Introduction and Nicole Apelianu2019s MS story

Welcome to another episode of the MS and Autoimmune Summit. I'm Doctor Terry Wahls, your host, and our next guest is Doctor Nicole Apelian. Now she is a herbalist biologist, anthropologist, a TV celebrity.

After she was diagnosed with M. S., she really dove deep into learning. What were all the things that she could be doing that would change the trajectory of her life?

And her healing journey. And she's had remarkable success. I am so pleased to have another chance to interview, doctor. Nicole Apelian. You're going to love her story and her really wonderful tips on how we can be using medicinal mushrooms and herbs to support our healing journey.

Welcome, doctor Apelian. Doctor Apelian, I'm so glad to have you again. I love hearing your story, and I'm sure our listeners will love hearing your story.

So if you could take us back to when you were diagnosed and what those early days were like. Oh, yeah. Hi, Terry It's really nice to see you. Well, those early days, as you recall, I.

My story is not that dissimilar to yours. And those early days were really frightening. It was the end of 99, early 2000 when I got diagnosed, and I didn't really I didn't know anything about Ms..

I was very young, I was 30, and I all of a sudden lost my eyesight in my left eye. It happened over a period of few days, and all of a sudden I lost all of my center vision and it turned out it was optic neuritis.

And again, at that time, I had no idea what that was. The internet wasn't really around yet to search, which is probably a good thing at the time. And, I went to a neurologist and got that really scary diagnosis of multiple sclerosis without anything else, with just being told you have M. S..

I did an MRI and I had clear lesions on my brain, so I had a very I guess I was lucky and that I had a very clear case of multiple sclerosis. It wasn't it wasn't going to be anything else. And but they didn't walk for me anything.

They offered me injections. They offered me a lot of Western medication as I as more symptoms progressed and they progressed really quickly for me, I started having tonic spasms.

Really so much pain. The fatigue became overwhelming. A lot of muscle pain. I mean, I couldn't even it got to the point. Within about six months I couldn't even pick up a book because it was too heavy for me.

And I was, you know, a vibrant 30 year old who was exercising and hiking and, you know, the same things I do now. And all of a sudden my life got cut short.

So I felt pretty devastating, though. And the lawsuit at 2000, the, treatment. So we're really very limited. Interferons and copper works. Paxson and I, they put me on Copaxone, and after about two years of being on Western medications and not getting better and in fact, getting significantly worse, to the point where if it was a really good day, I could get around with a cane.

But most days I was bedridden, and if I could move around at night, it was with a wheelchair and I had to quit the job I loved. I was teaching biology at the time and was in a band, and had to just basically put my entire life on hold because I was so sick.

Diet, lifestyle, and the start of herbal healing

And then I started taking, I started becoming allergic to a couple of the medications, including Copaxone, and I started taking medications to counter medications and had all of these other side effects.

And finally, I just thought, I cannot live like this. This is not a way I want to. I want to live. And it is there has to be something else out there.

And as a scientist, as a research scientist, my first thought once, once I was able to get a little bit better and I will say I first went to an are you better physician who helped me change my diet, which was the first key, and helped me change a little bit of my lifestyle and getting back into things like yoga and some light meditation.

I'm not very good at meditation still. I do that by gardening, so there are options out there for people who aren't good at that either. But basically bringing so much more common to my life and a diet, as you know, and have been a pioneer in the diet was really key.

So after switching those, I started to get better enough. I went off all my western medications and was able to really dive into research, academic peer reviewed academic research papers.

And at the time, most of those were out of Asia. There was no research or very little research out of the United States. And all of the research really pointed to the value of medicinal mushrooms for autoimmune illnesses.

And Ms. specifically. So that's when I started my herbal journey. I would done some herbalism before that, but I went really heavy into herbalism then.

And started with down the the herbal journey of medicinal mushrooms, which made that extra step for me possible between diet, lifestyle, not, you know, injecting myself every day and mentally telling myself that I was sick, which is a huge thing with the mind body connection.

You know, you're injecting yourself daily saying, I'm sick, sick, I'm sick. And as we all know, people who get are told they're sick, get sicker, which is not hypochondria.

It's simply the mind body connection. And I'm not saying we can all think ourselves well, but it does make a big difference. In addition to, of course, what we put in our body, which is so key.

Yeah. So why don't we talk about mushrooms? All right. They have they have been life changing for me. As you know, I write a lot about mushrooms. I write a lot about herbalism.

