarse?** Fine-textured whole wheat flours are available in the supermarket baking aisle as well as stone ground whole wheat flours.
- **100% Whole Wheat baking:** In many recipes 100% of the flour could be whole wheat flour—you won’t know until you try! See Tip #3.
- **TIP #1:** Use soft whole wheat flour for pastries, cakes; whole wheat flour for other baking.
TIP#2: 100% whole wheat baked goods are often lighter if buttermilk or yogurt can be used.
Tip #3: When converting recipe from white flour to whole wheat flour, you may add 2 teaspoons additional liquid per cup of flour because the bran will absorb moisture.
TIP#4: Yeast breads: Mix dough ingredients 3 minutes, cover and allow to rest 20 minutes, then knead/mix until fully developed OR use a Sponge and Dough method.
 - Videos: 100% Whole Wheat Bread or Pizza at DIY Baking Channel, HomeBaking.org
- **Tip#5:** Store whole wheat flour at room temperature up to 1 month, then refrigerate or freeze. Cool baked goods, out of pans, on cooling racks; wrap when room temperature. Freeze after 1 day. Refrigeration stales yeast breads—store wrapped at room temperature up to 2 days OR freeze extra.

5. **Measuring method matters.** **A:** No matter what flour you’re baking with, if you’re not weighing the flour, measure flour in *dry* measuring cups. (1) Stir the flour to fluff, (2) Lightly spoon in cup until heaping (3) Level-off flour off with a straight-edged utensil. (1 cup whole wheat flour= 4 oz)

- View How to Measure Flour http://www.homebaking.org/glossary/old_glossary.html#F
- More great how-to baking techniques at <http://www.homebaking.org/hbamembers/index.html>