

Diet And LifeStyle Recommendations

These general recommendations for good health are based on your genetic analysis. We use an algorithm that calculates the most probable best diet for you. Much information is still to be discovered in the genetic field that could change the response of your genetic analysis. Update your report occasionally to get a more current diet list according to new research.

In general, most people would benefit from some dietary changes such as eating less processed foods, considering organic whenever possible, avoiding sugar. Other things are very individual and can very much depend on the genes you inherited. The optimal diet is tricky as some genes will indicate one way of eating while another may indicate the opposite. We have tried to tally the genes you inherited and come up with a consensus that should help you achieve healthier bodies and minds.

Before starting any diet or supplements, please consult your health care professional. They may be contraindications to your specific situation or with certain medications.

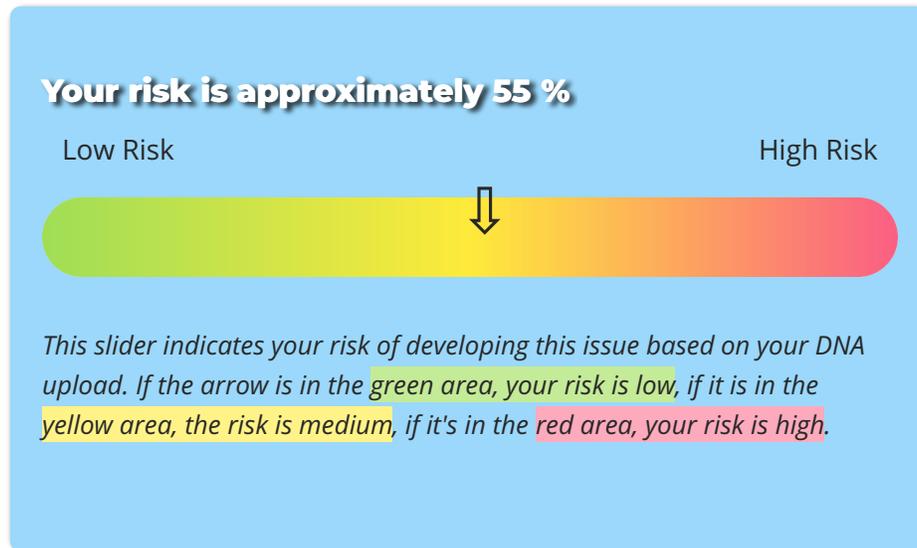
Personalized Diet and Lifestyle Recommendations

Alcohol: Inability to Process and Detoxify (Low tolerance)



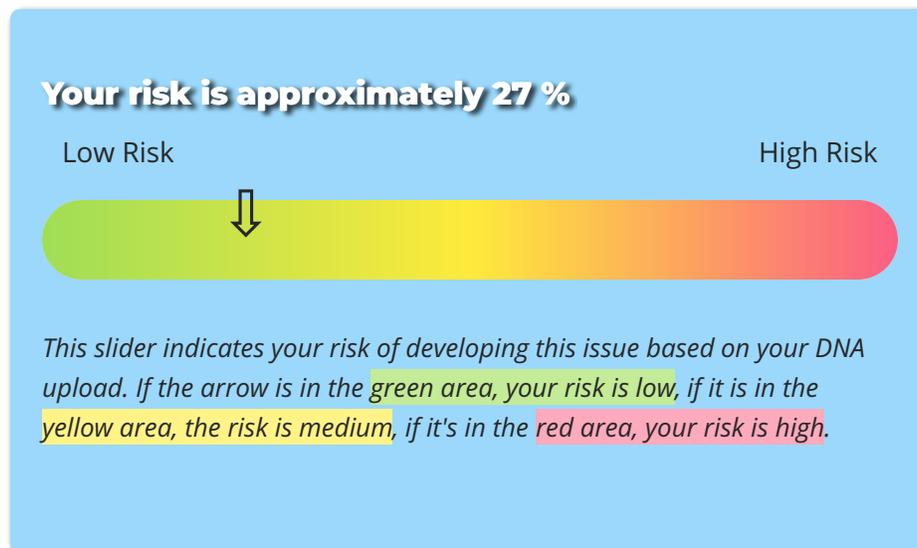
If your slider is close to or greater than 50% you may have some difficulty metabolizing alcohol. Some genetic variants make it difficult for your body to process alcohol. These variants will lead to increased levels of toxicity and increased risk of side effects of alcohol consumption. There is a link between alcohol use disorders and major depression, [increasing use of alcohol increases risk of depression](#).