I am an herbalist. And also the way to best extract mushrooms. I've delved deep into research on how do you best get the medicinal properties of mushrooms out of those, and be able to actually incorporate them into your body for use?

And for me, yeah, they have been the turning point. Those and eating a really clear, gluten free and inflammatory diet. And they have sustained me. I mean, here I am 25 years later and have had no new lesions.

I'm healthy and vibrant. I still have M. S., you know, I just say it doesn't have me anymore. As you know, I did the show alone and spent two months, you know, living outdoors.

So that was sort of fun. Let's talk a little sidebar. Yeah. What is alone? The show alone? Because, that is a pretty interesting site adventure that you did.

It is. And, you know, also, for those who don't know, alone is a show on the History Channel. And I always say it's the only real reality show out there.

It is real. And that they take ten people and individually they drop you off in a place, usually in the fall and winter, in a place it's very cold and you are dropped off with six cameras and no producers.

There's no one there with you, you all the filming is done by you and you have to forage hunts, build shelter, fire, water, food, everything. All your madness, all your medical needs.

If you aren't able to sit to help yourself, you get evacuated and you're done. And the goal is to stay out there as long as you can. Totally solo filming yourself every day.

And I thought it was a wonderful experience because all of a sudden here I was. I got to live in nature. But for me, one of the big impetuses for going out and doing alone, one was there were very few women just in 2015 when we first when I did my first season with them, there were no women on survival TV, so that was important to me.

But another big one was, you know, here I had been battling Ms.. And having come through the other side and feeling really good, and it was a real test for me to see how well I do, you know, out in the middle of nowhere by myself, really living outdoors.

No, no one else to rely on. And how will I do, eating all wild foods. And I was able to bring my medicinal mushrooms with me. So that was key. So yeah.

Yes, it was super helpful. But again, my diet out there was incredible. I was eating fish and wild mushrooms and plants. I would gather and limpets then a lot of things from the sea.

So I was eating really well. But that show was a real, testament. And it's actually the first time I came out publicly telling people about my Ms. journey.

And it really hit home for so many people because I had made it, made my way through it. But I hadn't really told people or told my story.

Why medicinal mushrooms matter for MS

And having that show er on the History Channel and having people see me being so vibrant and seeing the photos of me and the story of me back when I was wheelchair bound or bedbound for years, really resonated.

And I had tens of thousands of e-mails of people wanting to know, what did you do? How do you do? You know, what do you do for autoimmune? And Ms.. And that's really when I started writing, writing about my experiences, writing about medicinal mushrooms, writing my books.

I have seven books currently out, and, really delving deep into, again, that peer reviewed academic research or some of my books and my blogs just so that other people could access the information that I was able to find.

And it's sometimes really hard because the internet is a vast, vast place and a lot of it is not correct. And for me, being able to take peer reviewed research and distill it down and give it out to the public in a way that palatable and also just accessible is what I really love is to do.

And again, it was my post-doc that had was aware of your alone episode and said, okay, Carrie, I think you ought to reach out to Doctor Pelion. So that's how we got.

So glad we did. Our story is very similar. We came about things differently, but we got to the same place. It's really incredible. It's super interesting.

I too was diagnosed, at 2000 and started on Copaxone. And in retrospect, a lot of my early symptoms was episode of Dim Vision, that it had 13 years earlier.

So, and, I was diagnosed at age 45, and by age 48, you know, I mean, it's quite wheelchair and certainly struggling. Yeah. Yeah. That was anyone going through that.

I feel for you. It's a rough time. Yeah. It's a rough time. But there's, there's so much that can be done. So, let's talk

about, some of the medicinal mushrooms.

And I want to caution people that, because people know that I, I really like mushrooms, and they want to go out and start mushrooming. And I have to stress to them. Yes.

Be sure of your identification. Yes. Yes or yes. Definitely be sure of your identification. Mushrooms are there are some that are very easy to identify, but there are some that are not.

And if you're not sure, don't eat them. Yes. Because start there. Yeah. But there are ways you can also purchase medicinal mushrooms that have been processed in a good way as well.

If you don't have the time or energy or, you know, want to go out and harvest your own, it is possible. I have ones in my apothecary that are made in a very specific way to access all of the medicinal properties, and I think that's really important.

