

Inflammation in the Intestines

Cathy and Michael Shea, February 2021

Metabolic syndrome now exists in the majority of the world's population especially in westernized countries eating a diet rich in processed food and constant stressors. Depending on an individual's epigenetics, the genetic imprinting from a person's family lineage as well as prenatal imprinting, an individual can express metabolic syndrome quite differently on a scale of cancer, dementia, type 2 diabetes, cardiovascular disease, obesity and auto-immune disorders such as irritable bowel disease (IBD).

IBD begins/incubates with IBS (irritable bowel syndrome). It has mechanical contributors, metabolic contributors, and emotional/sexual abuse contributors. The metabolic issues cause low grade inflammation from eating processed food primarily. Most people don't know the difference between a food sensitivity which is more insidious. Food sensitivities show up three to five days after eating a certain food. Full-blown allergies give immediate conscious feedback/discomfort/pain from distension either in the gut or any place in the body via the Vagus nerve's role in the neurological inflammatory reflex cycle.

There are three categories of IBS: constipation related, diarrhea dominant, and the combination of intermittent diarrhea and constipation. This is why it is so difficult for most medical doctors to diagnose it without also knowing abuse history. Functional medicine doctors tend to understand it better. When the inflammatory condition persists over a period of time, which again is different for each person based on their genetic predisposition from prenatal imprinting and/or abuse history, it leads to IBD: irritable bowel disease. The most common forms of IBD are Crohn's Disease and Colitis.

The main symptoms of IBD are blood and mucus in the stool. The typical medical intervention is steroid medication. Some complementary medicine practitioners find that rectal insufflation of ozone is much more effective and safer. There is a German protocol by the name of Koch that outlines the frequency of ozone and the concentration needed in the progressive stages of a treatment plan for IBD.

However, what initiates all metabolic syndrome disorders is the very common "leaky gut syndrome." The tight junctions between the cells of the epithelium of the small intestine and its villi become weak. They become progressively more damaged by inflammatory cytokines from an up-regulated immune system over time. The weakened barrier function of the epithelium allows unhealthy molecules/bacteria and so forth to pass thru to the lymph and vascular systems. Since 80% of the immune system is located in the epithelium of the intestines (Peyer's Patches form the bridge between acquired and innate immunity), complex inflammatory conditions become systemic in the body especially the endothelium of the arteries and veins.

Kolacz and Porges (Trauma, Pain and Gastrointestinal Function, May 2018, *Frontiers in Medicine*, Volume 5) say this about IBS: "Rates of gastrointestinal problems such as irritable bowel syndrome are similarly elevated in survivors of abuse. Meta-analytic evidence supports this with childhood sexual abuse being associated with higher risk of gastrointestinal problems. It is estimated that individuals with a history of sexual abuse are about twice as likely to develop abdominal pain and gastrointestinal problems than those without an abuse history. As seen with fibromyalgia, rape survivors are among those with the highest risk, with meta-analytic methods suggesting their odds of having a functional gastrointestinal disorder are about four times greater than those without an abuse history. Those with an abuse history also have higher severity and quantity of GI symptoms and seek medical help more often. Overall, these robust associations suggest that abuse and trauma experiences may be key to understanding the pathogenesis of fibromyalgia and irritable bowel syndrome."