

THE MODEL **HEALTH** **SHOW**

EPISODE 535

The Secret Role Of Fat Cells & How Microbes Influence Detoxification

With Guest Dr. Alejandro Junger

You are now listening to The Model Health Show with Shawn Stevenson. For more, visit themodelhealthshow.com.

SHAWN STEVENSON: Welcome to the Model Health Show. This is fitness and nutrition expert, Shawn Stevenson. And I'm so grateful for you tuning in with me today. Let's talk about our amazing body fat. That's right, amazing body fat. Our body fat has evolved to provide us a source of energy, despite not having any resources around. It's a Reserve Bank for caloric energy to run all of our metabolic processes at any given moment. It's a great adaptation that we've developed. Also, it provides a little padding. A little padding against falls and things like that, not just for the more cushion for the pushin'. But padding protection, and also insulation. Body fat functions as insulation, and then we've got all these different fat communities, like our brain, for example, which is made of structural fats that enable insulation for nerve signaling, laying down Myelin. Myelin is a fatty sheath, that enables our brain to conduct electrical impulses with lightning speed. Now, there's also a very strange and overlooked job that our body fat is playing today, now more than ever. And that's what we're going to be talking about on this episode of The Model Health Show.

And I have on one of the most prestigious, one of the most, incredibly influential physicians in the world today, somebody that is the physician's physician, somebody that the celebrities out there, that are really doing things the right way with robust health and mental health he's their go-to person for all kinds of royal families in different countries. Like all... It's crazy, the impact that he's making, and it has a trickle-down effect. In folks that are out there, making an impact on the people that they're looking out for, for example. So, he's looking to influence influencers, be a leader for leaders, being again, that physician's physician. And he has such a diverse network of knowledge, studying, and learning from his conventional training as a Cardiologist and also many other domains of Functional Medicine and the like. So, we'll talk more about that today as well. So really excited about this episode. And one of the things that him and I have an intersection on, is our love and respect for the Ayurvedic system of medicine. And one of those things, specifically in Ayurveda that can be of the utmost importance and assistance today is something to help us to modulate stress.

cond

And that go to in that system is Ashwagandha, a double-blind randomized placebo-controlled study published in the Journal of Psychological Medicine had test subjects with a history of chronic stress. Consume Ashwagandha or a placebo, over the course of the month and a half long study period, the group that received Ashwagandha exhibited a significant reduction in test scores, on all stress assessment scales compared to the placebo group. And objectively, their serum cortisol levels were substantially reduced, versus those in the placebo group. Now, Ashwagandha is just one of the ingredients in the amazing Organifi Green Juice Formula. And another one of those brain-supportive, nervous system supportive nutrient sources in Organifi green juice is Spirulina. A recent study published in PLOS One, the Public Library of Science

One, revealed that Spirulina has the potential to, one, improve neurogenesis in the brain, literally creation of new brain cells. And two, it was found to be able to reduce neuroinflammation, inflammation of the brain, one of the biggest issues in our society right now that's not being talked about.

Now, these are very remarkable attributes, not to mention, it's loaded with amino acids and other nutrient precursors, that help to make vital neurotransmitters. Again, Spirulina, Ashwagandha, Chlorella, Moringa, and organic mint, is included here as well. It's a very refreshing taste and feel. Definitely get your hands on some Organifi Green Juice, right now more than ever to fortify your immune system, your nervous system, and more. Go to organifi.com/model. That's O-R-G-A-N-I-F-I.com/model, and you get 20% off their green juice formula and all of their other incredible formulas, their Red Juice formula, their gold blend, that is based on turmeric, which is another big thing in the Ayurvedic system. So, just a huge fan. Pop over there, check them out, organifi.com/model for 20% off. Now, let's get to the Apple Podcast review of the week.

ITUNES REVIEW: Another five-star review titled, "Easier to understand health knowledge at your fingertips" by Sidney Phoebus. "Shawn provides health and nutritional information, in a way that's much easier to understand than the average health podcast. And it's much more data-driven. He covers so many important topics and misconceptions, and I'm grateful for all of the time, effort, and research, he puts in for each episode."

SHAWN STEVENSON: That's amazing, thank you so much for leaving me that review over on Apple Podcast. If you have yet to do so, please pop over to Apple Podcast and leave a review for The Model Health Show. And on that note, let's get to our special guest and topic of the day. Our guest today is Dr. Alejandro Junger, and he's a New York Times best-selling author, pioneering cardiologist, and a leader in functional medicine. His books and programs are utilized by countless people worldwide. But also, by health care practitioners in many health institutes all over the globe as well. Incredibly influential individual. And grateful to be able to call him a friend. Let's jump into this conversation with the one and only Dr. Alejandro Junger. My man, listen, this is very exciting for me because the last time I saw you the world was very different. And I've been meaning to connect, we stay touching base frequently, but you're one of my favorite people. I love your insight, your energy, and I'm just grateful to have you back here with me.

DR. ALEJANDRO JUNGER: I'm so happy to be here.

SHAWN STEVENSON: Yeah, one of the first things I want to ask you about is this hidden aspect of body fat, that a lot of people don't know about. Let's talk about that.

DR. ALEJANDRO JUNGER: We are now realizing, and for a while now, that especially in America, there's a problem with obesity. And there's a lot of reasons why they talk about diabetes and all the metabolic alterations that lead to that. But very few people are talking about one factor, which is that the body only knows how to adapt and survive, it doesn't have a code, it doesn't have a genetic information on how to get sick. So, when you see the body accumulating fat and retaining fat, and generating fat. There must be a reason for it. And one of the reasons is that 90% of the toxins that we're exposed to through the air we breathe, the water we drink and shower with, the medications we consume, cosmetics we apply on our skins, but mostly to the food-like products or edible products that we are eating as foods are loaded with chemicals. 90% of which are only lipophilic, meaning they only dissolve in fat. So, let's follow the journey of a lipophilic molecule that comes in through one of these sources. Goes into your circulation, whether it's through the skin or through the gut, and then starts circulating and eventually passes through the liver.