You know, you hear so much now about and we can go into each type of mushroom I take in a moment. But you do hear so much about mushroom coffee, and that people take their mushrooms that way.

And there's nothing wrong with mushroom coffee, but you're only getting water soluble components when you're taking it in coffee. And so you're missing all the alcohol soluble medicinal components.

And there are a lot of them. don't want to go into too much detail. I don't know how much your audience wants to hear, but, you know, the the polysaccharides and the beta glucan is those sorts of things.

Those those are water soluble, but all of the trigger pins like get a dirk acid and reishi, which is so important for so many things, especially autoimmune stuff that is all alcohol soluble.

So you actually can't access that if you're just taking mushroom coffee. And I think if you're going to take the mushroom, why would you not want to access the full spectrum of medicinal components.

So I do dual extraction methods with water and alcohol. And then I do an additional method called the Fujairah method method, which actually takes the plant cell salts and minerals.

It burns the the mark off the mushroom. After we've taken all of the components out of it, and then the full extraction, and then puts the ash back in the tincture and it, then you're able to get the full spectrum of that mushroom.

And for those who don't know what a tincture is, because maybe you take it in your coffee or you take a mushroom pill, and mushroom pills are great. But if you have gut issues, which a lot of people with autoimmune issues do, and a lot of people that are eating Western diets have gut issues, you're going to have absorption problems, whereas you take a tincture.

I have one here just so people can see it's a liquid extract, the dual extracted tincture and all you do, if you can see here, it's a drop in a dropper and put it in your mouth.

You can put it in water, you can put it in tea. I like just to take it orally because I get maximum absorption, but it's not going all the way to my digestive tract, right?

I can absorb this in my mouth and my throat as it's going down, so I get more of an absorption from a tincture than I would from a mushroom pill. So I really like this format, and I like that triple extraction method as well with doing dual extraction plus this, which iris method?

I think it's, an important thing to mention. And so which mushroom was that? Was that a blend that you just took of that. You know, that was turkey tail mushroom.

I take turkey tail, cordyceps, lion's mane, silky for MSK and reishi mushroom on a daily basis.

Survival show, public story, and sharing research

And I don't blend them in my apothecary because people don't dose them correctly if I sell them as four separate tinctures, because you want to make sure that you're taking 1 or 2 dropper fulls a day.

And I find if I blend, I do have blends that work and that are dosed appropriately for other things. But as far as those four mushroom extracts go, I always worry that people won't take the right amount and this is dosed as a dropper fall.

So I want to make sure that people aren't taking, you know, maybe you won't they won't take four dropper holes of, of a mushroom blend. So you do have to be careful with mushroom blends that you are getting enough of the mushrooms of each of the mushrooms that you want to take to get the maximum effect.

And, would they be taking the dropper full once a day? It depends. For maintenance once a day. It's fine if you're early on twice a day or two dropper fulls a day.

Some people, when they're first starting out, we'll do four, 3 or 4 dropper full the day. But I find I take one if I'm not feeling great or if I feel like I'm catching a cold.

They're also an all anti-viral and or something's coming on. I'll bump it to 2 or 3 dropper fulls a day, but normally I'll just do one for maintenance, you know?

And does this need to be on an empty stomach with food? Does it really matter? It doesn't really matter. I always say, wait about 20 minutes before you drink or eat anything, but it's honestly as long as you're getting it in your body this way, it's not going to.

It's not going to really matter that much. Yeah. Okay. People get very specific about it. And there are most people will say, don't eat or drink 20 minutes after you take your mushroom tinctures, you know?

And then there's people see a lot of mushroom powders out there. Maybe we can have some conversation about the mushroom powders. What are their how are they different than, the tinctures?

Well, and also mushroom tinctures vary because mine are made from fruiting bodies, and a lot of people use mycelium grain. And what you end up getting with a lot.

We've just done a full testing of ours and some others. What you get are a lot of tinctures that are on the market are made with grain. And so what you're getting is very little mushroom in the tincture or the extracts or even the powders, because they're taking the grain that the mycelium is.

And then an fruiting body is made on and they are incorporating that into the tincture itself, which is a large mass. So you're actually getting very little of the mushroom itself and a lot of supplements.

We've had people who've and I don't mean to just plug mine. There are other good companies too, but we're really specific with our method. Didn't have three, you know, on board in our manufacturing place.

And, really the extraction really matters. So there are a lot of companies who have, you know, you're take hours, they work, they go to someone else, they're not working, and they come back to us just because, you know, oh, is that working for the mycelium?

