Summit Introduction and Guest Overview

Welcome back to the Gut Health and Longevity Summit. I am so glad you're here, and I want you to take a breath right now, because what you're about to hear over the next few days could genuinely change how you think about your energy, your hormones, and your health.

Most people have been told that the hormonal problems are a gland problem thyroid disease, estrogen dominance, adrenal fatigue each treated in isolation, each given a separate prescription.

What they have never been told is that almost all of it starts in the gut. So today's conversation is one that I'm really excited about. And it's, you know, I think the remarkable, underappreciated access between your gut microbiome and your entire endocrine system and the plant based foods that can help reset both at once.

So I'd like to introduce you to my next guest, who is Doctor Ritamarie Loscalzo, who spent over four decades connecting the dots that most doctors still treat separately your gut, your hormones, and your metabolic health.

She has trained thousands of practitioners to look at the gut first, because she knows that that's where the hormonal story always begins. She holds a master's of science and nutrition and is a certified a nutritionist and certified nutrition specialist.

She is a founder of the Institute for Bio Energetic Medicine and creator of the Nutritional Endocrinology Practitioner Training program. With over 40 years of clinical experience, she says in root cause resolution of hormonal balances, thyroid dysfunction, insulin resistance, metabolic disease, working through the gut microbiome, and nutritional endocrinology as her primary clinical lens doctor Ritamarie.

Welcome. I have waited to have this conversation with you for a long time, and I know our audience has two, so let's just drive dive right in. Let's do it.

I love talking about hormones and gut and the whole metabolic acts. I love talking about it. So awesome. Let's bring it out there. All right. So Doctor Ritamarie, most people think of hormonal imbalance as a gland problem.

The thyroid is sluggish. The estrogen is too high. Cortisol is dysregulated. But you look at the gut first. Can you explain the gut hormone access, what it is and why?

Trying to fix hormones without fixing the gut almost never works long term. Yeah, so I hear this all the time, especially with relationship to thyroid, right?

Somebody goes into the the doctors and gets their die roid tested, which isn't really they get tested, which is how hard does the pituitary have to be on the thyroid to make it work.

And as long as it's within their normal range, everything's fine, even though the person has this long laundry list of symptoms related to the thyroid, and in fact, the thyroid gland may be just fine.

Why Gut Health Drives Hormones

It has to do with all the other things that are impacting it, like the gut hormone regulation, like receptor resistance, which is affected by the gut, which is affected by stress, which is affected by other hormones.

So there's a whole laundry list of things that can be going on. And that's just the thyroid. So how deep do you want me to get with this and which direction.

Because there's so much more to it. Oh we're gonna we're going to get deep. But if you could just set the foundation for where we're heading, right. For the like that correcting that.

This is not an organ by organ medical model. It's really positioning the gut as the master regulator of the endocrine function and how it might do that.

You know, whether it's metabolizing hormones, whether it's the gut bacteria, what it's doing. So let's let's set the foundation for what's actually going on in the gut.

And why does what's going on in here affect something like, you know, two feet away in the body? Exactly, exactly. And my in my worldview, it's the, the gut but also the blood sugar.

And these are controllable by the individual person. Right. And one affects the other and the other affects the other. And they all both of them together affect every hormone in the body, every system in the body.

So we have food that comes in through the body and that's where nutrients come from. Right. So one of the ways that the gut affects the hormones is the nutrients that are in the food.

If they cannot get digested and absorbed properly, the organs, the glands that produce the hormones, they won't have the nutrition they need. For example, in iodine, magnesium, selenium, we're not getting it into the system.

That's just one small way. There's a lot of other things, right. So there's the microbiome. The microbiome is the set of organisms that live there. Well they help us to digest the food and they help us to digest the food properly in such a way that we don't get toxic waste and overflow sludge.

Right. And when we have a toxic gut, because the diet, the lack of ability to discern self from toxin, then we end up with dysfunction that can affect every hormone in the body.

And one of the ways with thyroid, for example, and with other hormones, there's the inactive form and then there's the active form. So the body has to actually convert from inactive to active in order to get it into the cells.

So that is dependent on having good gut function. So for example with thyroid people think that diet is the whole picture, right? 25% of all the conversion from inactive T4 to active T3 happens in the gut, 50% actually happens in the liver.