Caffeine: Inability to Process



Like that morning coffee? Can't walk past chocolate? Certain genetic variants can affect your ability to break down caffeine. Those with XDH variants would benefit from avoiding all forms of foods with xanthine, including coffee, tea, and chocolate, while those with NAT variants will want to avoid only coffee, as it will be difficult to break down. Green tea and coffee also [inhibit the COMT enzyme](#) and decrease its function, that of breaking down adrenaline. This can lead to increased anxiety and inhibition of estrogen clearance. So looking at your unique genetic profile, which you can see on the Brain Chemistry report, you can get an idea of whether or not caffeine is good or bad for you and which forms are your best.

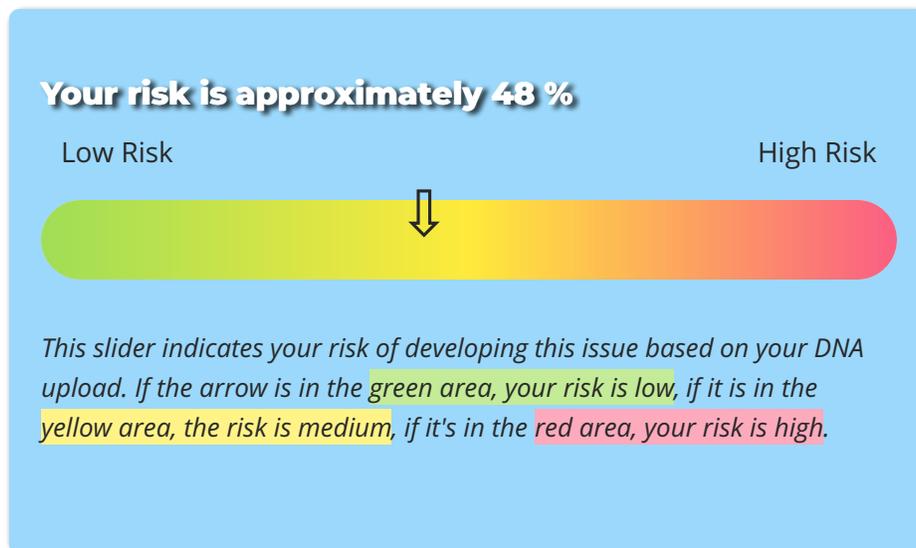
Carbohydrate: Inability to convert to energy efficiently



If your slider is close to or greater than 50%, you may have difficulty making energy out of carbohydrates in your diet. These instead are more likely stored as fat and lead to cardiovascular issues, insulin resistance, blood sugar imbalances, weight gain, low energy/metabolism and gallbladder issues. Often this inability to process carbohydrates well leads to a craving for them as a fast source of sugar which compounds the issue. Simple carbohydrates are more likely to cause problems than carbohydrates that are more complex.

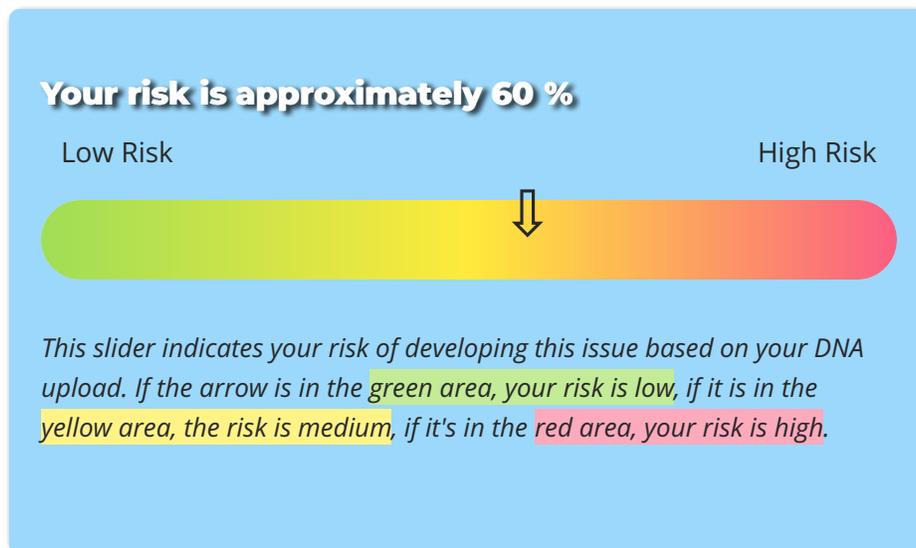
When you get your diet/lifestyle report and your supplement report this may help you avoid those sugar cravings and help your body burn your calories more efficiently.

