

Instructions for Preparing Pulses

Pulses have been a part of the human diet for thousands of years. One trait of a healthy diet is that when grains, legumes, nuts, and seeds are included they are properly soaked and prepared. The ancients understood that in order to properly digest and fully utilize the nutrients contained in the pulses, special care and time needed to be taken in their preparation. Some 2400 years ago Hippocrates taught that the body is affected differently by bread according to the manner in which it is prepared.

Seeds, grains, legumes, and nuts should be soaked, sprouted, fermented, or naturally leavened. These processes neutralize the various toxins or “anti-nutrients” that are present in all pulses. Enzyme inhibitors in these seeds can block digestion, having the opposite effect of food enzymes, making digestion more difficult. Phytic acid is an organic substance present in grains and legumes that blocks mineral absorption. Tannins and lectins, which are also presents, can be very irritating and damaging to the digestive tract. Traditional preparation processes break down the complex sugars, starches, and proteins in seed foods and also begin the breakdown of cellulose, which is impossible for humans to digest. Therefore, proper preparation makes grains, legumes, nuts, and seeds more digestible and their nutrients more available.

Grains

The addition of grains to the diet can add the benefits of many valuable nutrients, provided grains are prepared in a manner that makes those nutrients available for absorption. Traditionally grains were consumed whole and after being soaked or fermented. Modern science has been able to discover the importance of this ancient practice. All grains contain phytic acid (an organic acid in which phosphorus is bound). Unreleased phytic acid binds to certain minerals such as calcium, copper, iron, magnesium, and zinc preventing their absorption in the intestinal tract. This can over time lead to conditions such as irritable bowel and leaky gut syndromes, and eventually much more serious disorders. Soaking allows enzymes and probiotic organisms to break down and neutralize phytic acid. It is important that soaking occur in warm acidulated water. This can be accomplished through the use of real yogurt, homemade whey, lemon juice, or raw apple cider vinegar. We prefer the use of raw fermented yogurts, homemade liquid whey, or raw apple cider vinegar.

Grains should be soaked in the following way: 1 cup grain to 1-1 ½ cups warm filtered water plus 2 tablespoons yogurt, whey, fresh lemon juice, or raw apple cider vinegar for 7 to 24 hours. Prior to cooking, drain water and proceed to cook per recipe. *Nourishing Traditions* by Sally Fallon offers a nice selection of delicious grain recipes.

Unsoaked grains in the form of commercial breads, pastries, granola, and dry cereal are never recommended. True sourdough breads are a nice alternative to homemade bread. Gruels and porridges made from properly soaked grains provide a healthy replacement for boxed dry cereals. Don't forget the butter.

Legumes

Likewise legumes should be soaked for 7-24 hours. Soak in a neutralizer such as homemade whey, lemon juice, raw apple cider vinegar, or baking soda.

Neutralizer guidelines:

Lentils, black beans, and garbanzos: Use whey, raw apple cider vinegar, or lemon juice.

Kidney-shaped beans (kidney beans, pintos, Anasazi, navy, white, black turtle): Use baking soda.

1. Do not use cold water for soaking legumes. Bring purified water to a simmer so that you begin with room temperature or slightly warm water.
2. Rinse legumes at least once to three times during the soaking process. Each time you rinse, add newly simmered water and another dose of the neutralizer.
3. The longer you soak your legumes, the shorter your cooking time.

Soaking guidelines:

Lentils: soak for 7 hours or more

Kidney-shaped beans: 18-24 hours

Garbanzos: minimum of 24 hours

Nuts & Seeds

Certain enzyme inhibitors found in nuts and some seeds make them more difficult to digest, especially when eaten in large amounts. Soaking nuts in warm, purified water with Celtic sea salt added overnight (or on average at least for 7 hours) neutralizes these enzyme inhibitors. For four cups of nuts or seeds, use one-tablespoon Celtic sea salt in enough warm, purified water to cover nuts or seeds by an inch. After draining water, place in a dehydrator at 120 degrees Fahrenheit or in a warm oven under 150 degrees Fahrenheit for 12 to 24 hours, depending upon crispness. *Nourishing Traditions* by Sally Fallon has some scrumptious recipes for nuts and seeds.

Please note that “raw” cashews are not truly raw. They have been heated in an oven at 350 degrees Fahrenheit while in their shell in order to neutralize a toxic oil called cardol. Soaking at this point will not enhance the enzymes but will still make them more digestible. Soaking longer than 6 hours will make them soggy.

If you are dehydrating in an oven, please turn nuts several times during the dehydrating process. We recommend TSM dehydrators.

Soaking Time Chart

Raw Nuts or Seeds	Soaking Time in Hours
Almonds	7-8
Brazil nuts	4-6
Cashews	3-6
Filberts (hazelnuts)	7-8
Flax seeds	7-8
Macadamia nuts	6-7
Pecans	7
Pine nuts	7
Pistachios	4
Pumpkin seeds	7-8
Sesame seeds	7-8
Sunflower seeds	4
Walnuts	6