The rest the other 25% happens all over the place. Right? So it's a critical piece to be able to have the right microbiome, the right absorption and digestion of foods so that we don't impact negatively that conversion from inactive to active every single hormone in order to get into the cells, in order to be activated in the nucleus of the cells, for example, they need to get in.

Right. And so what happens over time is we end up with resistance hormone resistance hormone receptor resistance. So if we have and they keep talking about thyroid because it's the most obvious.

And I think from a standpoint of what people are complaining about, almost everybody I see is in some way, shape or form been told they have a thyroid issue.

Right? Or they think they have a right issue. So I keep going back to that. But the receptors can get damaged by poor food choices, by oxidized fats, by chemicals in the environment and in the food and stress chemicals.

Right. So we get stressed out 24 over seven for many people. I don't know if you see that in your practice, but that's what I see. People are stressed 24 over seven, which produces oxidative byproducts that then affect the hormones, the receptors on the cells for getting the hormones in.

So I would say that most hormone imbalances are not necessarily that the gland isn't producing enough of the hormone. It's that hormone is not getting converted to the right form and then getting into the right places so it

could do its job and the gut.

Okay. All right. So this opens up a conversation here now. Yeah. So if somebody's been told like been on a thigh ride medication for years, you know, still feels terrible.

The gut is often the missing piece. And one of the things that I think kind of overlies this, as you said, is hormone receptor resistance. So if this is our cells, right, if this is our thyroid cell, if this is our other endocrinology cells, our adrenal cells, you know, our gynecological cells, if this is it.

How do we get what we need to the inside of this cell when our body is experiencing this hormone receptor resistance, how do we turn that off. So it's not resistant?

That's a great question. And it's a multi-step process right. We have to stop exposing that cell. And these are the cells you're holding up. That's not the adrenal cell or the thyroid cell.

This is every cell in the body like every single cell in the body has receptors for thyroid. Whether they're working properly or not depends on the environment, the total environment in that body.

How toxic is that body, how much undigested food matter gets through the lining and the leaky gut. Right. And then the body perceives it as an enemy and then produces antibodies against it.

And those affect the receptors. And we tie it back to insulin. Because insulin resistance is the most commonly known receptor resistance. Right. We hear about that lately.

We're hearing people talk about leptin resistance. Very few people talk about the resistance. Very few people talk about progesterone resistance. Estrogen resistance.

That's when those cells, the receptors for those hormones, don't get in.

Hormone Receptor Resistance and Leaky Gut

And within saline resistance, which is the most popular, if you will, in the most widely accepted medical condition, that the insulin actually affects the receptors on all the other for all the other hormones.

So excess insulin, which most people have, I've tested it a lot. Most people, most doctors don't test for it. I test it all the time. I think it's one of the earliest things we should be testing, like decades before this person starts to develop insulin resistance or diabetes.

And the insulin, the high levels of it, not only caused people to gain weight, put it around their middle, even if they're not eating too many calories, or they're exercising like maniacs.

But it also causes damage to the receptors of other hormones, not just the insulin receptors. Right? So these are the things that happen when the gut isn't working well, and we get leaky gut and we have those undigested food particles getting into the bloodstream.

Autoimmune disease occurs. Right. And we have so many I think there's over 100 autoimmune diseases that have been named and identified. And I see it's almost it's the norm is to have an autoimmune disease in the people I see versus to not.

And usually it's 2 or 3 autoimmune diseases. And that's affects by the it's affected by the gut. Somebody has a leaky gut situation. They're going to develop and they have the genetic tendency and they have stresses in their life.

They are most likely going to develop an autoimmune condition. Very few autoimmune conditions, I think none have been identified that don't have a basis in the gut.

Right. So that's the exception rather than the norm. Is it for not to be got related. And when we fix the gut, we help people to get on the right foods to get the stress under control, to actually to their foods.

Oh, what a novel concept, right? I always tell people digestion doesn't begin in your gut. It begins in your mind because you have to be in a parasympathetic nervous system, a calm state, and your mouth because you have to chew the food.

Right. I can't tell you how many people come to me and say, I think I have low stomach acid, or I'm not making enough digestive enzymes. And I'll say, Why do you think, oh, because I see undigested food in my poop.

Like that's not a gut problem. That is a teeth problem, right? And it creates a gut problem and that contributes to a microbiome imbalance and leaky gut, etc., but it contributes also to autoimmune and hormonal resistance hormone receptor.

