

## A Grain of Truth About Fiber Intake

Grain products with 2.5 grams or more of fiber: bran muffins, brown rice, whole-wheat loaf bread, whole-wheat bagels, whole-grain cereal, whole-wheat sliced bread, and whole-wheat flour.

**H**ere's a quick quiz: If the wrapper on the bread you've just chosen contains the healthy-sounding phrase "12 grain," does that mean you've made the best choice in terms of dietary fiber?

Not necessarily. Brown breads are not all alike.

Breads labeled "whole wheat" must by law meet a standard, which is that they be made only from whole-wheat flour. Such breads rank comparatively high in fiber content because their wheat bran and wheat germ have not been removed. Wheat germ is the small, inner part of the wheat kernel that is a concentrated source of nutrients.

The distinction is important. A recent study funded by ARS showed that those who consumed at least three servings of whole-grain foods per day were less likely to have what's called metabolic syndrome. That's a condition marked by a combination of abdominal obesity, high triglycerides, low HDL cholesterol, high blood pressure, and poor blood sugar control—all of which increase risk for diabetes and heart disease. The study was conducted by nutritional epidemiologist Nicola McKeown at the Jean Mayer USDA Human Nutrition Research Center on Aging at Tufts University in Boston, Massachusetts, and was reported in *Diabetes Care*.

"When wheat is ground into flour, the bran and germ can be removed, and that decreases the amount of fiber in wheat products," says Elizabeth Hill, a registered dietitian with the Food and Nutrition Information Center, based at the ARS National Agricultural Library, Beltsville, Maryland. "So look for the term 'whole wheat' on the food label ingredient list, not

just the word 'wheat,' if you're watching your fiber intake." Some breads labeled simply 12, 9, or 7 grain, for example, could have just one-third the fiber of similarly labeled whole-wheat breads.

"Enriched wheat flour" means that certain nutrients were added back into the flour during or after processing, but that doesn't mean that fiber was added back in. "That bread is not whole-grain," says McKeown. "There does not appear to be any protective effect from consuming those products compared to consuming whole-wheat products."

When reaching for fiber-filled products at the market, look at the Nutrition Facts panel on the package. Foods that have at least 2.5 grams of fiber per serving are considered to be good sources of fiber and can make this claim on the wrapper, say U.S. Food and Drug Administration regulations.

Adding three servings of whole grains a day is not difficult. "Replace white rice with brown rice and white bread with whole-wheat bread," says McKeown, "and choose a whole-grain breakfast cereal."—By **Rosalie Marion Bliss, ARS**.

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