## **Chapter 4**

# The Paleo Diet for Lyme Disease (and Other Nutrition Hacks)

Excerpt from the book,
"Freedom From Lyme Disease."
Click here to learn more about the book.

NOTE: Dietary information for Lyme disease sufferers is covered in many available books and resources. The information in this chapter highlights dietary lessons and key information which I personally have found to be interesting and useful, but the chapter is not intended as a complete discussion, nor is it intended as a one-size-fits-all approach. The correct diet for you will vary depending on your individual needs. Please consult your physician prior to making any changes to your current diet.

### Why the Paleo Diet?

uring my Lyme disease recovery, I experimented with many different ways of eating and noticed that each diet had big pros and big cons. Ultimately, most of the diets were too extreme. For example, veganism makes a lot of sense since vegans eat a nutrient-rich, fiber-rich, alkalizing diet which has countless health benefits. However, the vegan diet lacks many essential macronutrients which aid in Lyme disease recovery, such as saturated fats, cholesterol, and readily available protein. (In this chap-

ter, we will see why these nutrients are so important). Even vegetarianism, it turns out, is usually too extreme and doesn't provide the nutrients needed to power a recovery from chronic illness.

But let's not throw the baby out with the bathwater. Let's keep the benefits of eating a vegan diet without completely eliminating the other required macronutrients found in other diets. This logic is what guided my selection of an eating plan. I like to think that I've taken the best of many diets and combined them all into one. Only, I don't get to take credit for this kind of diet, as it wasn't really my idea. The diet is known as the Paleo Diet, and it's quite popular across America right now.

The fundamental premise of the Paleo Diet is that over the last 200 years, the human diet has changed more than it has in the previous 5,000 years due to the advent of agriculture and food processing technology. The Paleo Diet advocates eating a diet which predates these developments. Paleo proponents argue that our bodies aren't designed to handle these new modern food changes. While many people view the Paleo Diet as just another fad, it is far from that. In fact, it's one of the oldest diets on planet Earth (hence, it's name), as it advocates eating foods which are similar to what our ancestors consumed. The modern American diet, on the other hand, is composed of foods which are relatively new to humanity, including processed carbohydrates and excessive sugar. So, people need to be careful when talking about the Paleo Diet as a fad, as that is an inaccurate characterization.

There are different versions of the Paleo Diet, and I won't spend time explaining each one; instead, I'll talk about the modified version which I find to be most beneficial for Lyme disease sufferers. Paleo Diet experts may object to my description of the diet and tell me it isn't completely accurate; they would be correct. I don't advocate a strictly Paleo Diet, but instead, a version which makes sense for chronically ill people. Accordingly, my recommendations in this chapter will deviate somewhat from a strictly Paleo Diet.

Let's look at the Paleo Diet in more detail.

One of the basic rules to consider when understanding the Paleo Diet is to avoid foods which have a list of ingredients. Instead, the diet prefers whole, unprocessed foods. These are foods which are not modified from their original, natural state and which ancient humans could acquire and consume without the help of modern food processing technologies; hence, the name "paleo" as in "Paleolithic." So, a bag of almonds is a good choice—only one "ingredient;" a bag of potato chips is a bad choice—multiple ingredients which have been processed. Foods chosen for the Paleo Diet should be readily available in nature and easily gathered and prepared by a person using minimal farming and technology. Cooking is acceptable because cooking can be accomplished with very primitive means.

The Paleo Diet also attempts to avoid dairy as well as many types of carbohydrates, including grains, beans, and potatoes. Processed carbohydrates are especially undesirable, so paleo eaters stay away from breads, pastries, desserts, etc. Sugars and processed carbohydrates are highly inflammatory and lead to significant exacerbations in Lyme disease symptoms. Since fruit can be found in its whole, unaltered form in nature, without the need for processing or agricultural cultivation, fruit is allowed in the Paleo Diet, although it should be consumed in moderation. More on this later.

We've talked a lot about what not to eat. What should we eat? The foods most important in the Paleo Diet include animal meat, fruits and vegetables, and nuts and seeds. Some types of dairy may be permissible if tolerated—we will talk about dairy more in the coming paragraphs.

