

The Complete Protocol to Restore Your Gut Health

Aaron Hartman, MD



GI PROTOCOL

Below is a step by step protocol to implement for 8-12 weeks to help repair your Gi tract health and function. Please start them sequentially from top to bottom, one at a time to begin each step. Specific supplements that are needed only for a short term are specified. Others will be stopped in 2-3 months and some patients will stay on others for 3-6 months or longer. That will be determined in three months after beginning the protocol. As always, you should consult with your personal health care practitioner prior to starting any new health related program.

As well there is a detailed blog series on our website that reviews the basic elements of Gi tract function and how it affects your health. It also addresses how to amend and repair digestive issues. It is a good educational complement to this protocol. Please visit those resources here.

Following the steps below to individualize your own GI protocol can be daunting. So for those whom this is a bit too much, I've created a simplified GI Protocol at the end that anyone can undertake.

Please supplement your diet with bone broth, 12 ounces twice daily. Ideally this would be made at home.

The nutrients and minerals in bone broth are critical for connective tissue repair, especially in your GI tract. Do not do this if you have diagnosed food allergies to a meat product. Options include beef, chicken, turkey, bison, lamb, venison and fish bone broths.



There are several major GI plans that have been assembled by the faculty at the Institute for Functional Medicine. You will be using one of their programs that most closely aligns with your underlying condition. To determine which food plan you should follow, please review them individually and see which most aligns with your current underlying health conditions or review them with your health practitioner. Most individuals opt for the Elimination Food Plan during their gut repair program. For these plans visit

https://richmondfunctionalmedicine.com/nutrition/



The Phytonutrient Spectrum food listing is a way of eating, not a specific diet. It ensures that you get at least 10 servings of vegetables and fruits daily. If you are already doing this then there is no need to implement this into your program. Most however will need to increase their consumption of fruits and vegetables. These are nutrient dense foods that will help to replenish missing reserves, improve organ function and decrease overall inflammation. Typically, it is interwoven into a base food plan (like an elimination diet). Please review the Phytonutrient Spectrum on our website under the Nutrition tab. This is in addition to your base food plan (i.e. Elimination vs. Detox, vs. Metabolic vs. other). If you are unable to determine which food plan applies to you, using the Elimination Plan is a good starting place that would work for most individuals.

Finally, this is a lot to digest. Some will need a health coach to help guide them through this process and implement their plan. Please consider this if you believe you may need extra support in this process.

All supplement recommendations are available on our website under the Supplement tab. We offer them at a 25% discount as a convenience to help facilitate compliance. Feel free to shop around or purchase at your favorite location but be sure to purchase only high quality pharmaceutical grade supplements. Click here for more information.

Lifestyle Plan

Always start any program with lifestyle changes. These actually are the most important initial steps.

The first step is maximizing your nutritional status through diet. You are what you eat. Literally. Food can either be the best type of medicine or the slowest kind of poison.



Around 70% of the carbon in an

American's hair originates from corn, as compared to 5% of Europeans. Recent population studies have shown 50% of chronic disease in our country can be related to consumption of processed foods and according to the



Harvard School of Public Health, 80% of heart disease and 70% of cancer can be prevented by diet and lifestyle alone. The following basic nutrition principles can be utilized to improve or maintain your personal health. These can be followed after completing your Gi restoration program.

- 1. Always eat real unprocessed food. Period.
- 2. Eat a plant-based diet (i.e. >50% of what you eat on a daily basis is plant life). Organic as best as possible. If unable to afford organic, then use the Clean 15 listing from the Environmental Working Group (EWG.ORG) to guide your purchases, not everything has to be organic (i.e. avocados) while others have to be organic (i.e. strawberries). The EWG has an app you can put on your phone for quick reference.
- 3. Avoid all processed sugar and only use natural sugars in moderation (i.e. raw honey, grade B maple syrup, coconut sugar, monk fruit, stevia, organic cane sugar (most sugar is from GMO sugar beets))
- 4. Eat only pastured, grass fed beef from a reliable local source, pastured chicken supplemented with organic feed or wild caught fish and seafood (not farmed). NOTE: every farm supplements the chickens with feed, so it is critical to find out that source.
- 5. Source foods locally as much as possible and eat seasonally (i.e. don't eat blue berries in February if you live in Alaska).
- 6. Always ask your local farm or salesperson about the food sourcing. Local farmers markets are a great source. If they do it the right way, they will be excited to talk to you about it. If they seem bothered by your questions, their farming practices probably don't meet our standards.
- 7. Don't use starches/grains as fillers, but as condiments (i.e. a carb/starch like rice or potatoes shouldn't be more than 25% of a meal).