Now, if things are working well, the liver will detect it, will spit its enzymes that will cut the molecule and alter its composition, its chemical properties, and transform it, bio-transform it from lipophilic, from fat-soluble into water-soluble. The reason it does that is because the body can only eliminate things through water. We don't sweat fat, we don't pee fat, we only pee and sweat water, and also water is in the feces, so we need to bio-transform these molecules from lipophilic into hydrophilic, into water-soluble in order to be able to eliminate them. Now, because the liver is overwhelmed, lacking nutrients to manufacture those enzymes that cleave those molecules then these molecules will remain, some of them remain right there in the liver. And the liver starts doing what? Buffering their irritation by accumulating fat and therefore leading to fatty liver, which is now becoming...

SHAWN STEVENSON: Epidemic.

DR. ALEJANDRO JUNGER: A huge problem. The other ones will continue circulating and then will start lodging themselves in fatty tissue, brain, thyroid, breast, prostate. When you look at where the surge in cancers are, it's in those organs. So, the rest of the fatty dissolvable molecules that have not lodged into a tissue, then the body will retain and generate fat in

order to buffer their irritation leading to obesity. So, obesity really, part of the cause behind it, the root cause is this overload of lipophilic toxins that we are not able to process because of all the reasons we just spoke about.

SHAWN STEVENSON: That's remarkable. So essentially, this is an adaptation.

DR. ALEJANDRO JUNGER: It is an adaptation, survival mechanism, which is really the only thing the body knows how to do. What we see and perceive as diseases are just adaptation mechanisms.

SHAWN STEVENSON: Because... And I heard you say this before, there really isn't a disease program in our DNA. It's really about adaptation. And so, epidemics of obesity, of liver diseases, it's now in the top 10 causes of death in the United States, and it's just not being talked about. The liver is so remarkable, it's responsible for countless processes, and it's responsible for also drug metabolism, for supplement metabolism, for anything that we're bringing into our bodies, and also the things that we're exposed to. And obviously, it's overburdened today with our environments, and you said something, I want to point this out, you said food-like products... Why did you say food-like products?

DR. ALEJANDRO JUNGER: Because we're not eating food anymore. Go to the supermarket, take a bird's-eye view. What comprises 90% of the stuff that people eat. Everything that's in the supermarket, in the middle of the supermarket, in shelves. In order for things to be in shelves, they have to have preservatives, conservatives, and then on top of it, they have coloring agents and smelling agents and texturizing agents, so that they call your attention, and they hook you into consuming them more and more. All these chemicals that cause their damage, but what you see is that these products, they have a food or two as one of the ingredients. They're not really food, the foods are in the perimeter. The vegetables, the fruits, the fish, the meat, but that's less than 10% of what's available in the supermarket. And where are Americans eating from? Supermarket. So, this is why we're so sick.

SHAWN STEVENSON: Yeah, yeah that makes sense. So, I'm just thinking about that list of ingredients, and it might be wheat thrown in there, or corn and then just preservatives sugar and...

DR. ALEJANDRO JUNGER: Gluten.

SHAWN STEVENSON: Yeah, gluten.

DR. ALEJANDRO JUNGER: They put gluten there as a binder, as a thickener.

SHAWN STEVENSON: Listening to the name glue.

DR. ALEJANDRO JUNGER: Yeah, as a volume maximizer. So, it's very difficult to go on a gluten-free diet because it's everywhere, it's even in drinks.

SHAWN STEVENSON: Yeah. One of the most remarkable things about your work is that you're identifying what are the organs responsible for helping our bodies to adapt to our very abnormal condition. So again, the liver takes on a big weight of the burden that we're supposed to. But there's also a really remarkable connection that we're now aware of, well, this has been known for thousands of years. But today our conventional science is proving it. But our gut bacteria plays a significant role in detoxification. Let's talk about that.

DR. ALEJANDRO JUNGER: You know 11 years ago, or maybe more now, I wrote a book and when I... About intestinal health. And when I told Harper Collins what I wanted to name it, they said "No." I wanted to name it "Clean Gut" and they said, "Gut has a bad connotation." I insisted and I went for it, and I'm happy that people received it and it's now being used by a lot of people. I'm not saying I initiated it, but I was...

SHAWN STEVENSON: But you're not saying you're not either.

DR. ALEJANDRO JUNGER: I'm not saying I'm not. But I was realizing all these years ago that this was a major cause of the problem. Of course, Hippocrates says that thousands of years ago,

right? "Health and disease start in the intestine." Now, when I talk about the gut, I distinguish four components. One of them is the Microflora the intestinal flora. And a lot of people talk about the good bacteria in the gut, but there's not only good bacteria, there's good funguses, there's good viruses, there's good other organisms that we don't even know about yet. And the second component is the intestinal wall, which is really the border between the inside and the outside of the body.

The third component is the immune system that lives within and around the intestinal wall. And the fourth component is the nervous system that lives there too. Now, the nervous system there is huge, bigger in the brain in your skull. The immune system makes up for 70%-80% of the immune system in your body. So, this is a really, really important organ where a lot of the systems of the body convert. You know, functional medicine teaches us to think in systems. System thinking is very useful in order to understand and be able to have a positive effect on the body because you have to start breaking down even though we are a whole and everything is connected. You got to break down things in order to be able to understand and cause an effect, right? So, the gut is where the immune system, the nervous system, the hormonal system, the defense and repair system, the absorption, and the simulation system, they all converge in there, right?