So the gut is not just digesting food is actively running your endocrine system. So let's talk about something that I think most women haven't heard of, which is the estrogen.

Bolam Lester. Bolam I don't know if I'm pronouncing it right. So what is it. What happens when it breaks down. And what does let's say plant based eating do to help reset a healthy estrogen metabolism through the gut.

Can you talk about that mechanism. Because I feel like this is a term that's kind of becoming part of a conversation. And we're getting two conversations, one where it's like, oh, estrogen doesn't do any like, anything bad to your body.

And I'm going over here. Well, if you're recirculating the wrong kind of estrogen, it certainly does. So we want to break through this confusion from the lens of this connection, especially for individuals who may have been told they have estrogen dominance, fibroids, PMS, perimenopause, breast cancer.

All of that converges onto to this conversation. Yeah. So to just step back a little bit on estrogen right. Estrogen we produce it. We need it. Every cell needs it not just for libido and baby making and all that.

But there's a lot of reasons that estrogens important in the system. But estrogen, after it gets utilized like every other hormone, goes through a liver path to break it down and eliminate what's left over.

And that breakdown process produces several different what's called metabolites of estrogen. Right. So there's four hydroxy estrone. There's 16 hydroxy there's two hydroxy estrone.

The two is a safe one. The four is a DNA damaging one in the 16 is somewhere in between does both right. And so if there's something happening in the liver and we're producing too much of the toxic ones, then all this stuff goes through into the guide, right?

The liver processes toxins, puts them into the bile. The bile then goes out and, you know, makes its way down through the poop and it gets eliminated in the body.

Right. So what is the that is the set of organisms in the gut that metabolize that estrogen, right. So if we have an imbalance in the gut, if the gut microbiome is wacky, it's not going to know how to get rid of those toxic estrogens.

And when we don't get rid of those toxic estrogens, the results are devastating, right? Not just what you mentioned, you know, with fibroids and all that, but cancers, right?

Estrogen sensitive cancers, breast cancer, uterine cancer, ovarian cancer, all of these are related to not having the right gut. And then we can also test this.

When we do a stool test we can look for beta glucuronide, which is an enzyme that actually breaks all that down. And when people have at a balanced levels there, then we know there's something going on with estrogen

metabolism.

So going to foods, right. One of my favorite foods for keeping estrogen and balance broccoli sprouts. Right. Most people don't get a lot of Brackley sprouts.

Broccoli is good. Broccoli sprouts are even better right? And that helps to drag out the toxic estrogen and bring those levels down. And bring a person from who's in estrogen dominance out of estrogen dominance.

Right. Omega three is are important right. I personally use omega three from algae or I have my body. I help my body convert it from flax seeds and chia seeds and the the nuts and seeds that contain the short chain omega threes.

So these are really important nutrients phytochemicals. We need plant rich colorful chemicals or colorful fibers in the the digestive tract to create a healthy microbiome, to have enough of the short chain fatty acids and butyrate production to create a healthy microbiome.

Right. So all of those things are important. And the cool part that I think about it is it's something you can control, right? If somebody tells you some, you know, weird genetic thing you have in your body that's not working properly, how do I control that with stuff like this?

With the gut imbalances, we get to control it with every thought we think, with every piece of food we put in our bodies. And are we pooping? Are we getting rid of this stuff right?

Or are we recycling those toxins that then go out and damage the hormone receptors? So let me kind of summarize for the viewers or the listeners. So the is, is that collection of gut bacteria that can then encode that enzyme, the beta glucuronide s that you mentioned.

And I test for that. I'm sure you test for that. But then that enzyme, which basically goes through this biochemical process, that it's the estrogen for resorption.

Now when somebody has an imbalanced gut microbiome or dysbiosis, they can also have this elevated enzyme, the elevated beta glucuronide, which in that case is not a good thing because then that your estrogen recirculate.

Estrogen Metabolism and the Estrobolome

So instead of it being excreted after it's used for what it needs to be used for, it recirculate in the body. And that's what creates that estrogen dominant symptoms.

So fiber from plants binds to the estrogen right. So this is why we want fiber. We want it cyber right. And it helps escort this out of the body. So cruciferous vegetables as you mentioned even broccoli sprouts an amazing source right.

Can work on those pathways. Also what you mentioned flax seed. So flax seeds have the ligands right that modulate the estrogen receptor activity. So you mentioned two of the most powerful foods.

