It's rally best and I'm back with another great interview actor Matt Cook. So, Matt, welcome to The Healing from Lyme Summit. You were talking about sort of the traditional path approach of just trying to find the one thing, like the one a day vitamin or the one culprit that is in charge.

And it isn't that way, really, not in nature. Whether you're healthy or you're or you're you're chronically challenged. And so treating the whole person and being an active listener reporter, he said.

If you listen to your patient long enough, they'll tell you their diagnosis and you listen longer, that they'll actually tell you how to cure them. So I think that we, as advanced as we are in so many ways, we just stopped listening.

We didn't have time to listen, be more. I'm not sure over the years. I don't come from that orientation. It doesn't sound like you do either. But I think that for Lyme is that are just tuning in now, if you don't have a practitioner like Doctor Cook and and his associates, I had the pleasure of meeting one of his colleagues, Doctor Brian Plant, and we spoke for a while, and he was original and young and just eager to to help and to, heal.

And these are amazing qualities, not just from a young practitioner, but certainly what I would like to working forward, I'd love to see more of. And it feels like, you know, the command came, you must be setting a good example over there, Doctor Cook, because, he's taken the lead.

So so that reductionist piece I think is interesting to me because that's most of the people out there. And also generational. And my parents, when I ask them, mom and dad, who's in charge of your health care?

They would say, you know, Doctor Henderson, doctor Cohen, not sure it's one of these doctors like they're in charge, you know, and my generation. So it's a mix a little bit younger generations are seem to be more involved in taking an active role in either maintaining their health or work, teaming up with the practitioner team to be to buy in.

It's my life. I want to be part of this and and it's feels to me like you've created a platform that really invites that kind of interaction, which is the information that you need as a practitioner and your team in order to properly understand what's going on and as as it changes.

Because all of these things we're talking about isn't a static relationship. It's dynamic. It's always changing, like your body is. And so having that voice and having a platform where you can actually communicate on that level, I think is crucial.

And I wish that one more practitioners took that view. And it's so refreshing for me to hear that from you today. And you treat the whole person you're not.

Again, back to Western. They like to marginalize everybody's like this. Give it a big label that's sort of amorphous and they'll go away because now they've got a diagnosis and they can hide under or go over that diagnosis and you know, but you well, let me just put a different, different way.

I'll, I'll personalize it for my daughter. I said to her, you know, you may always have Lyme. It might just be like hepatitis or like malaria. You might always have something inside of you.

This is what we're made of, a lot of these relationships with different organisms. But what's important is it important that you hang your hat on the name Lyme disease or the co-infections or Epstein-Barr or whatever?

Or is it important to focus on living purposefully and and finding your bliss? So, or making some contribution to your community, your family, whatever your passion is and the label is label.

So I've got a good one for you on this one. And then, okay. And then this will kind of and I mean, I'll give you a little then insight because we were talking about, well, what do you have for somebody that might be real sick or real healthy, but on the journey of getting better?

And then if you said, and then you're using, we're using this word a diagnosis, which is. Kind of confusing, I think, for people because it's like, oh, I have Lyme disease.

Okay. So then it might be, it might be that a significant percentage of the population has been exposed to the tick Borrelia. It might be that a significant percentage of people had been exposed to, through a thorough tick tick brella or to Bartonella.

And so then now a lot of them, most of them don't have any symptoms. And then some of them have symptoms so bad that they're they got that inflammation that I was telling you about in the brain.

And then they're they're, it's started to create stress on their immune system. And then they might have like pots or mast cell, which are some of these things that are profound immune stress to some people can have they may have extreme headaches and all kinds of symptoms.

And so then it's confusing that there are some people that got that and beat it. You know, it's kind of like, oh, I beat cancer. There's and they don't have any symptoms.

And other people that it's seems totally overwhelming. I fundamentally think that you can 100% be Borelli and Bartonella and you can 100% beat Lyme. Now we just have to balance and reset the immune system.

Now then you say, okay, how do you do that? And so then and I think this is going to be an intriguing one for people to think about. And, I like to talk as an analogy to something that maybe other people have heard or to a process that people may have heard of.

And so, you know, when you hear about mold, a lot of times in the traditional mold treatments, what they would do is they'd say, okay, we're going to give you a binder that's going to bind onto the mold and the gut, and we're gonna keep doing that for a long time, like a year or two.