SHAWN STEVENSON: Yeah.

DR. ALEJANDRO JUNGER: So that's why there is where so many things begin. The intestinal flora being one of the major components of the gut.

SHAWN STEVENSON: That's powerful. So, we've got this enteric nervous system, right? And one of the things that I've been talking about for years is the production of melatonin, serotonin, all these neurotransmitters, we've got this production taking place. We've got these Enterochromaffin cells as well as producing hormones, there's so much action happening here. But I want to lean into this aspect with the immune system, which the majority of our immune system is in our gut as well, isn't it?

DR. ALEJANDRO JUNGER: Yeah. So, imagine this, the intestinal wall is... If you spread it out, the surface is like a tennis court, and the reason why it's folded and micro-folded to increase the surface contact, the contact surface with food that is being digested so the body has ample opportunity to absorb it, digest it, and absorb it. Now, each folding inside is like a finger and inside has veins, arteries, venules, arterioles, capillaries, and lymphatic system, and nervous system. So, when you spread that over the surface of a tennis court, there is a lot there. Now, every time that you damage your intestinal wall, let's say there's dysbiosis, there's a bad ratio of the good bacteria versus the bad bacteria or even a bad ratio of good bacteria between them. That causes a little dysfunction, a little damage in the gut. All the chemicals that we're exposed to cause a little damage in the gut. What's happening is, very micro-areas of the gut start triggering inflammation. Which is the basic non-denominational way in which the body reacts because inflammation creates the right conditions for the immune system to attack and the repair systems to function.

So, when we talk about inflammation, we talk about, really everybody's thinking of it as the enemy. But inflammation is an adaptation and survival mechanism that is really, really important. If you couldn't generate inflammation, you wouldn't survive. Now, the problem is when inflammation starts happening in that huge surface, then it starts turning into a systemic problem. And that is what is at the root of most of the chronic diseases of the modern world. So where is that happening mostly? In the wall of the intestine, and that is really where we need to put our focus on, to really tackle the chronic diseases of the modern world, which also are the basis of the pandemic of COVID, right? Because who are the people getting sick? People that are having metabolic dysfunction, people that are having an immune dysfunction. And this really begins in the gut for most people.

SHAWN STEVENSON: Absolutely. And COVID, it's now well affirmed. It's at least in part, an enteric infection. We've got a lot of the ACE2 receptors located in the gut and so it's just being this channel. And so, what you're saying is, we know that this is a kind of inflammation spurring virus, but the inflammation is our body's response to it. And if we're already in a pre-inflamed state, this is going to decrease our resilience. So, is there a way that we can proactively decrease our susceptibility by healing our gut from this virus and all other manners of viruses and infectious diseases?

DR. ALEJANDRO JUNGER: Yeah, sure. And this is where... This has been the focus of my work in social media, but mostly in my practice with patients. When people come to me with a problem, even before the blood tests come back, if I send them, I say to them, "Let's do a combination of detox and gut repair program." And 60% of the people by the time the blood work results come back, they don't even need them anymore because their symptoms are either greatly improved or completely resolved. This is what I think we should be focusing on. And of course, that entails eating right, relaxing, sleeping, all the things that you've been writing and talking about.

SHAWN STEVENSON: Yeah. I want to really direct people to this, as you mentioned, so we've got this plethora. We're talking about the microbiome, we're talking about species of bacteria, fungi, viruses, we got 400 trillion virus particles in and on our bodies, archaea, there's so much going on. But these microorganisms, we need to have the right ratios, right? And also, the right species that are supportive of us. And they're playing a role... I want to ask you about this, are they playing a role, specifically our bacteria, in helping us to detoxify what we're bringing in through our food and also what we're exposed to in our environment?

DR. ALEJANDRO JUNGER: So, it is understood now that when you eat food, the bacteria in your gut, not only will digest the food with you and some of the digestion results, some of the products of their digestion are nutrients that we desperately need and B vitamins. But they also detoxify 40% of the xenobiotics that we're exposed to. So, when that work is not done by them, then that is why our livers are so overburdened, 'cause then that is left to us to do.

SHAWN STEVENSON: That's remarkable. And again, this is a new exposure, the level of exposure that we have, these xenoestrogens, for example, from our environment, from our food, and our microbes are of the utmost importance to help us. And that's the thing, we're adaptable. We can survive this, we can thrive through this, but we've got to lean into this even more as far as getting ourselves more robust and healthy, and also I would assume, what I keep hearing is eliminating or decreasing our exposure to the things that are hurting us as well. So, I'm going to share this paper. This was published in the journal Gut. Alright. So, this is one of the most prestigious journals identifying gut health.

And you were like, "I got to put this out there." This is over a decade ago and talking about clean gut, and people have this association at that time towards gut being something they want to get rid of. But what we're talking about is this miraculous gastrointestinal tract and all its related components. So, this was published in the journal Gut. The title is "Gut microbiota composition reflects disease severity and dysfunctional immune responses in patients with COVID-19." The researchers uncovered that hospitalized COVID-19 patients consistently had lower levels of immunomodulatory bacteria, coinciding with higher levels of inflammation. This is exactly what you're talking about.

DR. ALEJANDRO JUNGER: We're kind of blind. So, imagine that you're in a dark room and there's an elephant in the darkroom. But nobody sees the elephant. But some people get a small flashlight, and they go in the back, and they see the tail, "Oh my God." and they start talking about the tail. Some of them see their feet and they start talking about the feet. Some others see the trunk, and it looks like it's all different things. But it's all part of the same animal. It's depending on what you measure and how you look at it. Another way of talking about this study would be that patients with diabetes are more susceptible. Now, what do patients with diabetes have in common? Gut dysfunction. Dysbiosis. We know now through several studies and I'm not as good as you at retaining studies. I read them, I process them, and then I do... I don't even know where I read them, but there's plenty of studies now that talk about the relationship between the gut microbiome and all the inflammatory diseases. Diabetes being one of them, hypertension being another one of them.