As I mentioned earlier, some of my dietary recommendations aren't strictly in line with those of the Paleo Diet. Lyme disease sufferers have some unique needs, so we'll talk about how the diet meets these needs and

where it should be modified to account for Lyme-specific health challenges. For example, when the Paleo Diet is used for weight loss, which it often is, total daily carbohydrates are severely restricted. My version of the Paleo Diet for Lyme disease allows a higher level of carbohydrates to be consumed. As you formulate your own diet, remember this one, guiding principle: if a particular food makes you feel good, then eat it. Our bodies can offer us a lot of wisdom, and since each person's body is different, the best diet for you will be different than the best diet for me. The goal isn't to follow the diet in a rigid fashion, but instead, to use the parts of the diet which make sense for your individual biochemistry.

Also, I will focus on some of the more controversial aspects of the diet because these aspects are the ones which are most likely to confuse or divert potential adopters. If you keep up with what's going on in the modern study of nutrition, you'll know that there is a heated debate raging over much of what I discuss in this chapter. So, this chapter will explain my positions on these controversial topics and will provide the logic behind my positions.

And lastly, while weight loss isn't the primary goal of the information in this chapter, I do believe that obesity can be a huge obstacle in healing from any chronic illness, so the dietary objectives set forth here also take into consideration maintaining a healthy weight.

## Fat and Protein: The Foundation of the Paleo Food Pyramid

While vegetables are a major part of the Paleo Diet foundation, most of the daily calories consumed will be derived from meat and healthy fats. More specifically, the foundation includes foods like poultry, eggs, butter, fish, coconut oil, and even red meat and bacon (in moderation). These items would make the bottom, or foundation, of the paleo food pyramid. You will notice that these foods are high in protein and fat, two nutrients which, despite popular opinion, provide tremendous benefits. For the

general population, protein and fat serve as very satiating foods, which leads to less hunger and less of a propensity to overeat. Furthermore, these foods avoid insulin and blood sugar spikes, which result from carbohydrate intake and which are associated with a plethora of health problems such as obesity, diabetes, cancer, insulin resistance, inflammation, hypoglycemia, and depression, just to name a few.

Putting fat and protein at the bottom of the food pyramid is a huge shift away from the traditional belief that complex carbohydrates should comprise the majority of our calories. However, new research debunks the theory that carbohydrates should be our primary food source; this is a flawed assumption for chronic illness and the general public alike. If you still think that fat makes you fat, you need to do some reading. Fat actually helps prevent you from getting fat, because it satiates you more effectively and keeps your blood sugar in a lower range, thus decreasing the level of insulin circulating in your blood. The food that makes you fat, instead, is refined carbohydrates. A detailed discussion of the physiology behind this statement is beyond the scope of this book; however, this is a critical point which you should research on your own if it is a new concept for you. I highly recommend reading the excellent writings of Dr. Joseph Mercola (www.drmercola.com).

For Lyme disease sufferers, fat and protein have special, specific benefits. This was a lesson that took me a long time to learn. For years, I tried avoiding fatty and high protein foods thinking, instead, that vegetables were the key to good health. It turns out that vegetables shouldn't actually be in competition with fats and proteins: both classes of foods are critical and indispensable. You run into problems when you create a false dichotomy and force yourself to favor either one or the other. Sadly, I believe this is where many chronically ill people reside—in extremes. We'll be looking at how fat and protein can benefit Lyme disease sufferers in the coming sections.

The higher levels of the paleo food pyramid primarily include fruit, nuts, seeds, and dairy in moderation. You'll notice the very conspicuous absence of grains, corn, potatoes, beans, and rice from the above discussion. Since I'm not a fan of extremes, my version of the diet permits these foods, but in extreme moderation. For more information on the paleo food pyramid, I suggest doing a Google search for *Paleo Diet basics* or *paleo food pyramid*.

## How Fat and Cholesterol Provide Specific Benefits to People Healing From Lyme Disease

One of the main ways in which fats and cholesterol help people with Lyme disease is to aid in the synthesis of hormones. Lyme disease wreaks havoc on the endocrine system, and the body has a great need for the basic building blocks of new hormones. Cholesterol is indispensable in hormone production; in fact, it is the nutrient from which pregnenolone—the mother of all hormones which is used to create nearly every other hormone—is synthesized.