Is that part of the mushroom those growing underground developing body is the mushroom that we all see that, that fruits create the spores and spread, that the mycelium are the big, that work underground, that connect trees and other plants, etc..

I know there are a number of companies that will have packed sawdust or packed oats, and they will grow them, and then they'll grind up the oats or the sawdust and the most exactly to make their powers.

So I assume that there may be slightly different compounds in the mycelium portion of the mushroom than there are in the fruiting body. Would that be good?

Yes, for most mushrooms like reishi, turkey tail, cordyceps, all you really need is the fruiting body. Those are have all of the medicinal compounds, at least for the research that show so far, all the medical professional compounds you need are found in the fruiting body.

The only exception is lion's mane. And we are adding mycelium to our lion's mane. And the reason is, is that for lion's mane, the fruiting body and the mycelium have slightly different concentrations of a couple of compounds called Harrison, Owens and arena things.

And now these are really important because they help with nerve growth factor. Lion's mane is one of the best ones to take for things that have a neurological basis like Ms..

And, Harrison Owens are primarily found in the fruiting body, but not only. And the arena scenes are primarily found in the mycelium, but they are also found in fruiting body but just in a higher concentration.

So the key is can you find mycelium that has been grown either hydroponically or accessed in a way that you are not getting all of that grain and oats and whatever it's grown on sawdust put into the mixture.

And that's what we're working on with our lion's mane tincture, is to make sure that there's none of that in it, but still getting some mycelium. But most of the other ones really just the fruiting body is fine.

Okay. So if you're if you're going to, take mushrooms, looking for tinctures is preferable. Reducing the reliance on powders that are using mycelium and ground up sawdust or ground up grains.

Now, I know a number of the mycelium are grown in oat grain, but I want to point out to everyone, oat also has gluten in them, and you may well cross react to oats if you are gluten sensitive.

Those mushroom powders may be causing an abnormal immune response.

Choosing mushroom extracts and tinctures

For that reason. Great point. Yeah, exactly. Thank you for saying that, Terry. It really is a huge thing that I find that a lot of these things, a lot of products out there simply aren't effective.

Or they had things like ground up oats in them, and people don't even realize because they're not. Why would they? Why would they be aware? It's not something that they advertise, right?

Yeah. Correct. And I'm guessing the mycelium is a much smaller, percentage per weight of the powder than the than the grain. Oh, yeah. Yeah. For most I would say definitely. Yeah.

So if someone was going to be adding these medicinal mushrooms in the four that that you were referencing, Lance made tricky to cordyceps in reishi and you begin taking them a dropper full at a time.

How long would it typically take for people to be aware of any change in their energy? Not the clarity, perhaps their mood? It's a great question and it depends really on the person and their physiology.

And I've found it can go. Sometimes people will feel it and as little as five days I've had customers who say they've they've gotten more clarity in a couple of days of taking it, which is kind of incredible.

I find our autoimmune customers are our best people to relate their stories because they they're the ones that

notice when they go off it, how terrible they feel all of a sudden, and when they're on it, how good they feel.

Because, you know, with autoimmune, we feel things I feel like so quickly we really notice our body and notice changes pretty quickly. At least I do. For the listeners, I want to point out sometimes when we start a supplement, we're like, no, I you know, I'm not really sure that it made a difference.

And so I'll, I'll counsel my followers. Go ahead. Ideally, you write out what are the symptoms that you want to treat. What's your intervention. How long are you gonna give it?

I prefer at least 12 weeks. And after 12 weeks you can say like, well, it's not really doing much, then go ahead and stop. And then sometimes it's when you stop it, you know, like, oh, well, I can tell I'm feeling worse.

So it's the abrupt withdrawal because when things gradually improve, we may not be able to perceive that. But when we abruptly stop and it leaves our system, they're like, yeah, wait a minute, my sleep is worse.

And yeah, it's harder to get along with my spouse and my kids are really irritating me now. So, you know, maybe we occasionally get yells from customers.

Yeah, saying, oh my gosh, I went off and on. Oh, and oh, I did it. Now we have pretty good shipping. But we it's it's it's this desperation you hear. Because they are youth. Exactly.

They went off it and they feel the effects very very quickly. Yeah I notice when I don't take my mushrooms if I know I'm pretty regular because I just have a system that I do every day and it's been so long, it's incorporated into my daily routine.