SHAWN STEVENSON: You've known... And this is the thing before we even got started today, you've known this stuff for a long time, because you've ventured in and been learning from traditions of medicine, with thousands of years of documented history and intelligence, and today we're using modern method to really affirm what our ancestors have told us repeatedly again and again and again. And I want to ask you about this specifically, we touched on this earlier, but the liver playing all these different roles in detoxification, but also the liver plays a role in helping the body to break down insulin, for example. So, you mentioned diabetes in relationship to increasing our susceptibility to COVID and other viruses. What can we do to

start to support our liver? And specifically, you mentioned how our bacteria make nutrients for us. Are there specific nutrients that help deliver to detoxify our exposure to toxins?

DR. ALEJANDRO JUNGER: Well, the thing is, the liver makes tons of enzymes. The conjugates, the sulfation, methylation. All the chemical reactions that the liver puts these molecules through are all enzymatic reaction. The cytochrome p450 enzymes. So, all these enzymes, they need substrates. They need their components, and these are all nutrients. So, from magnesium to B vitamins, to sulfur, to good protein. All the... Polyphenols, all the nutrients that we should be eating and should be absorbing, part of them go into the liver in order to manufacture the enzymes that the liver needs.

SHAWN STEVENSON: So where can we get some of these foods specifically? Let's talk about some good liver nourishment. Certain foods or herbs or specific nutrients.

DR. ALEJANDRO JUNGER: In general, what I always tell my patients and I see incredible results is, eat real food. Don't eat food-like products. Eat foods as you find them in nature and try to have variability in species and in colors of plants mostly, but I'm also convinced that there is nothing wrong with good animal protein. So, as long as the animals that it comes from are living in the wild, just like nature designed them to live and eating what nature designed them to eat. So, I don't want to confuse people with too many names and too many things. You go on Instagram and there's all these geniuses, I love them, they're all colleagues of mine, and some of them are friends of mine, and they break it down, but it's kind of confusing. I like to take a simpler approach and say, "You know what? Imagine that you were living in nature. What would you find? What would you be eating?" You wouldn't be eating things from cans and bottles and bags and boxes; you'll be eating plants and animals. So do that.

SHAWN STEVENSON: I love you. This is the answer. These are the type of things folks ask me about when I'm doing media, but the truth is, there aren't specific, just eat these three foods for liver detoxification. It's really an approach. It's a framework which is to eat diversity and also that diversity is going to help with our gut diversity too, right?

DR. ALEJANDRO JUNGER: You know what, what I'm detecting and sensing and seeing, witnessing is that we say food is medicine, but people are thinking of it as medication, not medicine. So, they want to do... They ask me all the time, "What food is good for this?" I say, Well, this... There are, of course, foods that have more value of certain nutrients than others, but it's not like you can continue your life as it is and eat more blueberries, and then you'll be fine. So, treat food as medicine, but not as medication. And this obsession with knowing every component of every food so that you can have more of that if you're this or that. I think it's good when you already are doing the basic things. But if you take it isolated, then you're turning food into medication and not medicine.

SHAWN STEVENSON: I love that. And speaking of that medication versus medicine. I want to take a trip back in time to your conventional practice and I want to ask you about this because this is something that's very glaring, but a lot of folks don't consciously think about. But what you're teaching right now and what you've been teaching. If you are sitting in front of another individual and they're dealing with a condition that is destroying their life, but this condition is completely reversible. In our conventional setting, are you able to actually take the time with that person and find out what their protocols are like, their nutrition, their lifestyle, their stress, their relationships? What was it like in that day-to-day conventional practice, where you might have, what? Less than 10 minutes? Are you actually able to get to the root cause of patients' issues when working in that kind of conventional setting, just to be able to pay your bills?

DR. ALEJANDRO JUNGER: Not only you're not able to get to it, but you're not even trained to do it. So, you don't even know that you're not doing it. One of the things that I was trained when I moved to the United States from medical school that I completed in Uruguay and in the hospitals here, you have to write progress notes. And our attending physicians used to tell us, "When you write a progress note, pretend in your head that you are in court, in front of the judge, and write accordingly." They are teaching us preventive medicine, but not preventive for diseases. Preventive from lawsuits and it's such a business, it's such a conveyor belt process. People come in and out, and really you have to think of protecting yourself. You're not thinking of protecting the patient. So not only you have 7, 10 minutes per patient and you are just killing

symptoms. You are really, sometimes putting people on medications because if they have a problem and you didn't, you're liable.

SHAWN STEVENSON: So, your hands are really tied, and I would imagine you have a lot of... Surprisingly, there's a lot of colleague that you would have, who want to do more. They're getting in the field to help patients. But the way that their system is constructed, not actually being able to go outside of the "standard of care" to actually help folks.

DR. ALEJANDRO JUNGER: What I see is that most of my colleagues go in for the right reason. They go in with their heart and they want to help. But after they finish training, something goes wrong, and then this way of practicing, highly competitive and highly oriented towards return. Because for example, when I was hired as a young doctor after graduating from my cardiology fellowship, I really had to fulfill a quota in order for me to be profitable for the practice that I was working for. So that ends up frustrating people. And that's why there's a high rate of suicide amongst doctors and drug addiction among these doctors because they're not fulfilled. They went in for the right reasons, but the system just destroyed everything.

