

Nutrition: Women's Health, Part 4

Stress management, of course, is key for all of the reasons that we've already discussed. HPA axis dysregulation influences ovarian-thyroid activity. Regular stress management must be a component of any hormone-balancing approach. So, strategies could include things like mindfulness-based stress reduction, meditation, yoga, tai chi or qi gong, deep breathing, any kind of artistic expression, listening to music, laughter, watching funny movies or videos, spending quality time with loved ones, spending time outdoors in nature, especially important.

Sleep, of course, is crucial; circadian rhythms impact hormonal production, as we've discussed, so we want to aim for seven to nine hours of sleep per night. You also want to regulate exposure to artificial light, which is the most profound influencer of the circadian central clock. So minimizing exposure to bright or blue light from electronic devices at night, which we discuss in the exposome elsewhere in this unit, and also in my book in the chapter on sleep, and you want to maximize exposure to sunlight during the day. We are providing a handout which you can use and generate in a PDF generator for HPA axis modulation. That will be in the functional medicine unit, and we summarize all the strategies for optimizing artificial light, or light exposure in general, not just artificial light.

Women should do their best to avoid environmental estrogens, xenobiotics; these excess estrogens can come from environmental exposure. Common sources include plastic containers, cosmetics, food and water, household cleaning chemicals, and medications. We're learning a ton about these over the past decade or two. There's lots of research showing that toxins in our environment can have estrogenic effects, particularly plastics. So, eating organic food, buying non-toxic body and home products, using stainless steel or glass containers to store food and beverages instead of plastic are all important. Minimizing your handling of receipts, as well; receipts are one of the greatest sources of bisphenol A, BPA, and I wrote an article a while back about how using hand sanitizer and touching receipts, which can happen in restaurants or grocery stores, can transfer an astounding amount of BPA to the bloodstream, so these are things which should be taken into consideration.

Of course, we want to support gut health. We know from this training program and probably other resources that there's a profound connection between the gut and health overall, but also between the gut and hormones. The microbiome helps to detoxify excess hormones; there's actually something that's been termed the estrobalome, which refers to the connection between the gut microbiome and estrogen metabolism in particular. Some species of bacteria can upregulate estrogen metabolism, others can downregulate it, so this is a new field of study that's particularly interesting related to women's health. Gut dysbiosis can lead to impaired clearance of excess hormones, especially estrogen, because of this, so you want to do all of the things that we're going to be talking about throughout the program to support gut health, like increasing consumption of fermented foods and fermentable carbohydrate, and then possibly adding probiotics and prebiotics supplementally if necessary.



We want to reduce inflammation. Avoid foods that trigger inflammation and autoimmunity, increase the intake of foods that reduce inflammation. Make sure to get plenty of omega-3 fats, herbs and spices, fruits and vegetables, and fermented foods. You want to avoid high amounts of industrial seed oils, gluten and gluten-containing grains if the patient is gluten intolerant, processed and refined foods, sugar, etc. And then consider anti-inflammatory supplements if necessary, which we'll be talking more about later, but things like highly bioavailable curcumin can be particularly helpful.

And of course, a nutrient-dense diet is always important, but especially so for women's health, so you want to ensure adequate intake of vitamins A, D and K2, zinc, B6, magnesium, B12 and folate, choline, and the long-chain omega-3 fats.

You want to increase fermentable carbohydrates and dietary fiber. Insoluble fibers bind to excess hormones in the gut, can help clear them through the stools. So these are found in a variety of fruits and vegetables, like blueberries and all kinds of berries, dark leafy greens, and chocolate is actually very high in insoluble fiber. Coconut flour, which is popular now in gluten-free communities, is high in insoluble fiber. Soluble fibers promote good gut bacteria and butyrate production. Most insoluble fibers, with the exception of resistant starch, are not fermentable by gut bacteria, but soluble fibers are, so those are particularly important for gut health. Butyrate is a short-chain fatty acid that feeds the gut lining, the enterocytes in the colon or in the gut, and repairs leaky gut; it also plays an immunoregulatory role, so it can be helpful to prevent and treat autoimmune conditions. We'll talk more about butyrate in the functional medicine gut section. Most fibers should come from the diet if possible, but fiber supplementation, either resistant starch or non-starch polysaccharides like inulin or FOS or large or soluble fiber supplements can be really helpful in therapeutic situations, and depending on the patient's circumstances, different fibers will be appropriate. So, for example, if someone has IBS and a lot of gut issues, the non-starch polysaccharides and resistant starches may be really difficult to tolerate, and you may need to stick with soluble fibers. We'll talk more about that in the gut unit.

Exercise, of course, is very important. We want to have the Goldilocks approach to exercise, not too much and not too little. So the appropriate amount of exercise will promote insulin sensitivity, weight loss, and normal hormone production, and not enough or too much can lead to hormone imbalances.

Alcohol, caffeine, and sugar should be reduced, especially when fertility is a goal. They can all affect hormone production. I would suggest limiting alcohol to one drink a day, limiting caffeine to one or two cups of coffee per day or even less. I wrote an article explaining the individual factors that affect caffeine tolerance, including genetics, that we provide a link to in the resources section, so definitely check that out. There are similar genetic and environmental factors that affect alcohol tolerance, so you want to be aware of those, and then I would suggest limiting sugar to 25 grams per day or less. I'm not talking about carbohydrates here, I'm talking about sugar, so certainly less is beneficial than that, but that would be an absolute maximum.