The next is sleep. Sleep can be influenced by and influence the gut microbiota (i.e. bacteria that live in the GI tract and that can be helpful or harmful to your health) as well as hormone levels and inflammation. You should plan to shoot for 8 hours of sleep at night. If you have issues with this, please refer to Suggestions for Better Sleep on our blog.



Additionally you should have some sort of exercise routine or plan. Exercise can improve gastric motility, serotonin production in GI tract and improve sleep. You should do something at least 3 times a week for 20-30 minutes at a low to moderate intensity at the beginning. As tolerated, you may increase this. Your body was designed to work outdoors 8-10 hours a day, so



obviously incorporating this back into your health routine is huge.

Chronic daily stress has become the norm for many in our culture and few realize its negative health effects. Chronic stress raises blood cortisol levels. This elevation is associated with digestive issues, breakdown of the gut lining and blood-brain barrier, inflammation (which some now refer to as infla-ageing) and increased nutrient demands to list a few. The new field of research called Psycho-Neuro-Immuno-Endocrinology has emerged from our understanding of stress and its effects on our health. Other resources on this topic are coming on our website. Ways to reduce stress include the following: meditation, prayer, yoga, tai chi, chi gong, nature journaling, nature walks and exercise. Whatever you habit, some form of stress reduction should be included in your weekly schedule.

Relationships are key to everyone's personal health and well-being. We are all born into families, we grow up with peers or siblings, we get jobs and then must relate with a wide variety of different individuals at different levels. The core relationships that are important for our personal well-being are those who are closest to us, typically our spouses and family. One of the key concepts here is to avoid toxic relationships (i.e. those who we interact with who set us on edge). Relationships are also important in your healing process. You will need others who will rally around you as you change your lifestyle and living patterns and then will encourage you as you move forward. This leverage point requires a great degree of introspection as only you know which relationships are treasured and add value to your life and which are toxic.



General Considerations

- 1. Always start supplements at the lowest recommended dose and slowly increase. If you have gas, bloating diarrhea, then hold at that dose and wait for symptoms to abate.
- 2. If unable to tolerate a supplement you can either try another of the category list, or add on a supplement from the next category and once



adjusted to it, retry the one you reacted with (as long as it was not an allergic or adverse reaction).

- 3. Keep in mind that many times your body is not ready for a supplement and you must 'work up' to it. Listen to your body and how it responds to each step of the protocol. Many of these reactions, especially at the beginning, can be from bacterial die off or a detox reaction known as a "herx" or "herxing." This is a good thing, but only as tolerated and only if it is not an allergic response.
- 4. Always read the supplement container for specifics of whether to take with or without meals and the time of day the supplement should be taken.
- 5. Some people can't start with the program below and need a Prep Phase. This can be accomplished by using a Medical Food to help prepare them for their program. This is because some people are either so nutrient deficient, inflamed or toxic that a program like the one below is just too much. See below under the Other section for details.



GI TRACT RESTORATION PROTOCOL: THE 5R PROGRAM REMOVE

This phase lasts from 4-6 weeks at a minimum. People have the most reactions during this phase. Typically, this phase consists of one antimicrobial product (8 weeks) and one detox product (3 months) combined with dietary changes.