Dietary Fat: Inability to burn as a fuel efficiently



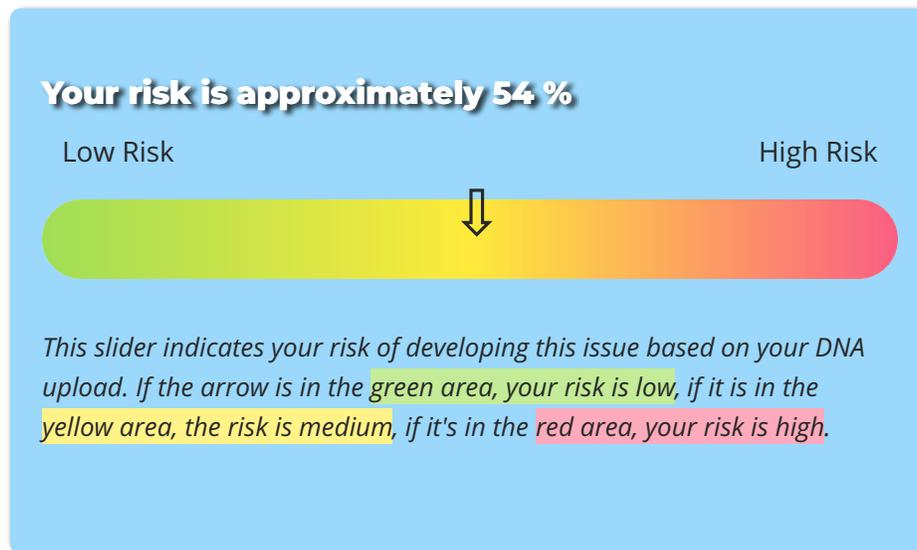
If your slider shows close to or greater than 50%, you may have difficulty burning fats as a fuel. Your ability to absorb fats and burn them as fuel may be difficult due to the presence of certain genetic variants: if you have inherited some of these variants, it would be beneficial for you to avoid excess fats including fried foods, fatty meats, avocado, dairy products. While these foods are not inherently harmful for most, you would likely feel better on a low-fat diet. Adding beets to your diet might be beneficial to helping the body make more bile to break down fats. While certain fats are important to brain health, an accumulation of unhealthy fats or unmetabolized fats can lead to [brain chemistry imbalances and inflammation](#). The addition of Omega 3 Fatty acids can be helpful to [manage brain chemistry imbalances](#) along with the reduction of fried foods, and foods high in saturated fats.

Dietary Protein: Inability to digest and absorb amino acids



If your slider shows close to or greater than 50% in this category, you may have difficulty breaking proteins down into amino acids and using them as fuel efficiently. Some people do better in that case on a vegetarian or low protein diet. One of the factors involved in this calculation could include low production of hydrochloric acid required for the breakdown of proteins. Other genetic variants may make it difficult for your body to process specific amino acids such as tryptophan or methionine. In this case, a low protein diet might be best for your physiology. Getting sufficient levels of amino acids, however, is critical to maintaining good health.

Fermented Food Sensitivity



If your slider shows close to or greater than 50% you may have some difficulty processing fermented foods. Some people do much better with fermented foods while others may not be able to tolerate them. In general they cause an increase in histamine levels which some cannot tolerate.

If your slider level is low, you may benefit from adding fermented foods to your diet, as they increase levels of good flora in those who are deficient in general. In addition, they help the body produce more vitamin K.