One of the ones that you didn't mention yet that I want to ask you about is source. And I know my thoughts on Saw. But what about soil for women with estrogen issues?

Does it make things worse if the person's like, well, doctor B told me to eat more soy because I literally tell everybody to eat more soy. But is soy safe for women with estrogen issues in your experience?

Yeah, so that's a controversial topic. There's those who think soy is the best food in the world, and everybody should be eating tons of it. There's those who think that soya is the evil twin of, I don't know, aspartame or something.

Right. So it's evil and bad. And I think the truth lies somewhere in between. And I believe in personalized medicine, personalized healthcare, personalized nutrition.

So for some people, my husband's deathly allergic to soy. He has an ECG modulated response and that his throat closes up if he even sniffs soy flour in the air.

Right for him and for other people. With that, not good. And soy is amongst the top six allergens right. So most common. So it's really important to know if a person has a tendency to not handle the soy well.

On the other end, if we look at how sois processed, if you're just going to the grocery store and buying tofu that's not organic. It's most likely full of GMOs, genetically modified organisms.

It's most common, one of the most on with. And now we of the most commonly modified foods. So with sorry I don't tell people go out and eat as much as you can.

And some people have this fear of it because they've read all the literature. And so but I think it can be a helpful food along with a balanced diet. Lots of other things, right?

I love I don't eat tofu, soy tofu at home. We don't bring it into the house. We don't want any accidents happening. And had a son who's also allergic to sewing.

Not quite as serious as his father, but he gets tummy aches and throws up, so we never kept soy in the house. On the other hand, we have a third child.

A second child who loves tofu and thinks it's the most amazing food in the world. So, you know, it was a little balancing act raising these for, you know, three people in our household.

So but it's not just use it's a good food. Right. Same thing with cruciferous. Some people don't digest them well, not because they're bad foods but because there is a mess, quite frankly, from years of poor food choices and they don't handle it in the fibers and all they need to increase that.

So I think that like any food, it has its goods, it has its bads, and we figure it out for each person. Perfect. Okay. So we talked a little bit about thyroid disease.

And before I even get to the thyroid disease. So summary on the soil is it is personalized nutrition. So truly if you have an allergy for it don't go eat it because you think it's going to be good for you.

But if you don't have an allergy, you do want to make sure that you're doing organic, non-GMO, soy based products, preferably unprocessed, meaning the whole soy bean, like, you know, or for men, right?

They're much better absorbed, like tempeh versus tofu. Yes. Yeah. So the more unrefined process. But now okay, so let's talk a little bit more about thyroid disease.

You touched upon it because it's literally become an epidemic among women. I mean, almost every woman I talk to, she's like, oh yeah, my doctor put me on thyroid medication.

And I'm like, but why? Like, because a little lab value was off, and now your people end up on this lifetime of medication without understanding that there is a strong gut connection.

So what is the relationship between the gut microbiome and thyroid function? And what are people doing with their diet that's actually silently undermining their thyroid.

Right. So you already mentioned that, you know, the gut converts T4 to the active T3, the gut bacteria, but what is it that people are doing that's kind of undermining this process.

And they might not realize that they're doing it. Oh boy. There's a lot of things right there eating the standard American diet, number one. Right. They're eating foods that are toxic, that are causing the body to reject them and producing a not good microbiome, a microbiome that's producing toxic chemicals, endotoxins, lipopolysaccharide, etc., that are damaging their gut lining. Right.

So that's one thing. Another thing is stress. People are like eating, I guess, right, and not calming the system. And so when that happens, we don't break down those foods.

We don't we don't have the enzyme capacity to break that down. Because under stress, cortisol inhibits the secretions in the digestive tract. So those are things and I would say eating too much saturated gotten meats can affect that microbiome.

We know that certain organisms will grow more in the presence of of choline, which is high in the meat products. And they produce something called TMAO, which can damage the heart and other parts of the body because it's oxidative active.

So there's all these things that people are doing, and they're eating processed foods that don't have real nutrients in them, right? They're not eating the rainbow.

If they're eating the rainbow, it's it's M&Ms, right. That's not going to produce a good strong Skittles or Skittles, right? What are the other. Neither rainbow foods people eat are not not helping.

Yeah, I don't know about you, but like, in your neighborhood, I mean, I've been to your house, and the houses are kind of spread apart, but I don't know if you see.