Please start the <u>Elimination Food Plan</u> or <u>Detox Food Plan</u> (available on our website). The begin the following sequentially:

- FC-Cidal: 2 caps twice daily WITH Dysbiocide 2 caps twice daily (by Biotics Research)
- OR Allicin 450mg twice daily, ADP Oregano 2 pills twice daily (Biotics),
 Berberine Complex 2 caps twice daily (Integrative Therapeutics)
- **Detox Formula**: 2 caps twice daily (Vital Nutrients)
- **IgG Protect Powder** (by Ortho Molecular): one scoop once to twice daily. Helps alleviate immediate inflammation in GI tract and remove enterotoxins (Lipopolysaccharide)

OPTIONAL STEP 1

If unable to do the above and you need a gentler start, then reattempt the above after the following. You may need to introduce one at a time below and then work onto all of them to help heal the gut lining to prepare for Step 1.

This is done while continuing you basic Food Plan (i.e. Detox/Elimination Food Plan). You may also need to 'prep' your system with a Medical Food, see Other below for details.

- **Sialic Acid:** 500mg twice daily (Allergy Research Group) coats the stomach and GI tract
- Aloe Vera Juice: several ounces twice daily coats stomach and Gi tract
- Mucosagen (by Ortho Molecular): 2 capsules three times daily



REPLACE

This phase typically includes one digestive enzyme and a multi-vitamin. Begin these 4 weeks after the beginning the *Remove Phase* and continue typically for 3 months to replete missing nutrients and enzymes. This phase may be long term. Depending on symptoms (i.e. gas bloating just after a meal vs. 45 minutes later) you may need betaine or Swedish Bitters (replaces stomach acid) in addition to basic enzyme support.

- Polyphenol Nutrients (by Pure Encapsulations)
- Pancreatic Enzyme Formula (by Pure Encapsulations): 1-2 with each meal
- **Swedish Bitters** with each meal

IF SIGNIFICANT INFLAMMATION

- After initial additions, consider anti-inflammatory herbs and/or omega 3's
- EPA/DHA Liquid (by Pure Encapsulations): 1 tsp twice daily
- **Swedish Bitters** as directed
- **CurcuMax Pro** (Integrative Therapeutics): 1 capsule daily three times daily with food.

TESTING FOR LOW STOMACH ACID

Only do this under direct supervision of a healthcare professional!

This is to see if you have low stomach acid which is typically associated with gas/bloating 30-45 minutes after eating a meal, multiple nutrient deficiencies, or undigested food/protein in stool.



Betaine HCL test for low stomach acid:

- 1. Take 1 Betaine HCl tablet (350-750 mg) with a meal that contains protein. If ANY negative symptoms (tingling or warmth in stomach, GERD, diarrhea, neck ache, etc.) STOP. The test is over.
- 2. If no change or improvement felt: Continue for 2 days, then increase to 2 tablets at each protein-containing meal. Continue this process, stopping any progression if any of the above symptoms are felt. Take that number of capsules, minus one, and that is your maintenance dose
- 3. Increase up to 2500 mg with meals. DISCONTINUE OR CUT BACK if any discomfort. This is the hydrochloric acid causing irritation and is a sign that there is too much acid in the stomach.
- 4. Continue maintenance dose determined as above for 4-6 weeks then see if you can slowly wean off these.
- 5. Pay attention to bowel movements, consistency and look for undigested food particles. Report these to your health care practitioner.

REINOCULATE

This phase is marked by prebiotic fibers and probiotic organisms.
Begin this on week 8 of your protocol. If you consume more than 50-60g of fiber daily, then you can just take one of the probiotics. Most however will need a fiber of some sort.



Once on a probiotic, you should alternate it every 2-3 months. There are more choices available on our practice website.

Ideally you would consume real fermented foods instead of the probiotics (i.e. sauerkraut, kombucha, kefir, lassa, yogurt) but since this is not possible for most, the probiotics will be needed long term. However, the ideal is consumption of fermented foods!



- Arabinogalactan Powder (Vita Nutrients): 1 tsp once to twice daily OR Acacia Root Powder 1 TBSP daily (by Heather's) OR Konjac Root Powder 1 tsp daily
- Organic Psyllium Husk powder (Metabolic Maintenance): one scoop up to 3x a day or India Organic Psyllium (you may not need this if the previous prebiotics are maintaining your daily bowel movements)
- *Probiotic Once to twice daily like Therabiotic Detox Formula by Klaire Labs (choose one from the listing under xxxReinoculate, found under the <u>Supplements tab at the FullScript's link on our website</u>. More more choices are available under the Probiotics listing as well).

