

HEALTHY YOU

Check Your G.I., Joe (and Jane)

7 unexpected ways a well-nourished gut can make you stronger, fitter and happier

BY CLINT CARTER



THINK ABOUT the last delicious thing you ate. Chances are, no matter how enjoyable the meal, once it found its way over the teeth and past the gums, you pretty much forgot about it. Once it's in your belly, it's out of sight, out of mind.

But what happens to that meal in the next 24 to 72 hours or so will have an enormous impact on your health. That's when smooth muscles push food bits through 30 feet of living drainpipe, as acids and enzymes melt these particles into sludge while a bacchanalia of microbes convert them into chemicals that power your brain, muscles and immune system.

Subtle changes in gut health can have a powerful effect on how you look and feel, says Megan Rossi, a research fellow at King's College London and author of *Love Your Gut*. "Research has linked dysbiosis, an imbalance of gut bacteria, to more than 70 chronic diseases."

Fortunately, the solution to almost any gut problem is simple: Build each meal around fiber-rich foods, such as fruits, vegetables, beans, seeds, nuts and whole grains. These foods provide outstanding nutrition not only for you but also for your microbiome, the medical term for the massive, diverse community of bacteria living and working within your digestive system. And while it's best to get your fiber from food sources, a fiber supplement can help you reach your goals. However, only nonfermenting, gel-forming fiber (such as psyllium husk) has been clinically proved as beneficial. Here's what you'll get from feeding your bacteria well.

1. You'll lose weight

Researchers constantly see different types of gut bacteria living inside thin and overweight people. One example: When researchers in Italy assigned 20 obese women (average age: 79) to a low-sugar Mediterranean diet with 30 grams of daily fiber from vegetables, they saw a spike in bacteria associated with weight loss and a drop in bacteria related to obesity. Not surprisingly, the women lost an average of 2.7 percent of their body weight in 15 days.

2. You'll get stronger

If your gut lining becomes inflamed from an imbalanced microbiome, it becomes porous—what's known as a leaky gut. Bacteria that are supposed to remain locked inside your intestines can enter the bloodstream and kick up inflammation in your gut lining and other body tissues, undermining your muscular strength. When researchers at Wake Forest University put 288 people, ages 60 to 79, through a battery of simple fitness tests that included standing up from a chair and walking 400 meters, they discovered a direct correlation between gut leakage and muscular weakness.

3. You'll think more sharply

Once in your bloodstream, microbes can be carried to your head. "Then the brain has to mount an inflammatory response," explains Kylie Kavanagh, an associate professor of pathology-comparative medicine at the Wake Forest School of Medicine and an author on the leaky gut study. Over time, that response can increase your risk of dementia.

And bad gut bacteria can produce chemicals that directly hinder your ability to think. "There's more nervous tissue in the G.I. tract than anywhere else in the body, aside from the brain," says Michael Pezzone, M.D., chief of gastroenterology at the University of Pittsburgh's UPMC Mercy. "So, some bacterial byproducts can make you feel foggy."



4. You'll sleep better

Recently, 474 people ages 18 to 94 filled out sleep questionnaires. Then they submitted stool samples. Researchers found that participants with more microbiome diversity slept more deeply than did those with less. Another study showed that people with microbiome diversity fall asleep faster and perform better on cognitive tests—just as you'd expect from rested brains.

5. You'll ease belly woes

According to the Cleveland Clinic, some people may be helped by taking probiotics (through diet or supplements), the common name for active bacteria or yeast that help break down food in the gut. Probiotics seem to help, these researchers say, with diarrhea, constipation, inflammatory bowel disease, irritable bowel syndrome, yeast infections, urinary tract infections and even gum disease. The National Institutes of Health notes that “there is some evidence that probiotics may be helpful” in treating acute diarrhea or diarrhea associated with the use of antibiotics in adults. If you're thinking about taking one of these popular supplements, medical experts' advice is to talk to your doctor or other health care provider.

6. You'll catch fewer colds

Two-thirds of the body's immune cells live in and around the gut, and they take cues from the microbiome, says Dawn Bowdish, a professor of molecular medicine at McMaster University in Hamilton, Ontario. “As gut microbes change with age, some of that immune education starts to fall apart.” Changes in the microbiome offer a partial explanation for why older people are more susceptible to common colds and viral infections.

7. You'll just plain feel better

After studying the microbiomes of more than 2,100 people, researchers in Belgium and the Netherlands found that symptoms of depression were highest among people with depleted levels of two key bacterial strains—*Dialister* and *Coprococcus*. But fiber can help. When researchers assigned moderately to severely depressed people to 12 weeks of either counseling or eating a plant-based Mediterranean diet, those in the diet group were four times more likely to see a significant emotional improvement.

Clint Carter writes for Men's Health and other wellness publications.

5 'GUT-HEALTHY' OPTIONS THAT AREN'T

Sweetened Yogurt

→ The bacterial cultures in fermented dairy are absolutely good for your gut, but the added sugars are not. Sugar feeds bad bacteria, causing more harm than good, says Wake Forest University's Kylie Kavanagh.

Wheat Bread

→ Emulsifiers found in shelf-stable supermarket breads may cause damage to the walls of the gut, and many "wheat" breads aren't whole grain. Look for "100% whole wheat" bread with a minimum of chemical additives.

Herbal-Laxative Tea

→ Long-term laxative use, even the herbal kind, can interfere with intestinal nerve function, notes the Cleveland Clinic. Of particular concern is an herb called senna, which irritates the bowel walls and can cause liver damage.

'Light' Prune Juice

→ Noncaloric sweeteners found in "light" juices can throw off your microbiome. The by-products from our microbes' digestion of artificial sweeteners are as unhealthy as the by-products that come from their eating sugar.

Packaged Veggie Burgers

→ There's nothing wrong with pressing vegetables into a patty, but check the label. The standard supermarket veggie burger is often a blend of fillers such as wheat gluten, vegetable oil and chemicals.