SHAWN STEVENSON: And this is the basis of our cold healthcare system right now. And I'm a big proponent of results. If it was working, so be it. But if we actually take a metaperspective and look at the results of our society right now, we're far from doing well. I've said this statement many times. We are the sickest nation in the history of humanity, and people don't really... It's hard to wrap our minds around this. And when I say... Also, it's self-inflicted, so we're not talking about a black plague or anything like that. We're talking about a situation where we are essentially poisoning ourselves. But this can be happening unknowingly, of course, especially coming from an environment that I'm from where... I come from one of these "food deserts." It is a cute name for it now. It sounds like I'm on safari or something, but I'm in a situation where all I know is food-like products. I'm immersed with them. I'm surrounded by them. And I don't know that there's a difference.

DR. ALEJANDRO JUNGER: So many communities are in that situation. I was watching this TV show by Andrew Zimmerman. I don't remember the title, but he used to go into communities and go to the stores where people buy food, and there's not one single product that is a fresh

item, fruit, vegetable. Everything is packaged. And this is a big number of the population in the United States that don't have even access. If they wanted to buy food, they have to drive 30 minutes and a lot of them don't even have cars. So, they're just stuck with food-like products.

SHAWN STEVENSON: Yeah, precisely. Yeah, so I'm from Ferguson, the majority of my years on planet Earth, I've lived in Ferguson in Florissant, Missouri. And there was one whole food in St. Louis at the time, and it was nowhere near me. I didn't know it existed. And so, to get to it, I had to go outside of my environment. But first I didn't know that it existed. And also, as you just mentioned, not being within touch and reach. What is within reach, when I walk outside my door, liquor store. I mean, it was a fast-food paradise around me essentially. And so, one of the things that we've been talking about, what can we do to provide exposure and access for people? That's going to be one of the foundational things. So, it's not just treating the symptom with our conventional care, but also let's remove the cause, change the culture around health and wellness. So, I'm really excited about that.

DR. ALEJANDRO JUNGER: We can talk about the food industry and the situation around food. We can talk about the medical industry and the situation around healthcare or disease care. But what I'm thinking of is that all these sick systems that we have, who creates them? Who invents them and sets them? It's we. So, I think that at the basis of all these expressions is a human spiritual crisis. And unless we address that, we're not going to be able to deal with global warming or the global pandemic or... These are all just expressions of the darkness in which we live.

SHAWN STEVENSON: Yeah. To pivot from that sentiment, something else that is invisible, but very real. It's like it's a deeper translation of energy in our bodies. All of this is really operating on these electrical impulses. And you being somebody who specialized in cardiology, you understand that better than most people. Can we talk about the electrical nature of cellular communication of organs, even the gut?

DR. ALEJANDRO JUNGER: Really, we are electrical beings, right? Because when you go down and start breaking down the cell into molecules and the molecules into atoms and the atoms into subatomic particles, it's very similar to electricity. So, we are electrical beings. Everything's

governed by electricity, right? The heart is governed by electricity. The way that you know if a cell is dead or alive is if there is an electrical difference between the inside and the outside. So, electricity really is the sign of life. How do you measure if somebody's brain is working? An electroencephalogram. How do you measure if a heart is working? An electrocardiogram. So, electricity is really what is... We are made of electricity, but we are also governed by electricity.

SHAWN STEVENSON: Can you share how this impacts the gut? Specifically, does this influence the movement of things? That electrical currency.

DR. ALEJANDRO JUNGER: So, one of the things that the gut depends on is the peristaltic movement. When you eat, the intestines will propulse food down by contracting the muscles around the gut, squeezing the food down. The segment below it relaxes. When the food gets there, it contracts again. Now how is that governed? By the neuro-enteric system. By the brain in the gut. So how does the brain and the neurons work? Through electrical impulse. Now, when that same nervous system in the gut is busy reacting to things, then it ain't going to have the resources or the attention to put. And what is the result for a lot of people? Constipation, which is again, a global pandemic. And so, hindering to our wellness. Because it's like not being able to take the garbage, imagine in your house, you accumulate the garbage and you never take it out, you wouldn't be able to live. And that is what happens at a cellular level when constipation is the case. How is constipation resolved? By resolving the electrical activity in the gut. But that is also connected to a lot of things.

SHAWN STEVENSON: Yeah. Let's just say there's a breaker on the amount of electricity that we can generate. And in our culture, a lot of that electrical energy is being used for digestion, constantly in the digestion of abnormal things, our body trying to figure it out and using so much of that electrical energy. Could this be a reason why that energy in a sense it's getting siphoned for this? And it's being pulled away from our ability to think logically, our ability to have empathy? What do you think about that?

DR. ALEJANDRO JUNGER: There's two types of energy. Just in a broad-spectrum chat, there's the energy that we generate moment to moment in our mitochondria, by burning glucose and oxygen into ATP. And then there's the energy that a spiritual master Gurdjieff talks about as

being stored in capacitors. And this is a little bit esoteric, but if you think about it, when you go to sleep, and you wrote a book about this, what really happens? You recharge those capacitors, that there is no other way of recharging. We haven't come up with anything, any invention that will recharge whatever it is that we recharge when we sleep. And we know how important it is to sleep. So, when you have a good night's sleep and you recharge those capacitors, you wake up in the morning and yes, you're going to be generating ATP all the time.

But it is these capacitors that have a very important function. And everybody's talking about the mitochondria and how to optimize their function. And a lot of people are talking about how important sleep is. But not a lot of people are talking about why sleep is that important. I mean, how it works, what's the mechanism behind it. And I invite you to read Gurdjieff, there's an amazing book called *In Search of the Miraculous*, written by Pyotr Demianovich Ouspenskii who was a student of Gurdjieff. And he describes the capacitors. And he describes how there's a big capacitor and there's a couple of other smaller capacitors. And when you exhaust the big capacitor, the flow of energy switches to a smaller capacitor. The moment of the switch is when you yawn. The yawning is caused by the switching of one capacitor to a smaller capacitor.