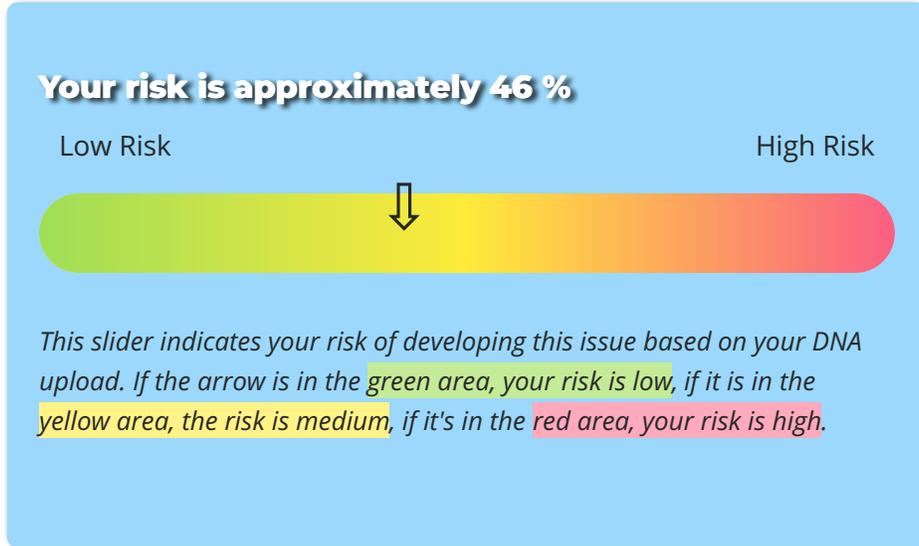
Gluten Sensitivity or Intolerance



If your risk slider shows close to or greater than 50% it's likely that you will have the inability to digest gluten in foods. This can lead to symptoms of digestive stress, diarrhea and other symptoms when consuming gluten containing foods. Gluten ingestion has been associated with a significantly increase in [depression](#) symptoms and [schizophrenic](#) symptoms.

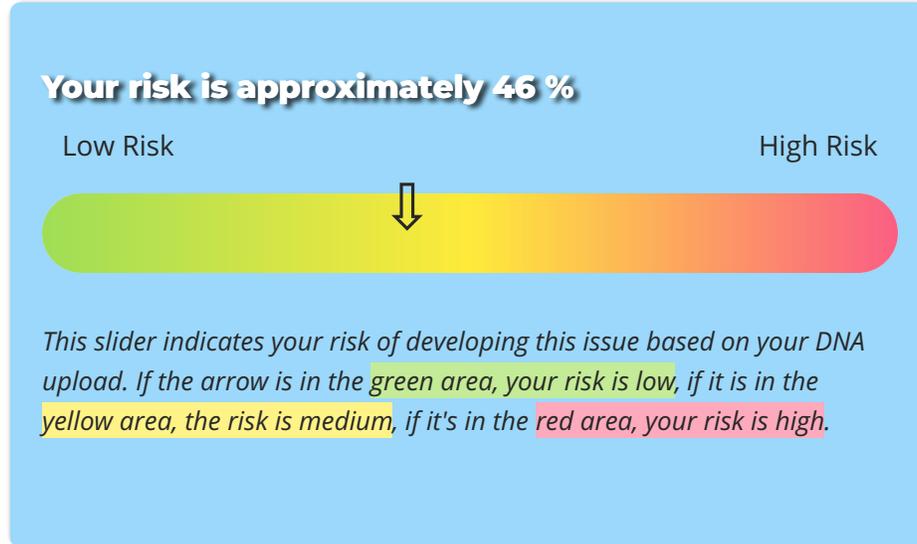
If your slider level is low, your ability to handle gluten in your diet without symptoms is likely to be increased. However, if you have digestive complaints a trial of gluten free diet can reveal whether it is truly a problem for you or not.

Histamine Food Sensitivity



If your risk slider shows close to or greater than 50%, you may have the inability to break down histamine containing or histamine inducing foods in your diet. Variants in certain genes can increase inability to break down histamine efficiently. In addition, those who have difficulty producing methyl groups (such as in the MTHFR gene) will have more difficulty breaking down histamine. Imbalances can lead to inflammation, agitation, anxiety and other brain imbalances along with the traditional symptoms of high histamine such as allergic reactions to pollen, etc. A low histamine, low gluten diet can greatly benefit those with these variants.

Intermittent Fasting Intolerance



If your risk slider shows close to or greater than 50% you may have difficulty going for long periods without eating. Some people are intolerant of going for long periods of time without calorie intake, others can greatly benefit from intermittent fasting. Common intermittent fasting methods involve daily 16-hour fasts or fasting for 24 hours, twice per week. Some people do not burn their fat stores as a fuel efficiently and must take in calories on a more regular basis to maintain blood sugar levels. Genetic variants can have a very strong influence on how well you tolerate long periods of time with no calorie intake.

