

WHEAT FREE DIET

AVOIDING WHEAT

Apart from avoiding the wheat berry, the whole grain from which wheat flour and all wheat products are made from, one **must always read labels** as wheat is used in many processed foods. People who are allergic to wheat often may tolerate other grains. However, about 20% of children with wheat allergy also are allergic to other grains. Barley, kamut, oats, rye, and spelt are related to wheat— be sure to ask your Allergist if these grains are safe for your child to eat.

A wheat allergy can present a challenge for baking at home and bakery products, because wheat is the United States' most common grain product. In feeding your child a wheat-free diet, there are **many options to choose from**, look for alternate grains such as amaranth, barley, buckwheat/kasha, corn, millet, oat, quinoa, rice, rye, sorghum, tapioca, teff. When baking with wheat-free flours, a combination of flours usually works best (you'll find a recipe on the next page!).

*What foods are **not allowed** on a wheat free diet?*



- **Wheat berries**
- **Wheat flours:** all purpose, bread, cake, durum, enriched, graham, hard winter wheat, high gluten, high protein, instant, pastry, self-rising, semolina, soft wheat, steel ground, stone ground, whole wheat
- **Wheat products** - caution with processed foods and remember to carefully read labels for wheat ingredients
 - Bread, both white and whole wheat brown bread
 - Wheat products and derivatives can be found in many foods, including ale and beer, baked goods (cakes, cookies, and muffins), baking mixes (pancakes, waffles, cakes, etc.), batter-fried and breaded foods, cereals, crackers, energy bars, pasta, pizza dough, processed meats, salad dressing, sauces, soup, and etc.
 - Wheat may be found in some brands of ice cream, play dough, potato chips, rice cakes, turkey patties, hot dogs, imitation crab and surimi.



ALWAYS AVOID FOODS THAT CONTAIN WHEAT, INCLUDING THE FOLLOWING

Bread Crumbs	Spelt
Bulgur	Sprouted Wheat
Cereal Extract	Trigo
Club Wheat	Triticale
Couscous	Vital Wheat Gluten
Cracker Meal	Wheat Bran, Wheat Bran
Durum	Hydrolysate
Einkorn	Wheat Germ, Wheat Germ Oil
Emmer	Wheat Gluten
Farina	Wheat Grass, Wheatgrass
Flour (see above)	Wheat Malt
Hydrolyzed Wheat Protein	Wheat Protein, Wheat Protein
Kamut	Isolate
Matzoh, Matzah, Matza Meal	Wheat Sprouts
Pasta	Wheat Starch
Seitan	Whole Wheat
Semolina	Whole Wheat Berries

USE CAUTION, THE FOLLOWING MAY CONTAIN WHEAT:

ALL Bakery Products
ALL Dry Cereals
 Glucose Syrup
 Processed foods: Gravy, Pizza Dough, Tortillas, Meat balls or Meatloaf with bread crumbs used as a binder
 Oats
 Soy Sauce* and Sho yu
 Starch: gelatinized starch, modified starch, modified food starch, vegetable starch
 Surimi

*Japanese "Tamari" soy sauce is traditionally wheat-free, and some tamari available commercially today is wheat- and gluten-free. Always check the label.



WHEAT ALLERGY vs. GLUTEN INTOLERANCE OR CELIAC DISEASE



A **wheat allergy** should not be **confused with “gluten intolerance” or celiac disease**. Wheat allergy is most common in children, and is often outgrown by age three years. Symptoms of a wheat allergy reaction can range from mild, such as hives, to severe, such as anaphylaxis. Allergy involves a systemic overreaction of the immune system as described above.

Celiac disease (also known as *celiac sprue*), affects the small intestine. It is caused by an abnormal immune reaction to one specific protein found in wheat, gluten. Celiac is usually diagnosed after a biopsy by a gastroenterologist, and typically an Allergist is not involved in medical care. Celiac is a life-long digestive disease that can cause serious complications, including malnutrition and intestinal damage, if left untreated. Individuals with celiac disease must avoid gluten, a protein found not only in wheat, but also rye, barley, kamut, spelt and sometimes oats.

WHEAT FREE VS GLUTEN FREE: As gluten intolerance, sensitivity and Celiac disease are becoming more mainstream many food products are labeled as “Gluten Free”. If your child has a wheat allergy, **please note that the “Gluten Free” label does not equal “Wheat Free”**. Manufacturers can remove the gluten proteins from wheat flour and label the product free of gluten, however it may or may not be wheat free. For a wheat allergy, check that the ingredients label is also free of wheat.

POTENTIAL NUTRITIONAL DEFICIENCIES ON AN WHEAT- FREE DIET

When you remove wheat from a diet, it is important to include the special nutrients that are lost from removing wheat, especially if this was previously a key food in your child’s diet.



What nutrients are important in wheat? What are good food sources of these missing nutrients?

- **Fiber:** All Legumes (Beans and Peas), all Vegetables, all Fruits - eat with the skins on!, Wheat-free Whole Grains including Amaranth, Barley, Buckwheat/Kasha, Corn, Millet, Oat, Quinoa, Rice (brown, black, red, wild), Sorghum, Tapioca, Teff

Wheat products, cereals and flour are “*fortified*” in the USA, meaning specific vitamins and minerals are added that everyone can benefit from. The following minerals are usually added to wheat flour and products, when you remove wheat, you may need to remember to include more of the following in your child’s diet:

- **Riboflavin:** Almonds, Asparagus, Crimini Mushrooms, Eggs, Soy, Spinach, Tempeh, Turkey
- **Thiamin:** Sunflower Seeds, Black Beans, Navy Beans, Barley, Green Peas, Oats
- **Niacin:** Tuna, Chicken, Turkey, Salmon, Beef, Sardines
- **Iron:** Animal Meats, Soy, Lentils, Garbanzo Beans, Olives, Spinach, Swiss Chard, Sesame, Teff

ALTERNATIVES TO WHEAT

Bread and Bakery Products: Wheat-free options are available in most supermarkets, or try the recipe below!

Cereal: Rice, Corn, Quinoa are commonly found dry cereals

Tortillas: Choose corn flour (masa) tortillas

Baking Substitute for Wheat Flour: Wheat-free, Gluten-free flour mixtures are available in most large supermarkets; or, you can make your own with this recipe!

1 ½ cups sorghum flour
1 ½ cups potato starch or amaranth flour
1 cup tapioca flour (tapioca starch)
½ cup almond flour or a bean flour (try mung or etc.)

Makes 4 ½ cups. Store in a glass jar.
Recipe credit: Carol Fenster from the book *Cooking Free*.

BREAD RECIPE FREE OF TOP 8 ALLERGENS

2 ½ cups rice flour
½ cup tapioca flour
2 ½ teaspoons guar gum
1 tablespoon yeast
1 teaspoon salt
2 tablespoons honey
2 tablespoons olive oil
1 ½ - 2 cups water
1 teaspoon cider vinegar or rice vinegar

Add liquid ingredients to dry ingredients in a food processor. Process until it is smooth like a cake batter. Spoon batter into a greased bread pan or muffin tins. Bake in oven at 350F, 30 minutes for bread loaf and 15 minutes for the buns.

Recipe credit: Susan Carmack.