Now, you are waking up with let's say 100 units of energy in that capacitor. Now that has to be distributed amongst all the systems. When there is one system that works more than it should be working, then other systems are going to suffer. For example, when you have a big meal and you're digesting a big meal, as you said, the thinking system is depressing. The body puts you to sleep because the body considers digestion a survival thing because food wasn't as available all the time as it is now. So, our life depended on when you found food, being able to fully digest it and absorb it. So that's why in our evolution, the evolution gave so much importance to the gut that it really takes over other systems, even the thinking, even mentation.

So, because these days, most people are digesting 24/7. We eat all day long, breakfast, lunch, and dinner. No other species in the planet does that, we are digesting all day long. Just go on the streets and grab 100 people at random in a modern city. And of course, there's a lot of homeless people now. So, this formula may not work that well because homeless people

maybe are not digesting all the time like everybody else. But everybody's at some stage of digestion.

Necessarily, digestion is an energy-consuming process. It will steal energy from detoxification, from defense and repair, even from ambition and that's why we are so dulled up, and so anesthetized. People are not thinking on their own, people are not ambitious. And I'm talking about not only ambitious, like in LA to be famous or to work and make money, I'm talking about ambitions to discover, to connect, to improve. We are dulled down because we are digesting all day long. I say that breakfast, lunch, and dinner is killing humanity.

SHAWN STEVENSON: Wow. This is remarkable. This is even just a simple tie-in for this, is going to bed after eating a large meal in the evening. I would imagine that that's, it's going to create friction with those capacitors.

DR. ALEJANDRO JUNGER: It doesn't allow the capacitor to fully charge. And that's why people don't have a good night's sleep when they have a... They don't have restorative sleep. When do Tigers... I mean I don't know if you've seen all these TV shows by David Attenborough about animals. I've just seen one that is divided in continents. And there's one about South America. And they film this family of a... I don't know if it's a bobcat or a... Well, a big cat. And they show you, first of all, the mother and the cubs are eating, and then they're lazy and sleeping. And then a couple of days after they had their deer or whatever it is that they killed, they start walking around and they start getting more active. And then they start getting hungry. And then they start getting really hungry. And you can see that when they're really hungry, they are ambitious, and they are awake and alert. And he hears a deer far away, and he's almost starving... Or she, the mother, is almost starving. But she's determined to catch that deer or gazelle or whatever it is. And their whole journey, you can see their ambition of these animals. When is that turned on and intensified? When there's nothing in the belly. When there's no digestion happening. So, I think that one cancels the other.

SHAWN STEVENSON: Yeah. That's remarkable. If we would just think about if we were living in a natural setting as humans, that feeling tone getting up in the morning and not having

immediate access to food in the form of a bag of whatever. It's going to prompt you to be sharp.

DR. ALEJANDRO JUNGER: I didn't have breakfast today because I knew I was going to come and talk to you. And I know that you're a good questioner, and I want to be sharp. So, I had nothing to eat.

SHAWN STEVENSON: That makes two of us. But this would have been unheard of. Coming from my conventional education, I was taught within that first couple of weeks of school, might have been the first day, that breakfast is the most important meal of the day. The breakfast of champions. You got to fuel up on a big breakfast. And I think a big shift... Well, I know a big shift took place when we shifted from living in a natural setting to becoming laborers, to working for somebody else where you're no longer in control of your time. So, it's more of a social construct. And I want people to know this. It's not that you can't have a breakfast, but it's a social construct more so than what we are biologically designed to do.

DR. ALEJANDRO JUNGER: And later on, it became mixed with financial and business interests.

SHAWN STEVENSON: Of course.

DR. ALEJANDRO JUNGER: I always say, "Let's say we stop one of the meals a day." Let's say we agree as a society that nobody's going to have breakfast for two months. How many businesses will go broke? Right? So, they're not going to let that happen.

SHAWN STEVENSON: Not Kellogg's. They're going to come... Tony the Tiger is going to come knocking on your door. That's crazy. That is so true. And also, General Mills was a contributor to our nutrition program at my university, by the way. You got to think about, again, who's funding the science, the so-called science that you're learning. That's remarkable. We got a quick break coming up. We'll be right back.

Our microbiome plays major role in regulating our metabolism, literally playing a role in determining how many calories are absorbed from our food, for example. Our microbiome

also controls so much about our mood, with the vast majority of our body's serotonin being produced in our gut. And our microbes interact with these enterochromaffin cells and enteroendocrine cells that produce our hormones and neurotransmitters in our bellies. And one of the biggest issues we're seeing today is gut dysbiosis, where friendly microbes are getting overrun by opportunistic bacteria. One of the few amazing sources of nutrition that's been found clinically to reverse gut dysbiosis is highlighted in a study published in the Journal of Agricultural and Food Chemistry. It discovered that the traditional fermented tea called Pu'er may be able to reverse gut dysbiosis by dramatically reducing ratios of potentially harmful bacteria and increasing ratios of beneficial bacteria. Another peer-reviewed study published in the journal Nature Communications uncovered that a unique compound called theabrownin, found in traditional fermented Pu'er, has remarkable effects on our microbiome as well. And the research has found that theabrownin positively alters gut microbiota and directly reduces hepatic, aka liver fat, and reduces lipogenesis, which means the creation of fat.