But sometimes when I'm traveling, I always have them with me, even over, you know, overseas. I'm leaving some day overseas and I will have everything with my whole things with me, my antivirals, all my mushrooms, all my herbs, and, you know, I sometimes will forget for, you know, a day when I'm traveling, which is pretty rare, but I notice it if I do, when I think what is wrong with me?

And I think, oh, I didn't take my shrooms today. Yeah, that's a great point. And you know, when I say some people feel it in as little as a few days or five days, it's true, most people at least to feel autoimmune effects.

And you're talking brain fog or sleep to feel it more quickly. But if you're talking autoimmune issues, they've all of the inflammatory responses and all the things that then cascade, it's going to take you a few weeks or even a couple months.

So the point is to stay on it, try it for like you said, 12 weeks is perfect and then see how you feel when you go off it. It's a great it's a good test.

Maybe have some in the, in the, you know, in the hopper just in case. And and I think it's helpful to write out, I mean, I really like having a little lab notebook, but I've decided I'm going to try this intervention.

And so in this case, I'm going to try these medicinal mushroom tinctures. These are the tinctures I'm going to try and I'll take them for and, you know, write it out however long it is you're going to take them.

Here are the symptoms that I'm going to monitor. And I think, you could be so basic as to rate the symptom 1 to 10, or you could have, do the medical symptoms questionnaire that's a little more structured.

So you get a numeric score. And then you could decide, do you want your family to also rate your symptoms at the same time? But that can be helpful. And then at the end of 12 weeks, you rate your symptoms and your family rates, your symptoms.

And like, okay, there's obvious improvement or not, if there was improvement, stop and then see what happens. And if in fact, you know, you stop it and nothing, you don't feel any worse, then that's fine.

Go on and try another intervention. I really want to encourage all the listeners to be the we call this the principal investigator of your life. Have ideas, have hypotheses that you want to test with, these interventions, with all of these interviews that we're doing, you're going to hear all sorts of hopefully very helpful things to try.

It gets confusing if you try them all at once, because then you will watch what happens.

How to test supplements and track results

The thing that was most helpful. So I'm going to encourage you to to pick one, try that, see how it goes. Then try another one. Try that and see how it goes. And over time by being willing to try things, see how you do, you will hopefully gradually create a self-care routine that is finely tuned to what you need.

Yes, and to reevaluate that every year or so to see what your body's doing. Yeah, I think it's so important. And you're right with your family, you know, I haven't done that with family life.

And so we talk we're very, very, very communicative family. So but as far as things like mood go, you know, you might not notice a big change whereas your family might.

So and a lot of these, a lot of the mushrooms do work on cognition. Teague mood in addition to all the neuroprotective effects and the immunomodulatory effects and the fact they're all anti-viral, which is great for all the winter especially, or for travel.

So you might your family might notice those particular ones more than you would yourself. Yeah. And it's I think it's really quite true that we tend to not be very self-aware in terms of our anxiety.

And in terms of, perhaps a little, our mood, our sense of joy or, irritation. What we may notice is that, you know, my my spouse is really annoyed, or my son or my daughter is really annoying, or my coworkers are really annoying.

So they're annoying me as opposed to being software to realize that I'm feeling more irritable. Right. Maybe. Maybe it's not them. If it's everybody, it's probably you.

So this is where it can be so super helpful for them to have a chance to rate what they think about, your mood, your energy, your mental clarity. But that can be very, very helpful.

Yeah. Yeah. Excellent. Such a good point. Sorry. Yeah. And I always do say start with diet, start with diet, add a medicinal mushroom. So and then what do you think are the key things that nutritional you would like to have. People begin nutritionally a well eating an anti-inflammatory diet.

I mean, I think getting, you know, an IPD test, a test that you can be what you react to. I'd love to know your opinion on that, actually. And how you how you feel about those.

But for me, it really was able to you're like, keen on gluten. Which is an absolute no no for me. And it's also in so many terrible things, things that are just bad for you.

I find by not eating gluten, which I can't have it all. I ate it a summer and a half ago and it was very bad. Yeah, it's, Yeah, but it's also relieves you from eating so many nasty things.

Can't have it. Depends on the family. Sometimes, I have to work with friends who just work in the ads. Add more non-starchy vegetables, more berries. In have plenty of protein. And the other thing that we can talk about is the research continues to grow, that the more sugar sweetened beverages, the more flour based breads, cereals, pasta, the, higher the rates of diabetes, heart disease, the cancers, anxiety, depression, autoimmunity.