But in my neighborhood, I see, like, almost every week, usually on a Friday, Saturday or Sunday, some food delivery service being delivered to my neighbor's house.

And like Uber Eats or whatever you want to call it. And I'm going, oh my God, you just asked me the other day why your hormones were off or oh my God, you asked me the other day why you don't have energy, right?

Exactly. Yeah. I don't think we realize that a lot of this, these quick, fast foods or even if you're eating restaurant food with the amount of salt, sugar and all that they put on it to make it taste good, like it's literally slowing down these cells here, and it can show up differently for everybody.

You know, for some people that could show up as their thyroid, some people show up as brain fog, some people show up as fatigue. So yeah, food is definitely an important part of this conversation.

So now let's talk. Another one of the words you mentioned a little bit earlier was insulin resistance. Let's dive into that a little bit. Insulin resistance as the driver of type two diabetes a PCOS metabolic syndrome, which now way too many people have starts in the gut.

So can you explain the mechanism? And what does plant based eating do at the intersection to reverse that trajectory.

Soy, Thyroid Health, and Diet Pitfalls

And so yeah, I want to dive into insulin resistance. What it is, how your nutrition can influence it and what they should actually be doing. Yeah. So here's the scary part with insulin resistance right.

In medicine there's a specific and you know this. You learned it in medical school a specific criteria for diagnosing insulin resistance. Right. The blood sugar is above 100 on three consecutive occasions.

The A one C is above 5.6 right. Those are things that are diagnosable. But what I see all the time is people in a state called pre insulin resistance.

They're heading there once they get there with an A one C of 5.6 or are higher, or the blood glucose above 100, lots of damage has already been done and their trajectory is heading them towards that diabetes type two diabetes.

But what is not talked about is what's the right criteria for telling somebody, whether they're in a metabolic dysfunction? There was a study, University of North Carolina a few years ago.

The first one was 2018. And I think they said that 88% or something like that of the population was metabolically unhealthy. And when it was most recently done in 2021, it was more like 93% of the population.

Now think about that much. We're talking 7% of the population is what we would call metabolically healthy. Right. And the criteria is elevated blood sugar.

So blood sugar below 100 waist hip ratio in the right proportion. Right. Not the, you know, 100% plus of the hip and race. Right. The way should not be the same size as the hips.

What was the other blood pressure. And they were the criteria they looked at were not stringent by any means. I would not say that if you fell in that 7% by that criteria, that you were optimally healthy, wouldn't it?

All right. So it wasn't just stringent criteria. So think about that 93% in that metabolic wellness. Why? Well, all the reasons we just talked about people are eating too much sugar, too many refined carbohydrates, too many carbohydrates for their specific metabolic balance, for their specific genetics.

I can't eat as much. I can't eat whole grains much. I little tiny bits or my blood sugar goes through the roof. Right? Because I have every probably 75% of all the genetic factors that are known to contribute to type one or type two diabetes, plus family history of heart disease, not taking any chances there.

Right? So that affects everything. The gut affects the insulin receptors, the gut affects the body's ability to handle it, but also that affects the gut.

And we're big in the in the news today is GLP ones right. Glucagon like peptides. Right. Those are hormones produced in the gut produced by a healthy gut.

When the healthy gut has all those colorful fibers and it has the right balance, we produce our own GLP one. Thank you very much. We don't need to inject it. Right.

But that's a that's the gut insulin because GLP ones have been shown to decrease insulin and increase ketosis and increase the body's ability to manage blood sugar.

Right. Reduce cravings. What do cravings come for from a lot of cravings come from elevated insulin. Sadly, most doctors don't test for insulin, so we see it a long time before because the insulin is creeping up and creeping up, but nobody's testing it until the blood sugar can't be maintained anymore, right?

When the insulin resistance gets so bad that we can't keep the blood sugar in the right range. So I've got multiple spin off questions from this. Okay, great.

What is the insulin test that you are running on individuals. So if people are like I need to go get my doctor to do this. What is the insulin test that you recommend?

It's called wait, this is profound. Insulin. Just insulin. So blood like a blood test? Just blood talent. Right. Okay. That's insulin. And it could be fasting, which is what usually you would do if there's an abnormality there.

Either it's too high or too low by optimal standards. Then we can do a postprandial insulin, which means within 45 minutes to an hour after eating. But it is insulin.