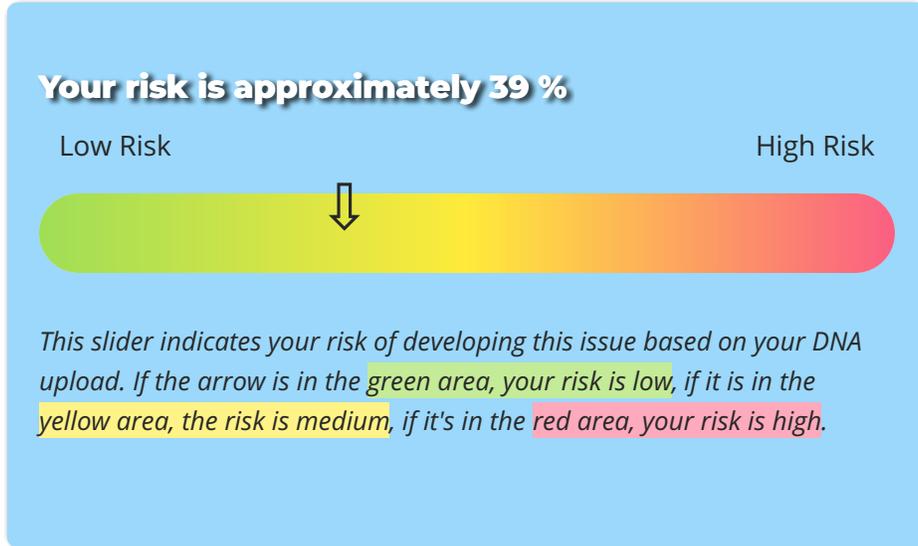
If your risk slider is less than 50% you may benefit from intermittent fasting protocols which have been shown to be highly beneficial in some cases. [Intermittent fasting and caloric restriction](#) have been shown to extend lifespan and increase resistance to age-related diseases and improve the health of overweight humans. It has been shown to enhance cardiovascular and brain functions and improve several risk factors for coronary artery disease and stroke including a reduction in blood pressure and increased insulin sensitivity.

Lactose Intolerance



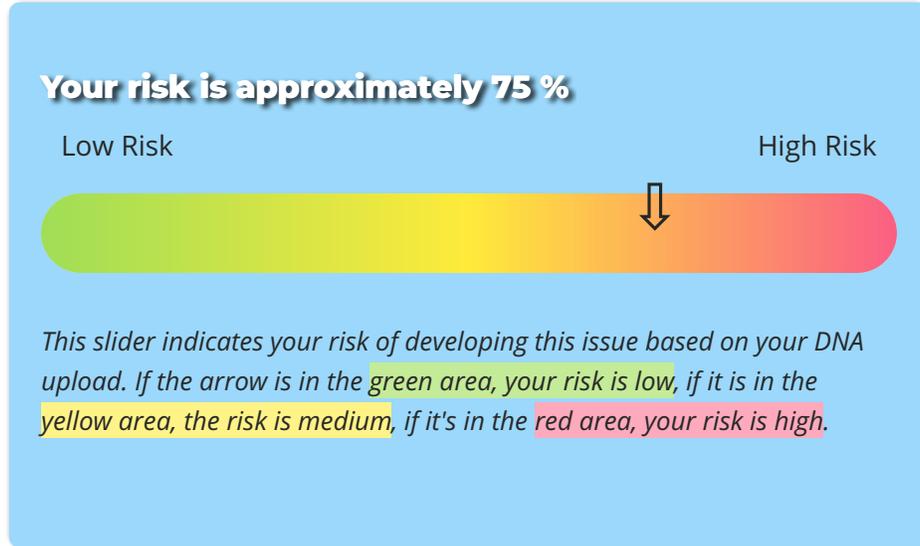
If your risk slider shows close to or greater than 50% you may have inherited certain genes that prevent your from producing lactase, the enzyme that helps you digest lactose contained in many dairy products. Common symptoms include abdominal pain and bloating, excessive gas, and diarrhea following the ingestion of foods containing lactose. **Lactase deficiency** is present in up to 15 percent of persons of northern European descent, up to 80 percent of blacks and Latinos, and up to 100 percent of American Indians and Asians. If your slider is low and you feel you have reactions to dairy products, it may be due to a sensitivity to casein, the protein in dairy products. A trial of lactose free dairy products can reveal whether it is truly lactose or casein. **Probiotic supplementation** has been shown to help in some cases with the ability to digest lactose. Substitution of dairy for plant based milks might be helpful, for example, from soy, rice, almond, or oat.