So if you just take those out, that would be very positive. And we could not do food sensitivity testing. In my clinics at the day when I first started doing this.

So we just put people on a gluten free, dairy free diet, more vegetables, and if they couldn't go gluten free, dairy free, I just said, okay, reduce the sugar, reduce the white flour based foods, eat more vegetables.

And when you're ready, take the gluten and dairy out and see how it goes. And some folks were ready immediately to take the gluten dairy out, and some had to do it more gradually.

Right. And that's a great point because some people, you know, really can make the shift if they're just I think if you're at the end of your rope, it's easier to make the shift.

And maybe it's just that's my that was my experience at least. But for some people, they need to do it step by step. And that's you know, that's okay. Start with one thing.

Take it out, try the next thing, because that's going to make you succeed in the long run. That's the best strategy. And I do always say except for gluten which I can't do, any of you know, I always say 80, 20, you know, 80% of the time eat really well.

And I find if I say 80, 20 people are 95, five pretty much across the board.

Anti-inflammatory nutrition and family-friendly changes

But if you say 100% of the time, do it this way, it's it's my fail or it's it's not because you eat a cookie and then you eat the whole dart box, right?

Whereas you're like, oh, that was part of my fdfdfdfdfdfdff that was part of my percentage. Right? And then you just stop at the one cookie and still feel good about yourself and go back to eating really healthfully.

So you want to, have a conversation with your family, negotiate with your family. What are you going to increase in your diet? What you're going to reduce in your diet?

And at what pace you're going to make these changes? What I think is a huge struggle is if we're going to have one meal that we're going to make, for me, a different meal that I'll make for you, a different meal to make for my children, that is not sustainable. No, we don't do that.

Most of us in our house are gluten free, which helps kids or not. They're mostly grown. We only only have one left at home. But you know, we just make the meals gluten free and he's so used to it he doesn't even notice.

Now he wants to make something for a snack. It's up to him. But so we don't shift the meal for the listeners. Just have a conversation with your family. What?

What are you going to add? What are you going to reduce? What as a family, you're okay with eliminating and make these changes at a pace that you and your family can manage?

Yeah. Okay. Well, Doctor Polian, this of course, is just, so wonderful chatting and catching up. Could you tell our listeners how to find you, perhaps a couple of the books that you have?

Great. I have two websites, my information website, where I have a blog and all my books and things like that is Nicole a Pelion APL. I am.com, and that's Nicole, and I see Oli and then my apothecary is Nicole's apothecary.

All one word Nicole. Yes. Apothecary.com. And that's where you'll find all of my dual extracted, tinctures and a number of other tinctures as well. My latest things I have out my newest book I have here.

It's the Forgotten Home Apothecary. It just came out this fall. It's been in the top five on Amazon for the past couple of months, which is exciting. So people are really excited about herbal medicine, which is great.

We sell it off Amazon. You can get a link from my website, which I like better, but up to you, if you want to get it

there, make sure you're getting the the one that has, you know, 900 plus reviews or there are a lot of fakes out there.

I just want to say that we've been having a lot of trouble with fraud because it's a popular book. And the other one in the top 100 on Amazon right now, I have seven books.

Books, apothecary, and where to find Nicole Apelian

They're all on my website, but I'll just mention these two is the Holistic Guide to Wellness. And this is 45 Herbal Protocols for Common Ailments. Ms. is in here. Other auto amino acids are in here.

Everything from heart disease to depression book. And this is all based and peer reviewed academic research. There's a QR code at the end which links which would have been another book of references.

We just couldn't because it was too much. And there are easy to follow charts. And like we were saying, biting off one piece of a time. There's a pyramid that tells you what do you start with?

What's the most important? And then you can do things one chunk at a time. But again, it's all based in peer reviewed academic research, no matter what some of the crazy ads that are out there say, people say crazy things about this book, like it's being banned.

And anyway, don't listen to those. They're not real. It's a it's based on science. And then I have a new e-course out on herbal medicine and anyone on wilderness survival skills and all on my website.

So I'm really excited about those because I believe, you know, nature, connection, getting out in nature and being outside is also a huge part of healing.

This is wonderful. Thank you so much for the call. Thank you so much, Terry. It's so good to see you.