REPAIR

This phase is designed to directly address the inflammation found in the gut lining. It is designed, after all the above, to help this lining to heal. Start this phase on week 10. Continue these products for 3 months then stop.

- GI Repair Nutrients (Vital Nutrients): 1 tsp two to three times daily
- **Zinc Carnosine** (Integrative Therapeutics): one capsule daily
- Lglutamine (Klaire labs): 1 scoop twice daily

OPTIONAL ADD ONS

- Ultimate Glucosamine NAG: 1 scoop twice daily,
- Inflammatone (Designs for Health): 2 capsules between meals

If you have multiple food sensitivities, then extra care needs to be focused on this step in both the Nutrients and Botanical categories. Typically, there is either IgG or IgE food testing that shows significant immunologic reactivity or an advanced stool analysis. This will be determined by how you respond to the above up to this point. Examples are as follows:

- **Nutrients**: essential fats: 2-10 g/day as needed, glutamine: 10-30 g/day as needed,
- Magnesium: 250-500 mg of a magnesium/amino acid chelate as needed
- Adequate Zinc: 10-25 mg as needed



• **Botanicals**: ashwagandha, astragalus, berberine, Cat's claw, curcumin, Fenugreek, Marshmallow Root (Althea officinalis), apple procyanidins

REBALANCE

This phase is marked by addressing all the other functional issues that can affect GI function. This includes addressing stress, anxiety, sleep, adrenal function, hormones, thyroid function, GI motility, to list a few. Interventions include acupuncture, mind-body work (like meditation), as well as mindfulness meditation (including mindful eating; i.e.- sitting down to eat and chewing food adequately. This is a big deal especially since 25% of digestive enzymes are secreted before you even take your first bite!).

TRANSIT TIME MODULATORS

Acupuncture

• **D-Limonene**:1000mg twice daily

• **Iberogast**: 20 drops three times daily

• **Ginger**: 1500-2000mg daily (or make ginger juice)

Peppermint oil

If you are dealing with constipation, the above can help to naturally get your bowels to move daily.

If you have significant food sensitivities shown on lab testing, this is when you start to reintroduce foods from the lowest reactivity to the highest reactivity. Typically, the IgG foods are reintroduced after 6 weeks to 6 months depending on the patient and degree of gut restoration. IgE food reintroduction starts at 3 months unless allergic reactions or significant responses were noted (i.e. not just from the lab testing)

Those with Mast Cell Activation Syndrome or similar issues would add sequentially some of the following, if not already taking, to address the gut lining and immune system inflammation only after an intense GI Protocol has been followed.

• **Medications**: loratadine, singular, albuterol, fexofenadine, cetirizine, levocetirizine, cromolyn, ketotifen



- **Botanicals and Nutrients**: multivitamin with polyphenols, green tea, curcumin, boswellia
- Antihistamine: stinging nettles
- Anti-inflammatory: vitamin D, aloe vera, essential fatty acids, deglycyrrhizinated licorice, pycnogenol.
- Antileukotriene: Quercetin, magnesium chelates.

OTHER

Here we include Medical Grade Foods. Some practitioners will use these alone as their detox or GI repair program. We tend to have a 'food first' approach and so use these as an adjunct, but for some they are a critical component.

If you are having a hard time changing your diet, you can start with a simple meal replacement program where one meal a day (typically breakfast) is replaced with a medical food, or instead of snacking you would do a medical food. These are more than just protein powders but are designed to be what the name implies, a medical grade food.

On the extreme end some (we don't typically recommend this) will do an elimination diet that revolves around a medical food, replacing one meal a day consecutively over a period of a week with a medical food until that is what they are drinking for all their meals and snacks (3-5 times a day), then continue that after 5 days. Again, we tend to use these as an adjunct. Our typical suggestion is to use one of these as a replacement for breakfast then again as a snack later in the day, that way you are dosing it twice daily.