"But wait," you say. "I thought cholesterol was bad for us?" I believed the same thing for many years, and for some people, excess cholesterol may be bad, but for those with Lyme disease, cholesterol is critical to the recovery process. This explains why many Lyme disease sufferers crave eggs<sup>5</sup> (specifically egg yolks), a food which ranks among the highest for cholesterol content. It also explains why many Lyme sufferers actually test low for cholesterol, not high.

Furthermore, saturated fats, both from animal products and also those found in foods like coconut oil, are critical to hormone synthesis. Again, this flies in the face of conventional wisdom which tells us that saturated fats are bad. In fact, it is the trans-, or hydrogenated fats, that

<sup>&</sup>lt;sup>5</sup> Eggs are a fantastic food! The yolk is rich in dozens of critical nutrients including cholesterol, B vitamins, choline and inositol, DHA, minerals, and more. The whites provide high-quality protein. Eggs are also affordable.

are bad. Saturated fats actually provide a great deal of support as well as help repair body tissues during Lyme disease recovery.

If you are still reeling from the above statements—that cholesterol and saturated fats are actually healthy—I can relate. I was reeling, too. You should do some independent reading on modern studies, and you'll find that the thinking on this topic is changing in many research circles. Of course, when combined with a sedentary lifestyle and overconsumption, these nutrients can turn into poisons—and so can most other foods. It goes without saying that exercise, as well as moderation at the dinner table, are critical components of any healthy lifestyle.

One of the missing links which helped me to better understand the role of cholesterol and saturated fat in Lyme disease recovery was the discovery that adrenal fatigue plays a huge role in Lyme disease. There are separate chapters in this book to address adrenal fatigue, but for the purposes of our discussion here, the adrenal glands are responsible for producing many of the body's hormones, and when these organs get stressed, as occurs in Lyme disease, hormone production drops to unhealthy low levels. Since adrenal fatigue often accompanies Lyme disease, those suffering from it require extra support for hormone production, and consequently, more consumption of saturated fats and cholesterol than people who don't have Lyme disease. This is another reason why the Paleo Diet is so appropriate for Lyme disease sufferers. It also explains why the general population may not need the same levels of cholesterol and saturated fats as the Lyme disease population.

The simple reality is that people with Lyme disease will usually feel much better and heal more quickly if they include adequate intake of cholesterol and saturated fats in their diet. These nutrients do not, however, replace the need for other kinds of fats, such as the Omega fatty acids found in foods like fish and flax oil. Therefore, Lyme disease sufferers should also consume hearty servings of fish and/or flax oil. Fish can be tricky due to high mercury content; therefore, some people (such as my-

self) prefer to use flax oil instead of fish. While flax oil doesn't have the extremely beneficial DHA component, it does have the building blocks that allow the body to synthesize DHA. Fish-free DHA supplements are also available.

Another important benefit of fat is that it stimulates bile flow. Bile is, of course, your body's primary way to eliminate fat-soluble toxins which are abundant in Lyme disease. So, fat can aid in the detoxification process. Note: Because the body naturally recycles upwards of 95% of the bile used for digestion by absorbing it in the intestinal tract toward the end of the digestive process, fat soluble toxins can also be absorbed, preventing their elimination. This creates a circular flow of toxins, as bile is first introduced into the gastro-intestinal tract to aid in digestion and then absorbed out of the gastrointestinal tract later. Hence, there are various treatments and strategies available which help to prevent bile and fat-soluble toxins from being absorbed; these therapies may break the circular cycle so that toxins are excreted in the feces rather than being retained in the body. These treatments are known as "binders" and are discussed in various places throughout the book, especially Chapter 9.

#### **Protein**

Now let's move on to the discussion of protein, the other macronutrient at the bottom of the paleo pyramid. During one of my stints as a vegan (it only lasted a few weeks!), I was feeling horrible and stayed up late to research dietary philosophies. I happened upon an article written by one of the top healers of our time. The article explained how the body's detoxification system relies heavily on amino acids (i.e., protein). Glutathione, the master detoxifying antioxidant, is synthesized from the amino acids L-cysteine, L-glutamic acid, and glycine. And guess what? Lyme disease sufferers burn through glutathione much faster than other people because our bodies have to work so hard to detoxify all of the toxins and dead organisms associated with Borrelia and co-infections. So, we need more, not less, amino acids than the general public.