And then once, your mold levels go down, inflammation in your brain starts to go down. And so the more that that goes down, they do this test called the visual contrast sensitivity.

And that'll start to show, hey, that inflammation in your brain went down a little bit. Well that's awesome. And so then they say okay now you're a candidate for this other peptide that is found in the hypothalamus called VIP.

And then you might be able to take that. Now that peptide, what it does is it regulates which genes you print. So it's kind of like the foreman in the factory that's kind of goes over it goes into the nucleus and says, okay, we're going to print these ones.

We're not going to print these ones. And if there's a, in if you're in the setting of that high printing, the high inflammatory genes, when you give VIP, it tends to come down.

Now, the chaos of mold. And and this really struck me because that was like right at the beginning of my journey. And I thought, oh, this is too complex for me to even understand because we knew these people that have been on a two year journey or 3 or 5 year journey more than they were still waiting to try to get VIP and, you know, and not better.

The amazing thing is, is that in the last few years, all of a sudden a whole bunch of other, peptides and a peptide is like a baby protein. But, the bio regulator peptides are real small peptides, two, three or 4 or 5 six amino acids.

So they're not that big, which means they can go in, they can go into a cell, and they can go all the way into the nucleus and affect how we're printing genes and stuff like that.

But it turns out there's a whole bunch of bio regulator peptides, that are similar to VAP but have way less side effects. And so then, what happens some of and interestingly, we're experiencing ourselves.

So when we put some of our patients who have mast cell activation and parts and some of the the downstream expressions of neurological and immune inflammation, when we put them on those bio regulator peptides, they start to feel better.

And so then and and even when I took them, it were both getting an a cold plunge, eating vegetables from the garden and taking bio regulators all kind of remind me of being like a, you know, a seven year old kid running around, you know, on Mount Jumbo in Missoula, Montana, where I grew up.

And, and which is as good a feeling, you know, as I ever experience, you know, free running in my imagination. And the words and the, and and and so then there's a and these are relatively low cost.

And so then suddenly there becomes a way to start to intervene in neurological inflammation that as you lower that inflammation, things like your visual contrast, your eye, the eye tests that they do gets better.

But then a whole bunch of these other downstream thing gets better, and then you start to feel better. And then as that inflammation is going down, it'd be like if I had this analogy, I said, you know, it seems like we're getting along great and I like talking to you.

And so then I was like, just occurred to me that I have like 92 favors for if you could do and help me, which I would, I would appreciate. But then it's like you're like, okay, well, I have meetings all day tomorrow and the next day.

So then if you if I ask you to do 92 favors, you probably would consider maybe do none of them. But if I gave you, like, one, almost for sure you would do one.

The immune system's like that to when it's everything's out of control and it's overwhelming, the immune system sort of gives up and it almost retreats and does nothing while is waiting for things to get better.

Whereas once the inflammation kind of comes down and starts to be reset. And so then this, this theory that I have for people who are kind of, trying to hack the journey of themselves, and this is kind of my maybe my intention for this call would be like, okay, let's say you're you're trying to do the cheapest possible way to try to get better, you know, and work with some guidance, but, you know, trying to manage your way through because a lot of managing your way through is fundamentally lifestyle.

So that the peptides start to regulate that inflammation down. Now that conversation that I had would be a conversation that would kind of tell a story of what we would call serves it would it also kind of a similar story to Long-Covid, like COVID's kind of like that.

But then it Bartonella and Borrelia, which are the really the neurological expressions of Lyme really are on the same spectrum with that. And then often there's a little more along with it.

And so then as a 1.0 strategy, I find that really helpful. And that's something that might change someone's trajectory, sort of in terms of, and and interestingly, whether it be peptides where whether it be supplements, whether it be medications, the the, the big gigantic proteins are the ones that people have sensitivity to that there's a things that people can have immune reactions to, the real small two and three amino acid peptides are the ones that tend to be real anti-inflammatory.

And then there's the interestingly there, you can take some of the by a regular bio regulator peptides orally. And there's sort of a famous and I think very good doctor in Russia actually named Doctor Calvin Sun, who has been a thought leader in pushing sort of the oral bio regulators.

We also we like them very much as an injectable. And so that I think that that's an intriguing idea, doing, doing them injectable. And so then just for, the people, a lot of times people might in a month do like a milligram a day or

half a milligram a day of a of a bio regulator.