- UltraFlora Intensive Care (Metagenics)
- UltraClear Renew (Metagenics)
- UltrainflamX Plus 360 (Metagenics)
- UltraGI Replenish (Metagenics)
- Physicians Elemental Diet (Integrative Therapeutics) for those with extreme sensitivities



SIMPLIFIED PROTOCOL

The following is a simplified protocol intended for use as a general 5R Program (Remove, Replace, Restore, Rebalance, Repopulate)

MONTH 1

Step 1: as tolerated, starting one at a time and slowly increasing over 1-3 weeks. Continue for 2 months.

- Oregano Oil (Designs for Health): 2-3 capsules twice daily
- GI Microb X (Designs for Health): 2 capsules twice daily

Step 2:

• A.I. Enzymes 1-3 capsules with each meal depending on the meal size (Pure Encapsulations)

Step 3: start this on week #3-4

- Lactobacillus (Allergy Research Group) 1 capsule once daily and slowly work up to three times daily
- Florastor 250mg capsule twice daily (Klaire Labs)
- **GI Repair Nutrients** (Vital Nutrients): 1 tsp two to three times daily (for one container)
- **Zinc Carnosine** (Integrative Therapeutics): one capsule daily (for one month)
- L glutamine (Klaire Labs): 1 scoop twice daily (for one month)

MONTH 3

Depending on how doing, if still w/ issues. After finishing up with Step 3, rotate to the following:

- Paracid Forte (Ortho Molecular) 2 pill twice daily
- Candacid Forte (Ortho Molecular) 3 pills twice daily

At the beginning of Month #3, if not feeling any better, consider an elemental diet.



YOUR NEXT STEPS

Now you've learned the essentials on how to address you gut issue and rebalance your gastrointestinal you are ready to implement these changes in your life.

Please review any program you may intent to start with your personal licensed health provider prior to implementation. Traditional approaches to treating digestive disorders usually involve "watching and waiting" and taking medication. Sometimes surgery is necessary if the disease advances far enough.

But remember, a dedicated series of changes in your diet and lifestyle is the quickest, least invasive and most effective treatment option available today. Treating the root cause of your symptoms is less invasive and extremely advantageous to your overall health.

For more information, feel free to visit our website to access more information and learning tools. If you feel that you want to take your health to the next level, we can address that during a functional medicine health evaluation. You can register on our or call our office for more details.

SCHEDULE YOUR PHONE CONSULT ONLINE OR CALL

Put your fears to rest – there is hope. Call now to discover the ways we can work with you to help you overcome your digestive health issues.

We look forward to helping you.

Aaron Hartman, MD

Richmond Integrative & Functional Medicine

13911 St. Francis Blvd, Suite 101, Midlothian VA 23114

Phone: (804) 221.4506

https://www.facebook.com/RVAintegrative https://richmondfunctionalmedicine.com



ABOUT AARON HARTMAN, MD

Dr. Hartman's interest in integrative & functional medicine first began after he and his wife Rebekah adopted their first daughter Anna in 2007. The medical system didn't offer much hope for Anna's medical condition and they were forced to explore alternative treatments. Over time, Aaron began to apply the new concepts and treatment modalities he was learning to his clinic patients as well as his own family. In 2012 he formalized his commitment to exploring new and advanced treatment opportunities through his membership with the American Board of Integrative and Holistic Medicine and then the Institute



for Functional Medicine. In 2015 he received his second board certification in Integrative and Holistic Medicine through the American Board of Physician Specialties and in 2016 earned the recognition as a Certified Practitioner in Functional Medicine from the Institute for Functional Medicine.

In 2012, Aaron and Rebekah's commitment to their family's health led them to move to a little farm outside of Richmond, Virginia. This led to Dr. Hartman's intense interest in nutritional medicine as well as ecological medicine and toxicology.

Dr. Hartman opened Richmond Integrative & Functional Medicine in 2017. His mission at RIFM is to apply the sum total of his scientific research, medical knowledge, clinical experience and continuing studies to his patients in an individualized manner. This new field of medicine has been called Functional Medicine, Integrative Medicine, Systems Biology Medicine and Root Cause Medicine. At its core is the application of the sum total of current and ongoing scientific knowledge in the context of modern medicine, allowing for the appropriate integration of other healing traditions as appropriate, in an individualized manner.