Sure, vegetable-only diets will allow you to consume many types of vegetable protein, but only animal protein arrives in the form that your body can use right away. Most vegetable proteins require your body to work hard to synthesize them into more readily usable forms of protein, and when you are sick with a chronic disease, this work can be devastating and drain the body's resources even further. So, we see yet another reason to avoid vegetarianism and veganism: you simply aren't able to get enough protein, and the protein you get isn't the best kind for you.

In addition to detoxification processes, protein is important for so many other body functions, such as maintaining muscle mass, healing tissues, and balancing brain chemistry (most neurotransmitters are, in fact, amino acids). During chronic disease, protein is critically important for building new blood vessels and cells, strengthening the immune system, and keeping the body strong to fight infections.

Sure enough, after discovering the above information and discontinuing my vegan diet, I began to feel better immediately. My energy returned, and I was like a new person. I doubt there will ever be another time in my life when I attempt to give up animal protein. Are there some people in the world who may actually benefit from a vegan, or at least, a vegetarian diet? Probably. And you might even be one of them. But chances are, if you have Lyme disease, you will do much better to consume animal protein.

Some animal proteins are healthier than others. It's a good idea to minimize red meat consumption, not because of the fat content but because red meat is very acidic. Poultry, fish, and eggs, on the other hand, are better choices.

Before leaving the topic of protein, we must address one of the most important proteins available—whey protein. And that requires a discussion of dairy products.

#### **Whey Protein & Dairy Products**

Dairy products are the schizophrenics of nutrition. Are they good? Are they bad? It depends on whom you ask, and the fads seem to flip flop each year. There is actually good reason for the controversy, believe it or not. That's because dairy is both good and bad.

Most dairy products can be broken down into the following constituents. Once you learn about these constituents, it is easier to evaluate various dairy products.

- 1. **Milk protein**. There are two primary types of milk protein:
  - a) Casein. This is the "bad" protein. It is linked with many degenerative health problems. It is found in milk, cheese, and related dairy products. While it is sometimes used for bodybuilding (especially as a night time meal due to its slow absorption), it is generally recognized as unhealthy. Most people who are intolerant of dairy products are intolerant of casein and lactose.
  - b) Whey. This is the "good" protein. It is one of the most bio-available sources of amino acids and is a very useful dietary supplement. It contains little, if any, casein and lactose. If you are familiar with whey protein only as a body-building supplement, you need to take another look: it also has many properties which make it very useful for healing from chronic illness. Few people are allergic to whey protein, and it is generally well-tolerated. One of the greatest benefits of whey protein is that it contains a broad spectrum of amino acids which are easy to digest and absorb. It offers incredible benefits for Lyme sufferers.
- 2. **Milk fat**. Also called "cream," this is the dairy product that is used to make butter as well as heavy whipping cream products. It is high

in saturated fat. "Half & Half" is composed of half cream and half milk. Heavy whipping cream and butter have very little, if any, casein and lactose.

3. **Lactose**. Lactose is a disaccharide sugar. Many people are lactose-intolerant, and even people who can tolerate lactose are probably still slightly sensitive to it in ways they may not recognize.

Earlier in the chapter, we looked at the many benefits of protein, saturated fat, and cholesterol. Therefore, when it comes to a diet for Lyme disease sufferers, most people will benefit from consuming whey protein and milk fat while staying away from lactose and casein. Varying degrees of lactose and casein may be tolerated, and these amounts will be based on individual biochemistry and sensitivities. As a general rule, foods containing lactose and casein should be consumed in moderation or avoided. Hypersensitivity reactions including inflammation, stuffy nose, brain fog, and other allergies often result when a person is sensitive to, and consumes, lactose and casein.

I buy pure whey protein and make smoothies with it (more on that later). I also use heavy whipping cream in the smoothies. As mentioned, whey protein and heavy whipping cream contain only traces of lactose and casein. While my family doesn't consume much breakfast cereal, on the rare occasions that we do, we use 50% heavy whipping cream and 50% water as a milk substitute. As noted, most kinds of milk are loaded with lactose and casein, so we avoid milk.

Heavy whipping cream is preferred over Half & Half because it doesn't contain milk (Half & Half is ½ milk and ½ cream). We are using the whipping cream to get the fat content; therefore, any milk mixed in is superfluous and only gives us more of the bad elements of dairy. Note that butter and heavy whipping cream are very similar in composition, and liberal consumption of butter can provide important fat that helps with satiety and recovery from adrenal fatigue.