So then that, that as a so, so suddenly I the story I'm painting just got a little bit more robust because now you can do these bio regulators as an injectable.

You might be able to take them orally. In addition to sort of the, the bio regulators, there's also some peptides that are very kind of helpful at sort of just calming things down.

Cfpb is as a peptide that can help a lot with mast cell. And that one is sometimes that you can find it orally. And so then suddenly imagine that you're in this journey where suddenly we find some things that can kind of down regulate things and start to balance things.

And generally what I'll see is people will say, oh yeah, yeah, my symptoms are a little bit less and I'm feeling a little bit better. And, and then and, and so then that, and then if you, if you kind of begin to accept that all of these things are in the same kind of conversation, mold and lime and, and, and, and probably long Covid and they overlap with each other and they trigger each other.

But then now there's kind of an entry level conversation of the virus regulators then, that is they sort of a nice place for us because suddenly people have some power and they have some things that they can do, and these are almost all treatments that they do at home.

The, you know, one of the, one of the things. Have you have you talked to anybody about ozone therapy? And it's due to come. We have a guy who is. That's this whole deal.

We actually use ozone, as another sort of synergistic hack with, infrared sauna and some of the protocols we put together and get great results. But ozone in this discussion is great.

I mean, it's nature's disinfectant. And certainly in terms of balancing your biome, the Arabs don't like ozone or extra oxygen. And so however you do it, either ivy or insulation, there's different ways to get it in sauna and even in like hot baths, we we bubble ozone into the water or in a sauna.

Once your skin gets hydrated, then we use the skin as a breathing organ to bring, ozone directly. And if it's not, it's a little less invasive than doing it through ivy therapy.

And it's super effective. So yes, the answer is yes. Categorically. We like ozone is our friend in on many levels. So and for for people that are like, oh my God, what the what the heck is ozone?

The it's an ozone is an oxidative therapy. And so you can donate an electron. And so then if it donates an electron to a virus or a one cell bacteria, that is going to be toxic to that, that, bacteria, we have all of these buffer systems that are, that are, you go from low energy to high energy.

And so like nad gets converted to the high energy Nadp+. And so then when ozone is floating around and donates an electron, it recirculate all of these kind of low energy state molecules back to their high energy.

And so then that high energy state molecule acts kind of like currency in the body. So for B that for mitochondria are a variety of other processes. And so then I like the trajectory of this.

And so then we're kind of we talked about some peptides that are interesting, that you can do at home. And then the immune peptides would certainly be something that I would add to that.

And then there's, mitochondrial peptides that maybe we can go back to that kind of stimulate energy and, and, and cellular efficiency and function that a lot of times can make people feel a lot better.

But then on the ozone front, there's all of these ways to do ozone that you can do at home. And one of the really good ways is with the skin. You know, I have an ozone sauna, at my house, that we like, the, And the skin is a

great way to absorb ozone.

And probably there's a lot of, low level skin problems that ozone. Ozone can kind of be quite helpful at that with infections. And and interestingly, when you hear about mold, they say mold is not is no longer mold.

That's mold. Plus this kind of mix. And where the accent is is can be in a water damage building. But it also likes to get colonized on your skin. And so then like I was on sinus an interesting thing for that idea.

We like the ozone water quite a bit. And so then that goes into the small intestine, and gets absorbed there. If you have bacteria or yeast in the small intestine is kind of toxic for them but good for your intestine.

So then that's a good and it's a way to absorb some ozone systemically in particularly going to your liver which, which there's more nad in your liver than anywhere else except for maybe the brain.

And so then, anything that you can do for that upper gastrointestinal system is good. We have intermittently used the encapsulation over the years. I there's a part of me that sort of is I'm in a mode right now of doing everything I can to build microbial diversity in the, in the gut.

And so I'm beginning to sort of question a little bit the, the, in the installation. And so we've been doing a lot less of that than maybe we had in the past.

But those are all kind of low cost, easy things that people can do at home. And they'll have their, their own machines. The, but then it turns out you can have an ozone generator that can be hooked up to, tubing, and then you can, mix ozone with blood.

And so then there are machines called a ten pass machine that's a high dose ozone therapy. And, from a doctor named, Doctor Le Hodnett, who I've studied with quite a bit, who's an incredible doctor.