Pu'er is absolutely amazing on so many levels, and it's also a powerful adjunct to any fat loss protocol because it's been found to support fat loss while protecting muscle at the same time. And this was documented in a recent study featured in Clinical Interventions in Aging. Now, the key is the source of the Pu'er matters a lot. And the only Pu'er that I drink uses a patented cold-extraction technology that extracts the bioactive compounds in the tea at cold to low temperatures for up to eight hours. And this process gently extracts natural antioxidants and phytonutrients and preserves them in a whole bioavailable form. And this is the purest way to extract the phytonutrients for maximum efficacy. This Pu'er is also wild-harvested, making it even more concentrated in the polyphenols that we see having benefits in those clinical trials. Also, triple toxin screened for one of the highest levels of purity tested for pesticides, heavy metals, and toxic molds and making sure that it is not in your tea, which is common in most other teas.

This is why I'm a massive fan of Pique Teas. Go to piquetea.com/model. That's P-I-Q-U-E-T-E-A.com/model, and you'll get 10% off their amazing fermented Pu'er and all of their other incredible teas. These teas are in a league of their own. Their Pu'er is amazing. I'm a huge fan of their ginger tea as well. Go to piquetea.com/model. Again, you get 10% off everything that

they carry. One of the best investments in your health, supporting your microbiome, supporting your metabolism. It is absolutely amazing. Head over to piquetea.com/model. And now back to the show.

I want to ask you. So, we've talked a lot about nutrition and diet and the inner workings of our amazing bodies. What are some other modalities for us to look towards in detoxification and fortifying our health to be more resilient, especially in a time like this?

DR. ALEJANDRO JUNGER: I watch your show avidly, and you talk about all these things, right? Being outside. Being in relationships with people, having social interaction, exercising, being exposed to the sun, being exposed to the changes in weather and temperature. Everybody's talking about Wim Hof now and deliberate cold exposure, right? What is one of the simple factors or simple elements of that? Is that we are stopping, interrupting our comfort level, and we're used to go into buildings, cars or wherever, even public transportation, and if it's hot outside, there's an air conditioner, if it's cold outside, there's the heater on, right? So, we never fluctuate. We are living in the name of comfort; we are killing ourselves. So, exercise, what does exercise do in a way, it takes you out of your comfort level. What does social interactions do? It takes you out of your comfort level. It's much easier to be at home watching TikTok than going out and having a conversation with somebody. So, I think that that is really, really important, getting out of your comfort level, breaking this pattern of living for comfort.

SHAWN STEVENSON: Yeah. Wow, that's powerful. I'm thinking about, I'm going to share this with you. Alright, I know when my wife is in my office when I come home and there's a space heater in my office. We live in Los Angeles now, there's no need for this space heater, there might be some crumbs from a little snack or whatever on my chair or whatever, she gets her little creature comforts, she has her blanket, she has her heater, and I still give her this out, she is from Kenya, so it is still cooler here, but she doesn't give herself an opportunity to adapt, and so when she does get hot, she immediately wants to get cool. And this is no knock on my wife because she's perfect by the way, let me just make sure that that's clear, and it's on record.

DR. ALEJANDRO JUNGER: This is all of us. This is all of us.

SHAWN STEVENSON: Yeah, so we're always reaching for that thing to make us comfortable instead of just having a little bit of grace and just allowing our bodies to adapt because they will.

DR. ALEJANDRO JUNGER: The same thing with intermittent fasting, which is now becoming so popular, right? What is it that it has in common with all these other things that we're talking about? You're uncomfortable, being hungry or whatever that sensation is, is uncomfortable, so nobody wants it. As soon as you have some discomfort, you dump something, and you anesthetize yourself.

SHAWN STEVENSON: And here's the crazy thing, you... At some point, you become comfortable with the discomfort, and it's just a very powerful place to be, you just feel like you can survive, at a different level, you know you see the adaptation taking place and you know that you're good. It's a very powerful thing to have that a lot of people don't have today.

DR. ALEJANDRO JUNGER: And their body, when it starts adapting to discomfort, just like adaptation mechanisms can turn into diseases, the adaptation mechanisms that the body engages in when adapting to discomfort, they're very powerful. And for example, deliberate cold exposure, there's so many things the body adapts in so many ways, one of them is turning yellow fat into brown fat, and all the metabolic differences between them, one of them being toxic fat and the other one being healthy fat. But what is that? It's an adaptation mechanism to the discomfort of being exposed to cold, right? Exercise, adaptation mechanism of building muscle and secreting the hormones, that endorphins and all these are adaptation mechanisms to discomfort. So, at some basic level, we can really see the common thread amongst all of these things that we are now understanding and proving scientifically are so good for us, it's really being uncomfortable.

SHAWN STEVENSON: Yeah, so it makes us more resilient in the world. And this reminds me of, you had a conversation... I don't know if you really know this about yourself, but you are an influential factor in the Marvel Universe, the Marvel Cinematic Universe in this mega superhero genre. You have a relationship, for example, with Zoe Saldana.

DR. ALEJANDRO JUNGER: She's like family.

SHAWN STEVENSON: Yeah, and she plays Gamorra in one of these major Marvel blockbuster movies and series. And a conversation that I saw that you had with her... And I want everybody to make sure they're following you on Instagram because you teach in both English and in Spanish for people as well and share so many great insights. But you were having a conversation with her, and you were talking about resilience of plants in nature. And the jungle specifically was your example, and the demand for them to become more resilient versus the monocrop consciousness, or the mono-crop nature of our food system today and how things are grown. And so, you were sharing that. And also, you pivoted into our resilience of our immune system in interacting and eating these plants. So, can you talk about the difference between plants growing in a natural habitat, versus the monocropping scenario first?