Monosodium Glutamate (MSG) Intolerance



Genetic variants in certain genes can lead to increased sensitivity to excitotoxins such as glutamate, aspartame, etc. High glutamate levels can lead to anxiety, irritability, damage to the pancreas, blood sugar issues and a risk of seizures. Avoiding foods with those ingredients is very helpful particularly for those with these genetic variants. Common symptoms reported with a sensitivity to MSG include headaches, chest pain, flushing, sweating, heart palpitations, nausea, numbness or tingling in the face or neck. Reduction in the function of the adrenal, thyroid and pituitary glands was seen in [one study](#). Excess levels of glutamate have been associated with [obsessive compulsive](#) tendencies. MSG is primarily found in processed foods.

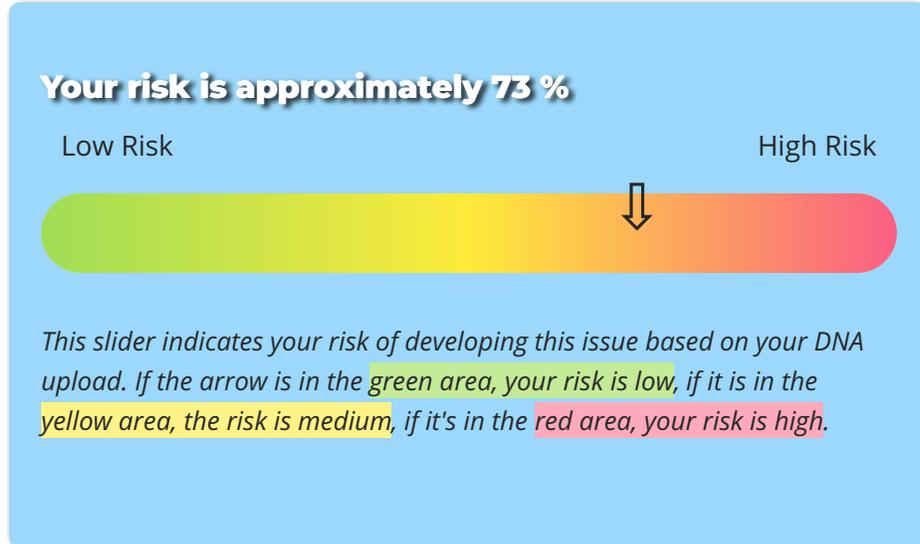
Salt Intolerance



If your slider shows close to or greater than 50% you may have increased sensitivity to salt that can lead to hypertension risk in some people. Others can tolerate salt without repercussions. Salt can be highly addictive. Salt need and cravings may be linked to the same brain pathways as those related to drug addiction and abuse. The type of salt consumed can make a difference as well.

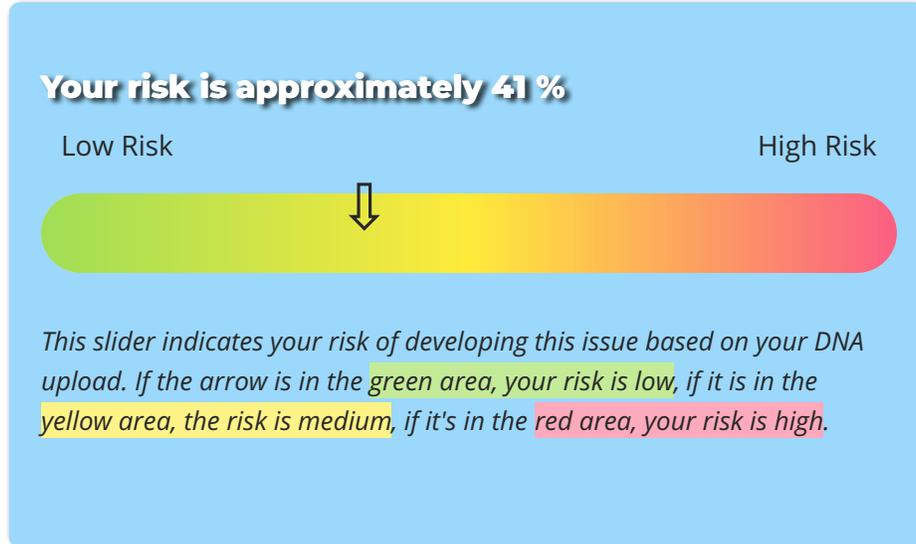
Consuming salt that contains minerals such as sea salt and earth salt can be a more healthy choice as they contain higher levels of minerals that are beneficial. [Here is a good article on the different types of salt and their benefits.](#)

