## The Many Healing Benefits of Probiotics By Dr. Ramona Warren

We have learned a lot about the digestive tract in the past few columns. Specifically, we've learned how digestion is the true foundation of health and how poor digestion can be connected to a variety of symptoms. As we finish up our discussion on the gut, let's take a look at the importance of our gut flora.

A healthy body contains about 100 trillion bacteria, with approximately 85 percent being considered "good" (or beneficial) bacteria and about 15 percent "bad" (or pathogenic) bacteria. Both good and bad bacteria, in the proper ratio, are necessary for good health. Problems occur when our gut flora gets imbalanced. Imbalances lead to leaky gut, an impaired immune system and a multitude of symptoms.

Processed foods, antibiotics, chlorine, fluoride, toxins and especially the consumption of sugars can all cause an imbalance in gut flora. Eating sugars throws the gut flora out of balance because sugar feeds the bad bacteria. Symptoms that can indicate an imbalance in your gut flora include: constipation, diarrhea, nausea, gas, bloating, headaches, fatigue, cravings for sugar and carbs, leaky gut and irritable bowel syndrome. Additionally, there are many other conditions connected to poor gut health that we often fail to associate with the gut, including colds, flu, pneumonia, insulin resistance, diabetes, chronic fatigue syndrome, acne, cholesterol, high blood pressure, depression and psychological health.

One reason our gut health impacts our mental health is because the gut is our "second brain." As we are developing in the womb, the same tissue develops into both the brain and the gut. The central nervous system (your brain) and the enteric nervous system (your gut) are connected by the vagus nerve, which runs from the brain into your abdomen. Serotonin, which is a neurotransmitter involved in mood control, depression and aggression, is found in your *intestines*, not your brain! This may be why antidepressants that work to raise serotonin levels in the brain often don't work well. To raise serotonin levels and help depression, we must focus on the gut and make proper dietary changes. Other neurological problems, such as ADHD and autism, have also been associated with gut problems. In fact, there are many studies that have shown an association between gluten intolerance and autism. If you want to keep your brain healthy, it is important to keep your gut healthy. (For more information, you may want to read *The Second Brain* by Michael Gershon.)

Probiotics help restore proper balance to the gut flora. A probiotic is simply a live microorganism that helps provide health benefits when consumed in adequate amounts. Probiotic literally means "for life", which is opposite of antibiotic which is "against life." These microbes line your gut and help with the absorption of nutrients, while also improving immunity.

Russian neurologist, Dr. Natasha Campbell-McBride, states that, "Probiotics are essential for optimal digestion of food and absorption of nutrients. They help your body produce vitamins, absorb minerals and aid in the elimination of toxins." Other research indicates probiotic supplementation is probably more important than taking multivitamins, and its importance for your health is right up there with vitamin D.

Probiotics can be found in fermented foods such as sauerkraut, kombucha, tempeh, kimchi, miso, natto, and various pickled fermented foods such as cucumbers, yogurt and kefir. However, you want to avoid the commercial versions of yogurt and kefir, which have had the live cultures destroyed with processing. These products are also loaded with sugars. Better choices would be yogurt or kefir that comes from the raw milk of grass-fed sheep and goats. Unfortunately, this is not something you will be able to just run out to the store and buy.

Not everyone likes fermented foods so probiotic supplements can be a good choice. However, not all probiotics are the same. There are specific strains for specific disorders. Even though many of the probiotic strains overlap, recognizing that different types of probiotics can have different effects on the body can be helpful in restoring balance to your gut flora.

To further improve your gut flora, make sure to eat REAL foods including plenty of vegetables, lean meats and healthy fats. Reduce your toxic exposure to chlorine, fluoride and environmental toxins. These steps will improve your immune system and help you avoid the need for antibiotics, which break down gut flora and cause imbalances. If you do take an antibiotic, make sure to take a probiotic as well. However, you will need to take the probiotic two to three hours after the antibiotic so it doesn't impact the antibiotic's effects. Look for quality probiotics that have a high bacteria count and are from live cultures and quality sources.

If you would like to receive a reference guide detailing appropriate probiotic support for specific disorders please email me at <u>pathwaysth@gmail.com</u>.

I want to thank my friend and colleague, Dr. Suzanne Butler, for her contribution to this week's article. She has her Masters in nutrition and also focuses on Functional Medicine in her treatment of patients.