And, so then there's, a bunch of approaches. And so then, and interestingly, I would say a significant percentage of his greatest results are the two categories that I remember is skin infections and problems and, Lyme disease.

And so then they found that out and started taking care of Lyme patients. And so then I was I found ozone early in my journey of integrative medicine.

And it was sort of a profoundly helpful tool that we had. And then, now we do something called ozone dialysis where we run blood through a dialysis filter and then do ozone at the same time.

And it has a huge surface area and we do very low amount of oxygen concentration wise. But because of the surface area, it oxidizes the blood. And has an anti infection kind of component to it.

And so then that's been quite interesting. And so then if you think of of one idea of lime is kind of of managing lime diseases let's say regulating and balancing the immune system.

And so one way to do that would be with peptides. Another way would do with with regenerative medicine, stem cells and exosomes and things like that, that we, we do out of the country.

Now, just because of regulatory issues. Ozone also is a great way to regulate and modulate, immune function. But it and so then that would be a category.

Another thing to do would be to do an antibiotic. So then ozone is kind of falls into this two for one because it's kind of an antibiotic. And it's also immune regulatory and it also helps people feel good because it gives them some some energy because it facilitates things like mitochondrial function and stuff like that.

So the the ozone, it's been an intriguing, tool for us. And we also have a form of plasma free. So that's where your body's about half plasma and half, red blood cells and white blood cells, and we'll pull off about a third of the

plasma, and then, and that plasma is where all of the inflammation and toxicity is.

And so it's kind of a big detox. And then we while we do that, we do low dose ozone, and it's kind of a micro dose of ozone. And so then that is really sort of has, has been an interesting tool that we've used to help people with, these chronic immune problems where they have immune dysregulation and infection and, and, and now one way of thinking about that immune dysregulation is in the, the heart and the lungs and the blood vessels that is floating around in another way.

So think about it as in the brain where, and they're constantly talking to each other. And then and so then we're, we're living in kind of working to harmoniously balance everything that's going on and in a way that is, killing the infections but not killing so much that it makes you feel sick and causes a lot of side effects, and then managing how you balance and support things so that you're, balancing it down, but not balancing it down so much that you can't actually fight the infections.

So it's kind of like a double edged sword of kind of the we're serving two masters in terms of regulation and kind of in, fighting, trying to fight. And so then the way that I and I heard this great, this great, lecture from a, the professor, at Hopkins who was talking about he said, you need just like I was using my conversation of mold as an analogy to think about how these are all fundamentally the same.

He said. You need to think of a analogy for chronic persisting neurological Lyme. And so he says, what is the analogy to that? And the analogy is entrenched, drug resistant tuberculosis of the brain because there's kind of similar.

And what happened is this, they said, well, you're going to need to use this to reinforce drug cocktails. And so then you say, okay, so then interestingly, what we'll do is we'll use peptides.

And so then that's kind of like an anti microbial. So there's a peptide called L 37. And we tend to use low dosing of it. And so then and I'll just say a little bit about dosing while I'm going through will tend to do maybe 5 to 10 micrograms.

If someone's sick we'll do ten micrograms. I mean, 50 to 100 micrograms. So if somebody was sick, they might do 100 micrograms twice a day. If they're if they're struggling with chronic infections, we might start them with 50 micrograms.

And for sick people, sometimes I'll start them even really low. And the and it helps to actually like break the cell wall and kill infections. The thymus and peptides are hard to find now, but there's some alternatives that are coming out from compounding pharmacies.

And so I think immune peptides L 37 and so then that's almost to my analogy of a three drug or four drug cocktail, I already got two down. And so then and sometimes you can do a couple of those, then ozone is kind of a modality that, well, is as almost like, as a pulse is something that can be helpful and that could be something you could do at home drinking ozone water.

That could be something that you're doing in a clinic, kind of like what we're doing. And then a lot of times what we'll do is we'll add a, and an and, herbal anti-microbial.

And so the herbs a lot of times I find are a great place to start. And so then with that, now we're up into the ballpark of four things that have an anti-microbial.

And then while we're doing that in parallel to this antimicrob bio thing, we're doing a lot of work and trying to balance and support and regulate immune function, which is sort of like the if you go back to the analogy of those firefighters, we're kind of trying to win the hearts and minds of those guys that have PTSD from running around fighting these infections everywhere balanced, and then kind of get them, get them oriented to, okay, here's what our plan is.