Serotonin and Tryptophan Intolerance



If your risk slider shows close to or greater than 50% you may have issues with a build up of tryptophan in your body. Those persons with MAO and TPH genetic variants have difficulty processing tryptophan and serotonin and are highly susceptible to mood imbalances, irritability and aggressive behavior. The TPH enzyme breaks down tryptophan and the MAO enzyme breaks down serotonin, variants impair the ability to break these down, so low levels of serotonin tryptophan in the diet are suggested. This includes the precursors to serotonin such as tryptophan and tyramine. These persons might benefit from avoiding chocolate, wine, hard cheeses, turkey, spinach, and other foods high in tryptophan. In addition, spicy food can increase irritability in those with MAO variants. There is a more extensive list of tryptophan foods at the end of this report.

Soy Intolerance

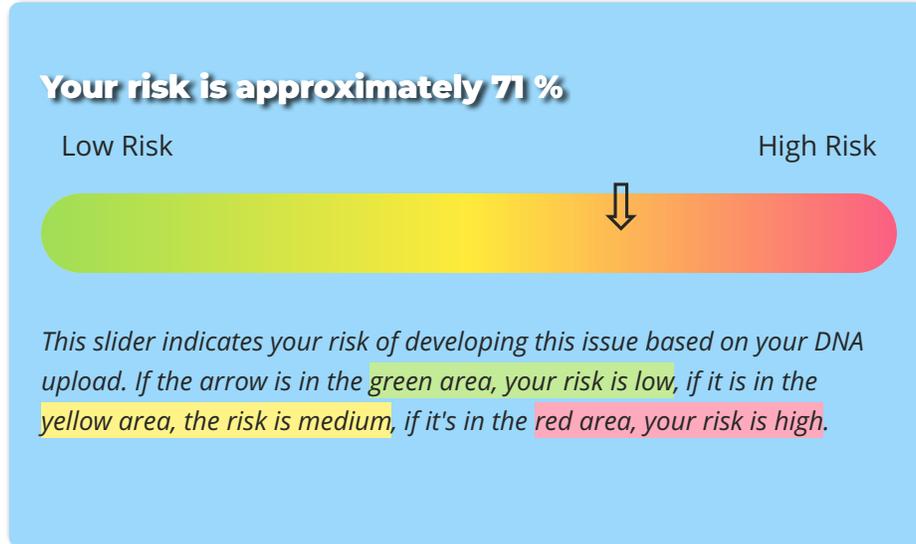


If your slider shows close to or greater than 50% you may have an issue with consuming soy products. Those with certain genetics variants would benefit from avoiding foods that contain soy. These persons have a harder time getting rid of those foods that are estrogenic such as soy products. They would also be wise to avoid hormone replacement therapy or birth control pills that contain estrogens as they have difficulty eliminating estrogens and their metabolites from the body. [Soy allergies](#) are fairly common as well. Symptoms may include diarrhea, vomiting and colitis with the ingestion of soy products.

Soy protein is not an ideal protein because it is deficient in the essential amino acid methionine. In addition, the practice of growing soy in this country is now largely GMO based (94%). [The results of most studies with GM foods](#) indicate that they may cause some common toxic effects such as hepatic, pancreatic, renal, or reproductive effects and may alter the hematological, biochemical, and immunologic parameters.

[Read more here](#) on the controversy over GMO foods.

Sulfur Intolerance



If your risk slider shows close to or greater than 50% you may have issues with the ingestion of sulfur foods and additives. Those with certain genetic variants might benefit from a low sulfur diet as these variants would slow the clearance of sulfurs in the body. This can lead to imbalances in brain chemistry, anxiety, allergic reactions, lung problems and digestive distress. Foods that are high in sulfur include wine, beer, eggs, onions, garlic, broccoli, cauliflower, and coconut products.

[Sulfite sensitivities](#) occur on occasion as well. Adverse symptoms may include flushing, dermatitis, urticaria, hypotension and diarrhea to life-threatening anaphylactic and asthmatic reactions.