And it's a simple test through the company that we use of Xia. It costs like 12 bucks. So it's not an expensive test. And I think that everybody should have that tested as part of their routine gut stuff or routine blood tests.

Okay. So you talked let's kind of summarize a little bit of this. So we talked about gut dysbiosis how that increases your intestinal permeability. Your LPs and other compounds enter the bloodstream.

They can activate certain receptors on fat and liver cells initiating that insulin resistance cascade. Now on the other hand we have something called short chain fatty acids that our gut microbiome can produce, which will improve your insulin sensitivity, which you get from eating lots of fiber.

Right. So when we are thinking about the conversation, and this is going to be a little controversial, but I've seen a lot where people are like, I fixed my metabolic state and my metabolic state is best when I'm Kito.

Thoughts on that? Like, what's going on here? Why is that trajectory of individuals like saying and seeing that those individuals have good results just by going keto?

I know the long term chronic inflammatory effects, but like if we're looking at the mechanistic pathway, what's going on here. Yeah. So it's metabolic flexibility.

It's the ability to switch between burning fat and burning fuel. And I'm just going to be controversial here that keto is not an animal based diet. Kito plant based keto whole foods plant based keto loaded with those colorful fibers loaded with greens, minimizing the impact can be phenomenal, right?

So when we say I get literally irritated when I hear people think, oh, keto, that's bad, no eating, you know, tallow and lard and, you know, copious amounts of coconut oil and all this other stuff.

That's not a good thing. And in fact, a high animal based diet is not doesn't typically get you into ketosis. And that's the thing I argue with people all the time because it's too much protein.

And so if you're just eating steak all day, that's not necessarily going to get you into ketosis, because the extra protein over and above what your body needs for maintenance and repair gets converted to guess what glucose like.

So you may think you're doing this. So a ketone what I call healthy keto green keto plant based keto where we're eating a ton of vegetables, a ton of plant based foods, and then higher on the fat than on the car.

Now, that said, somebody has an oppo for a genetic type, which you don't handle that fat very well.

Insulin Resistance, GLP-1, and Metabolic Health

Probably not a good idea to be doing coconut and coconut oil as your source of good fat, but I believe in a whole foods, plant based, slightly ketogenic diet.

Nutritional ketogenic. Because what happens there is with whole food fats. Not only not a fan of oil, right, I eat, I eat that way most of the time and it maintains me in really good energy, vitality, weight.

ET cetera. So everybody's a little different and I've seen a lot of variants. I do a lot of genetic testing. So if you have family history of diabetes, family history of heart disease, you got to be really careful about maintaining good solid blood sugar levels and get your insulin tested right away.

Because high levels of insulin contribute one of the biggest contributing factors to cardiovascular disease. Given the whole rest of the situation, right that you're eating.

You just mentioned this, and I kind of want to reiterate this because there is a trend, especially this year with just eat more protein, whether it is plant based protein or animal protein.

It’s all about I need to get a ridiculous amount of protein, right. So you mentioned that excess protein in general, our body, once it’s used up what it needs converts it into sugar.

Now does that sugar then contribute the same way to this insulin resistance to sugar. I think it does take a sugar. Right. It’s you have elevated glucose in your blood and you’re you’re saturating everything with it.

Right? You get fruits. That means the immuno acids are coated, sugar coated, and they’re stiffening. Right. Hemoglobin A1, C is actually that stiffening and that coating, sugar coating of your red blood cells, they become stiff and sticky and pointy and damaging to the endothelial lining.

So I think that it’s all the same sugar, sugar, sugar wherever it comes from. Right. And refined sugar has all kinds of other effects. Right. Coming in.

So not saying that eating an apple is the same as eating a teaspoon of sugar like that. That’s crazy because the apple is loaded with nutrition. But the end result is if there’s too much apple and you’re seeing that as juice and not with the fiber, same way with fats are good for us, and everybody has a different tolerance and need for them, but they need to be whole food, plant based fats.

Because when you get into whole foods, animal based fats, there’s all kinds of, I think, negative side effects from that. But if there oils from plants, you can do problems there.

There’s no fiber, there’s no protein, there’s nothing else there. So I eat olives. I don’t care about all of oil. I don’t want to eat olive oil. You know, I whole coconut, I eat nuts and seeds and all that.