And then when that happens, often see people feel, you know, quite a bit better. Listening who was incredibly, you know, defined and intriguing. And, you know, earlier you were talking about what really resonated for me was when you talked about your immune system and how if there's too many battles, it sort of just shuts down and says, I'm coming back to the to the game or to the field when things are calm down a little bit, because I can manage that, but I can't manage this.

And, and you're ending up with basically kind of the solutions, or at least part of the pieces of the puzzle that you put together. Because using these four interventions that you mentioned, what are you really doing is kind of lowering that confusion, lowering the toxicity, lowering the inflammation so that the immune system can come back online and actually do something meaningful in terms of what it was designed to do.

Absent knocking out the immune system altogether and going after the enemy, which would might, particularly if the patient is very delicate and or very symptomatic, just throws them into this tailspin that isn't health for anyone.

What I love about all of the things that you said is you found it's multifaceted, it's individualistic, but you found some key players, like peptides and certain particular peptides that are like the front line, first string, second string, third string.

And you and you, you, dove them into the mixture as appropriately as appropriate as it's for the patient. But what you're doing really is you're you're creating, you have a symphony that you're tuning up, and while you're lowering the amount of population and, in balance, correcting the imbalance a little bit on the bio microbiome at the same time you're building, my, if I was your patient, my natural immune system to really go after and do what it was designed to do without all of these other explorative influences.

And then lastly, hopefully, besides just gaining part of your health back re defining your new your new self, you've learned about the better ways to eat and the better, better ways to live.

And you know, touching the earth, communing with the earth. And some of this modern stressors that are now called conveniences. But that's fine when you're not ill, but when you're ill, they're not conveniences.

They're actually getting in the way of you, you know, being and, you know, being yourself. And doing what? Where you're hopefully finding your bliss and purpose and and exercising that.

Right. So so I, I love your approach. It's certainly very original. And, no one's really described peptides and how they sit in the as one of the players, you know, on the field and how important they are, and how subtle they can be.

You know, you don't really have to dial it up. You can actually kind of have a low dose entrance, see how the body responds, and then then shift according to the way the body is responding.

I think that's super important because we're all individuals, we're complex, and the story, it not just being rhyme, it could be a cascade of different relationships of organisms that are creating this internal imbalance that is the reason why symptom symptomatic, not to mention glyphosate, leaky gut, leaky, everything actually because of glyphosate.

So so I mean, we have things we can't change about our environment, but we can do things to be proactive. Like you mentioned, sauna and cold plunging.

And these are all things that activate exosomes and stem cells and all the regenerative parts of our bodies that are still in our blueprint. But, you know, you can't really enjoy it.

Your body really can't enjoy it when it's fighting. So many battles. So you have to kind of create, you know, bring, bring it down, simmer it down a little bit so that you have the patient gets more of their life back.

They feel good than the practitioner or team has more time to really go after and create that. The proper playbook

for that, that individual, this is okay, so that's a good one.

So then I'm going to go into a little playbook type of thinking. And and then I'm going to give you okay I got a handful of things that I remembered that I should tell you.

A handful of interesting things that are like kind of low cost and worthy of thinking about because, if I, if we took this spectrum between somebody that basically is almost totally fine, but they definitely tested positive for these infections and maybe they've had some intermittent reactivation of them and somebody who's despondently in a terrible state.

And so then we're talking to these are my, my two, avatars that we're, we're, we're speaking to, then there are a whole bunch of, like, awesome hacks that are kind of worth trying and working your way into experiencing to see if they help you.

And now a lot of these are in kind of the public consciousness. And so then. Yeah, want and so then I'd like to talk about, if there's any controversy or kind of interesting things that kind of get into one of them is, this thing need to be heard about that.

So NAD is a, derivative of vitamin B3 and it, has it's kind of like currency in the body. And when it's in the plus form, it's in the high energy state.

Remember I told you ozone can and so the and then that it can do a lot of good things. I like and the, the assembly line of biochemistry in chronic infection gets fairly dysregulated.

And so not only is the immune system real stressed, but the, the, the assembly line that creates energy and life in our actual cells, gets kind of stolen from and the viruses and infections can steal energy a little bit and shunt energy away from that, which is why all of the chronic infections do what, give you fatigue.

That was why I like we got all of these names. We could call it whatever we want, kind of. But like, you know, one of the odd names was chronic fatigue syndrome.