DR. ALEJANDRO JUNGER: So, a natural habitat with its biodiversity, things help each other. For example, one eats certain nutrients from the ground, the other one makes them. Like the mycelial network digests certain plants, and provides... So, there's always abundance of raw materials. But when you have a monocrop, all these plants that are the same, are eating the same nutrients, they will deplete those grounds of that nutrient. And then they're going to be less resilient, less resistant to infections and other negative influences from the outside, from the environment. And that's why we need insecticides and pesticides because these plants are not defending themselves. So yeah, the biodiversity is really important, and that translates also into the biodiversity of what we eat. If you're eating just two, three things, it's one thing, but if you're eating a lot of different things... Like our ancestors used to eat 3000 types of plants, we are now eating only 300 types of plants. So that loss of biodiversity translates into a loss of biodiversity in your microflora, and with the consequence that we now understand and prove scientifically. So, biodiversity is really, really important.

SHAWN STEVENSON: Yeah, and that analogy as well. So, the plants not having that exposure in a natural habitat to develop their resilience, their "immune system" and then being attacked by "bugs" right? And the same thing, the parallel happens for us being more susceptible to bugs, or viruses, bacteria, pathogens. And this is a very good parallel because when you

mentioned... This is what really got me, the need to add in pesticides and herbicides in order for these plants to survive. And now we have to add in certain things for us to survive, right?

DR. ALEJANDRO JUNGER: Antibiotics, antifungals, all these. Yeah.

SHAWN STEVENSON: But it's not... It's survival and it's not thriving, it's not excellence.

DR. ALEJANDRO JUNGER: As above, so below. What's happening on the earth is what's happening in your gut. And we are really going down a slippery slope. We are already not going... We're already down, we're touching bottom. And just like we are at the point of no ret... Almost at the point of no return in terms of global warming. We are at the points of... Almost at the point of no return in the sense of global wellness as a species.

SHAWN STEVENSON: It's always great to talk with you, so insightful and inspiring. Is there anything else that you would want to share with folks right now? Obviously, it's a very turbulent and complex time, and you just mentioned we're touching bottom. Is that bottom a solid place for us to stand on and to start to build something else?

DR. ALEJANDRO JUNGER: I hope so. And I never lose hope in humanity because the truth is, every time I encounter somebody and you establish a connection, you can see the goodness of people. People are good. And they're carried away in political opinions, and opinions about everything else, and they're identified with it. And I think that the biggest problem is that we have become not present. So, I think that if we work on becoming more present, all these things start dissolving. And that's the focus of my personal work, is really learning how to become present. And the more that I am able to do that, the more I see that I am able to connect with people, and I am able to forgive and not judge. And I'm far away from perfect. But in my own experience of what I was before and what I was now, the most important work that I did for myself is paying attention on... Putting my attention in the present.

SHAWN STEVENSON: That's powerful. Can you let everybody know where they can find your books to learn more from you?

DR. ALEJANDRO JUNGER: I've written four books, "Clean" which talks about the problem of toxicity, and how to support and enhance our already existing detoxification system in the body. And there's a program that really works for people. I wrote a book called "Clean Gut" which describes how health and disease begin in the intestine, and how an intestine gets damaged and how to repair it. I wrote a book called "Clean Eats" which is basically recipes to support the programs of these other two books. And my latest book is "Clean 7" in which I mix principles from functional medicine, Ayurvedic medicine, and intermittent fasting for a really powerful way of detoxifying and gut repair. I'm also on Instagram, Facebook, Twitter.

SHAWN STEVENSON: What's your Instagram handle?

DR. ALEJANDRO JUNGER: D-R, doctor, Alejandro Junger, my name. And then I also created a company called Clean Program. And we provide everything that somebody needs in order to engage in these programs of detoxification and gut repair if they don't have time to go to the supermarket or to the farmer's market and prepare their own foods, which is always the ideal way of doing it. But because we live in such a fast-paced crazy life, then instead of leaving people with nothing, I created this line of supplements and kits that really, really help people get started.

SHAWN STEVENSON: Yeah, yeah. Well, we're going to put everything in the show notes for folks. And again, I want to reiterate folks, make sure that they follow you on Instagram. And your books are... You're going to be humble, but they've been massive influential factors for not just everyday public, but also a lot of healthcare practitioners as well. And these tools are now again, you've been so far ahead of the curve. And so, I want to connect with somebody like you so then I don't know what's coming next. And so again, thank you so much for being you and for being a light on this planet. And, yeah, I appreciate you.

DR. ALEJANDRO JUNGER: Thank you for having me. It's always a pleasure.

SHAWN STEVENSON: Awesome, Dr. Alejandro Junger. Thank you so much for tuning into the show today. I hope you got a lot of value out of this. Please make sure to share this episode out with your friends and family on social media, and of course, tag me, I'm @shawnmodel on

Instagram. And please tag Dr. Junger, he will be blown away to hear your voice and your feedback. And truly, he is one of the people who is on the low working with some of the biggest celebrities, royal families, all kinds of stuff. Because truly, he's the go-to person when folks are actually wanting to transform their health in a sustainable efficacious way. So again, he's definitely somebody that you want to follow. And of course, we can't miss his voice as well. I often tell people he's the Antonio Banderas of health and wellness.

Alright, just a voice that you can definitely listen to and of course extract a tremendous amount of wisdom. I appreciate you so much for tuning in. We've got some incredible guests and masterclasses coming very soon, so make sure to stay tuned. Take care, have an amazing day, and I'll talk with you soon.

And for more after the show, make sure to head over to themodelhealthshow.com. That's where you can find all of the show notes, you could find transcriptions, videos for each episode. And if you got a comment, you can leave me a comment there as well. And please make sure to head over to iTunes and leave us a rating to let everybody know that the show is awesome. And I appreciate that so much. And take care, I promise to keep giving you more powerful, empowering great content to help you transform your life. Thanks for tuning in.