I don’t like avocados. What a way to my opinion to make it into. I want to eat the avocado because it’s so yummy. Right? So yeah, a little bit of oil to coat your pan when you’re baking and all that is not going to kill you.

But in my world, that keto, a whole foods plant based made with whole food, plant based fats and putting you into a mild state of ketosis can be super helpful for metabolic health, not for everybody, right?

It does depend. It does depend on their genetic tendencies and their previous life upbringing. Okay, let’s make our way around the endocrine system and let’s go to adrenal dysfunction and HPA axis dysfunction.

So most people understand stress as a mental experience. Can you explain what chronic stress is doing inside the gut microbiome, and how that disruption then in the gut feeds back to the adrenal gland and cortisol addressing, you know, making cortisol actually worse?

Well, stress triggers cortisol. So I think that the order there I would shift to say any kind of stress, whether it’s physiologic, psychological, PTSD, any kind of stress that causes the nervous system to stimulate the adrenals to produce adrenaline in cortisol, adrenaline short lived, it’s usually helpful in short amounts.

But then the cortisol is there and it stays and it stays and it stays and that cortisol shuts down the digestive system. Why would you need to be producing digestive enzymes when you’re running away from a tiger?

Not a good not a good thing. So it shuts that down. It also shuts down. You didn’t ask about that, but it also shuts down the prefrontal cortex, that front part of the brain.

That’s the wizard brain, the smart part, the problem solving part. So that chronic stress makes you dumber. It makes you dumber. Yeah, that explains a lot.

Stink about it. You’re in the middle of like, oh my God. Well, all I have to do is just turn it in the other direction and you go, oh, I should have thought of that.

But you couldn’t because the inhibition of your lizard brain, your wizard brain, and activation of your lizard brain, which is. Get the hell out of there. Just move.

Right. Get keep safe. Right. So when you're constantly in a state of not feeling safe, you're nervous system is going to trigger that. The stress response, the response of get me out of danger and that doesn't provide for a nice healthy microbiome, doesn't digest the food very well.

Pure heating. And you're under stress and you're watching the news and you're shoveling it in. That food becomes toxic to the body because your your digestive tract can't handle it.

And then it's creates the leaky gut and slips through the digestive lining and leads to inflammation and leads to autoimmune conditions and a whole lot more.

So we work our way from we're experiencing mental stress, which then creates the cortisol. The cortisol then influences our gut by making it more permeable.

Intestinal permeability altered mucosal layer contributing then further to dysbiosis. The dysbiosis then produces these inflammatory signals, activating the HFPA the that access even more making more cortisol.

So it's a vicious cycle the business cycle. So eating more plants and the polyphenols from plants we know can decrease neuroinflammation. What would you say.

And obviously support vagal tone. So healing the gut is also healing your stress response. But what would you say is the single most important dietary change?

Someone with chronic stress and gut issues can make to start disrupting the site? I don't know that it's a dietary change. It's a how you eat, not what you eat.

I knew you were going to say that. So it's still a change, right? So is it your food? It would be. Before you even get to to it is to get yourself in that like access, breathing, access the vagus nerve to be able to help you digest your food.

The vagus nerve is attached to the lungs and the heart and the gut. Right. So that would be it is like, you know, in the olden days, I don't live at home anymore.

Right. I'm beyond that. My parents have moved on to other greener grasses. And what they taught me was grace before meals.

Stress, Cortisol, and the Gut-Brain Axis

So we all would stop and give gratitude for the food we're about to eat. And so a simple act of looking at your plate and give thanks for that food, whatever you believe in, I don't. It's not a religious thing.

It's a physiologic thing. Right? It's a hormonal thing. Looking at that food and saying, oh wow, thank you for you're going to become part of me because that food is going to become you.

So when you put stuff on your plate, know that it's going to become yourselves through this intricate mechanism, a set of mechanisms, it's either going to become you or it's going to hurt you, right?

Because it's not going to get broken down and it's going to create toxic byproducts, which is going to damage you. So stop, get yourself there, breathe.

And then between forkful. So choo choo choo choo choo. Right. Because the only place in the mouth with teeth is the mouth. The only place in the body with teeth is the mouth.

So you chew and then ideally, you take the fork and you put it down between each bite. So as you're chewing, you're able to access the vagus nerve and you're not thinking, okay, we're sitting there like.