And so then you get the sense that fatigue, brain fog, and low energy might be like the defining sort of symptoms of people that were in between my two avatars.

And so maybe I have somebody in the middle that has fairly significant fatigue and low energy and not feeling good. So, I had been doing a lot of nad, I was one of the first people in the country doing any dabs a lot.

And and it turns out if alcohol addiction really and an opioid addiction devastatingly lowers your NAD levels. And so we were doing a lot of, IV therapy for that, and we were doing super high dose, like 1000mg and to a great effect.

And so I started teaching all my friends that were Lyme doctors how to do it, and they were like, oh, hey, by the way, sick Lyme patients get sicker if you give them even small amounts of any of the.

And so then we started to kind of find out about this. And, and I think that's a little bit like if, if there is a assembly line that's kind of broken and not working and stressed, and then you put a whole bunch of energy into that.

It's a broken system. And so if you drive it too hard, those patients don't do well. So you have to have this very potentially gentle approach for the people over here who are real sick.

The people are pretty healthy, can can do anything. They're kind of fine. And the people in the middle, you know, we have to see. So then what we started doing is we started doing.

And this is a great tip for people out there. Will get the subcutaneous and ad and you can get this from compounding pharmacies. Archway is a good one.

And then what we'll do is we'll take an insulin syringe. And so then with the insulin and the way that they make it. And then this is just some math for you.

They make it so that it's 200mg in a milliliter, which means 50 units is 100mg okay. Which would mean that ten units is 20mg. Okay. So then, what we would do is for sick people, we would have them start to do nad, but we would give them like five units, little tiny and tiny tiny amount.

And so they do ten milligrams. There's also some medications that you can take that kind of help reduce risks, recycle nad NM. And as one of them that's good.

And nicotinamide riverside is another good one. And so we started to do these micro micro dosing. And then when I do that I never have any trouble. And so for the sick people I slowly ramp them up.

And a lot of times people once you get people doing this they're doing real low dosing. But certainly it gives them some energy, kind of helps them, and it helps you detox stuff in your liver and feel good.

So then that's an intriguing one. And and so then learning that oh, okay. If I'm doing these tiny dosing, I can get a lot out of a treatment. And now I'm stimulating a detox pathway, stimulating energy and mitochondrial function. So I feel better.

So then that became an intriguing sort of tool. On a peptide front, what we started to realize is, and I think this is interesting, as we age, the the amount of the natural peptides in our body from the thymus gland, for example, go down.

And so then what happens is our, our hormones as we age go down. And so then what happens as we get older we're much more susceptible to infections. And so they have these graphs of all of your peptide levels.

And then particularly immune peptide levels as immune peptide levels in general go down in society and in cultures, then infections tend to rise. And so then taking immune peptides as a sort of almost like you could think inform on replacement is is an intriguing idea just for health.

101 and one interesting way to start there, I think, is with some of the oral, immune peptides, because then you're starting to take some smaller peptides that are going to start to regulate and balance immune function.

Interestingly, you know, they have the oral formulations of caverns and that I really like. I think it's kind of, somewhat analogous to, for example, some of the gland healers that you take in time and, from Chinese medicine, companies like standard process make the standard process.

One will have a diversity of of peptides and, and thymic growth factors. And then we found those that and and as a as a concept for patients with chronic infections and immune problems.

That's an intriguing way to start with. Some of the glandular is because you're you're going to be getting some peptides in there. But then imagine you're adding peptide support that is immune.

And then you're we're we're adding peptides support that as kind of at a bio regulator anti-inflammatory level. But then if you think about this idea of pick my, my three people, all of them probably have a little bit of brain fog now in that.

And I think that a lot of that brain fog is either a because they can't detox that well, and there's some toxicity, but B and I think more likely is, is that there's a challenge and mitochondrial function that challenge and mitochondrial function is, is that viruses and these infections, all these infections kind of puts stress on your mitochondria and they don't work quite as efficiently.

And then when they don't work efficiently, we tend not to feel so well. And so then there's some some interesting peptides that I found to be extremely helpful for, the Lyme and mold community, which are, the, the mitochondrial

peptides.

One of them is human. There's another one called moxie. The might say everybody likes, but it, it has more of an immune reaction. Sometimes people are going to have a histamine reaction to it.

Sometimes people can have a skin reaction to it, the human and not so much. Dosing ranges maybe 2.5mg, at a time for people who are sick. I start I'll start a lot less and kind of incrementally climb them up.

There's one called FTL that, you can take maybe a milligram a day all the way up to 2 or 3 or four milligrams a day. And then how well, how well, and when people kind of get their ability to kind of tweak and manage themselves with these immune peptides, it's they'll get the mitochondria, peptides.

It's energy stimulating, almost like, you know, a cup of coffee. And so then you can kind of manage your way through. And so a lot of times what I'll do is I'll have a protocol where I'll be working with someone, where I'll have them do some subcutaneous and ab Monday, Wednesday, Friday, and then maybe a mitochondrial peptide Tuesday, Thursday. And so then that'll be a week.

And then the next week I'll have them do like they might do human and, and nab. And so they would do that. And then the next week they might do FTL and NAD.

And so then they if they did FTL Monday, Wednesday, Friday they would do any Tuesday Thursday. And so then sometimes I'll have them do the, the human and week and then the FTL week and then another human week and then FTL week.

And so then I'll, And often I'll wait until they've kind of regulated and kind of balance themselves. And they're feeling better with the initial constellation of things that might have been immune peptides and, and regulator peptides.

But so then within that then you begin to see, oh, oh, okay. There's a lot that you can begin to do to kind of Feel better from a cell efficiency and a energy spinning up those mitochondria.

Because what happens is, is if, if, if you have brain fog and then you take mitochondrial peptides, generally that brain fog just totally goes away. And so then now then the journey for me is then finding it's kind of part lifestyle, part medicine, part spiritual, all part kind of, part exploration, finding the, the tools that get you oriented towards optimizing that, that biology and but then as that happens, the there's a moment that comes when you begin to realize and and this this happened for me when I realized, oh, okay, almost any, any problem, then I'll, I'll be able to kind of start to do things and all of a sudden everything will come in at balance and I'll be totally fine.

And so then and I have 6 or 8 ways to do that, you know, because if you imagine, like, let's say we're out of the country, what happens is, let's say I stood up and I whack, and I had myself and I created a big bruise and swelling.

So then that's inflammation. And so but now why is there inflammation that there's inflammation here. Because now then my body is going to release cytokines.

It's going to release inflammatory mediators. And then then what's going to happen is is my blood vessels are going to get leaky. And then blood is going to rush into that area.

And when it rushes into that area, some stem cells are going to come out there. And they're kind of like the happening kind of, regulators of everything, they're that they're the manager.

And so they look and I got, this guy, he just some stuff and he has inflammation. So the first thing that they do is they regulate inflammation. That's what stem cells do.

So they regulate inflammation. And then the way that they do that, it used to be we thought that a stem cell would

just go and like a Seal team six member that could then go in and then convert themselves into some other cell so they could go become a cartilage cell or do whatever they needed to do.

Doctor Kaplan, who's the godfather of stem cells and figured everything out about about mesenchymal stem cells. He said we got to change the name. I'm going to retract the name stem cell from stem cell.

He said it's a signaling cell. Right. Because a stem cell is just a mobile pharmacy that floats around and it comes out here, and then it's just secretes an entire symphony of different growth factors and healing factors that calm that down.

And then next thing you know, I just did that, but then my body just got totally healed out and everything's gonna be 100% fine. Now, stem cells are also doing that in the blood.

So they're regulating inflammation and exosomes, which are stem cell secretions and are also regulating and kind of balancing immune function. When, I was early.

So in my career we were, you know, we're taking people to, other countries. And so there was other and there clinics in other countries that were doing that work and the profound thing that we found is, is that, you know, you would see, you would see some people were really overwhelmed with inflammation.

And then all of a sudden the inflammation was literally just totally gone because the stem cells just are floating around decreasing inflammation. To a lesser extent, we saw that with exosomes.

But then exosomes have almost no side effects because they're they're the end, the end. And an inflammatory aspect of the immune system that to do doing the final healing.

And so then, you know, that had been initially in my for a, an early thing that we did that was once again, both something good on the anti-aging kind of side of things and on the chronic infection side of things.

What I've learned over the years is, is that, if I had only one thing to do, if I could only do one thing, I'd probably put people on by regulators. If I could do two things, I'd I and that's assuming they're going to do the lifestyle.