And shovel it in, right? It slows it down. We eat less, we absorb more. And that's so that's what I would say. That's the biggest change. Number one, biggest change I think people need to make.

Yeah. There's other things. Yeah. There's changing what you're eating. Right. Colorful beautiful. Fresh as possible. Right. Yeah. Slowing down. All right.

So you've worked with thousands of patients over the four decades. Can you tell us, without breaking any privacy about a patient, where getting the gut hormone connection right was a turning point in their health?

There's so many. Let me think. I, I keep coming back to my favorite because she came in with a blood sugar issue. Her doctor told her her fasting blood sugar was 112115 that she needed to get it under control. But no worries.

If you don't come back in six months, you'll probably be diabetic and I'll put you on medication. And that was unacceptable to her. So she joined my blood sugar balancing program, and none of my programs treats one specific area of the body because it's all interconnected.

So as part of getting the blood sugar under control, it was all of the stuff we just talked about food hygiene. Funny story. Back in the day, I was at a conference and I it was a rough foods festival of plant based foods festival.

And I said, oh, I wish I would have known about this soon. I would have loved to be a speaker. So I spoke to the organizers and they said, well, if anybody cancels, we'll let you know.

So they came to me later that day and said, hey, the speaker at 5:00, this was at 330, canceled. So can you take over? I'm like, okay, what's the topic?

The yoga of eating. And I'm like, okay, first I thought to you and then I thought, oh, that's exactly what I teach. So I talked this stuff and it was it was mind blowing for people.

Right? So we have to get into that state before we eat, and then the food that we're putting in needs to be fresh. Not three days old, not, you know, processed and put in a plastic bag and served that way.

The fresher it is, the more nutrients we can pull out of that, the easier it is on our digestive tract, because we don't want to put stuff in there that's going to cause our digestive tract staff to work hard, because the party they have to work, the more they break down, right?

And the things that don't hurt them, they don't have sugars and they don't have chemicals and things like that. So these are all the things that are critically important.

I think I might have lost your initial question. So for that that's okay. That's all right. So we know that sugar is a big thing. So last question and I want to be a little bit concrete.

So someone listening right now they're dealing with hormonal symptoms maybe thyroid issues maybe estrogen problems, maybe blood sugar chaos. Just that exhaustion that no one can explain.

What is the three most concrete, important things they can do this week to begin healing the gut hormone access? I would say it's a not do. So if you want to correct me and get a do, I would say eat only whole on processed foods.

Okay, get rid of the sugar. Get rid of the lemonade, get rid of the M&Ms. Get rid of anything. That is not like something you could find in nature. That would be number one.

Okay, you got two more, two more. And I can't repeat what I already said a two. I would say eat the rainbow. We hear this over and over again. But what does that mean?

Like look at your plate and ask yourself other than M&Ms and Skittles, right. Are there is there purple? Is there red? Is they yellow? And throughout the day I would say that.

And then the other thing is, I would say over the course of a week, get yourself to eat 30 different plant foods, whether it's herbs and spices and vegetables and fruits, 30 different vegetables.

You're going to get diversity.

Practical Gut-Healing Steps and Closing Remarks

You're going to get to be able to feed your microbiome what it needs to be healthy. And you're going to avoid hurting it by feeding it sugar and processed foods and all the chemicals that then have to be broken down.

All right. Well, doctor Rita Marie, this has been genuinely eye opening, the idea that your hormones are downstream of your gut, that the balloon, the thyroid, insulin sensitivity and even cortisol regulation all run through the microbiome.

That's the message I want everybody to carry with them. Now, if people wanted to learn more from you about you. Where is the best place for them to connect?

Absolutely. So I'm on Facebook and Instagram and I'm as Doctor Ritamarie de are drritamarie. My website is drritamarie.com and I have a practitioner based website to teach practitioners how to use plant strong, plant forward nutrition to help the the most complex cases.

And that is INE method.com that stands for the Institute of Nutritional Endocrinology. And then the last place is my podcast. I have 220 or something episodes so far, and we're doing every week.

We're doing a new episode on a health care topic, mostly related to the endocrine gut. You know, Bud Sugar composition. Amazing. Thank you so much, Doctor Ritamarie.

Now here's your key takeaway, audience. Your hormones don't just live in your glands, they live in your gut. And the bacteria you feed today are writing your hormonal story tomorrow.

So thank you for staying tuned today with this session we've got more coming your way, so don't go anywhere.