These but then what happens is, is now kind of in from an overall perspective, what I'm trying to do is, upfront, try to do some testing at a DNA level, at a cellular level, at a, at a, at a biochemistry and, and at a blood level, build a model of what's happening, start to regulate and balance things.

And you have a huge diversity of things, from peptides to supplements to IVs. Evolving into more complex things. But the ozone is stuff like that. And then we that's so effective that that a lot of people that I would have thought in the past, though, they might need to do stem cells.

Those people get better and and and that is because this is a spectrum. And so then if you can shift someone from that sick part of this thing over here to that healthy part, next thing you know, they're in the journey of healing.

And so then, you know, we we have, by a reset international this our sort of international clinics. And we have a real big, clinic that's going to be opening this year, in Tijuana, that, that does the, the, the stem cells and exosomes and it's sort of our, our total approach, along with ozone dialysis and plasma free system, sort of all of those things.

And that that can be sort of a game changer for some people to, to sometimes it's just so overwhelming. They can kind of start to turn the corner on things.

Where we'll still layer antibiotics and other things. And, you know, I was talking to some people about a clinical trial and a new antibiotic that that may be profoundly helpful.

And so send if you're interested in participating in a clinical trial on an antibiotic, that is going to be very

provocative and interesting because it's quite effective.

The, in a liposomal form that gets absorbed, in the small intestine so that it doesn't affect your microbiome in your colon, but can have an a, a real good effect, on the infection.

So we've got an ever evolving kind of amount of things like that that are sort of in the works. And, but then you realize, you know, between here and, and there, there's a lot that you can do.

There's a lot of potential and opportunity to do a lot of those things. And, it's exciting for me because I, I for myself and and for for what? For for what we face, what we face in the clinic.

What we face with our friends and family, what we face. Personally, I have, a great, great, great amount of optimism and, and, you know, we didn't really shine a light on this conversation, but now we're shining a light.

And, you know, I live here. I can't believe that I'm saying it. I live in Silicon Valley. I thought for sure I was going to be, like, on a, farm in the middle of, nowhere, riding a horse and as singing country music all day long.

But, the, the, the since, like 1969, the computer chip in Silicon Valley has doubled every two years. And I have to say that with what's happened in peptides and what's happening in ozone and what's happening in, an IV therapy, and we got a host of sort of very interesting and innovative kind of things on that side of the equation that, and what's happening on the supplement front, the stuff that my friends and the, the things that have that, have are going to come into the Covid space are going to bleed over into Lyme and mold.

And so we're going to have all kinds of very intriguing and interesting modalities. And so then my my statement that I've been making to people and I have kind of forgot about this until just now, I've been saying that every two years, the state of the art and Lyme disease is doubling.

The the knowledge is doubling. And now like what happens is it's continuing to double. And so we're twice as good as we were two years ago. But then that's not even true.

We're we're like ten times better than we were two years ago. And and you know, in this format here we are talking, looking at each other and, and and we couldn't even further of the country.

And this sharing this the the this platform. What what you know what people are doing with the summits. But the doctor Summit is doing is sharing information so broadly and pervasively and that's that, that that network effect is leading to the information doubling at least every two years.

And so then I would be super, optimistic as you listen that there's hope and that, that, that the journey, is going to be one that, you will complete and, and then, and then, something amazing is, is going to happen as a result of that.

What I got from you was a sense of hope and that tomorrow is going to be brighter than today. And when you're sick with Lyme and on your backside, on your back, it's hard to consider that as a possibility.

But talking to you and understanding what you're doing and you're you're right on the frontline of both the research development and the clinical applications, which is a very unique spot to be in.

And, you have the quest to, you know, kind of figure it out. Like, I don't know if you learned chess when you're really young in life and just applied that to life in your practice and the way you look at the world, but you are 5 or 10 moves ahead on the board right now, and that's super inspiring to know that there are practitioners, platforms, people out there that are willing to dedicate their lives as you have to raising people's awareness, education.

That's why you and I are talking today and then putting your money there by creating clinics and platforms and, and I can't even say it's a franchise, but opening up different offices by coastal so that to gather all that information, you're really changing the way.

And that’s super inspiring. Amen man cook, thank you so. Hey everybody it’s Robbie. Best Nurk thanks so much for joining us today. Please share this content with anyone that you think might benefit from it. And we’re looking forward to have you with us tomorrow for another great interview.