

EPISODE 254

[INTRODUCTION]

[00:00:19] AVH: Hey everybody, thank you for being here. You are listening to Paleo Magazine Radio, I'm your host Ashleigh VanHouten. Today, I am interviewing the author of a book that I really enjoyed reading, this wasn't one of those, I got to do this for work situations, it was really entertaining. I highly recommend anyone who has an interest in ancestral health, anthropology, or just food and culture should read it, it's called *100 Million Years of Food* and it's a discussion on the ancestral diet as it relates to health, but the author doesn't just write like a text book about how you should eat depending on where you came from.

He traveled all over the world to places like Vietnam and Kenya and even rural Nova Scotia which just happens to be the province in Canada where I was born, and they have some surprisingly exotic traditional dishes there. He's travelling all over the world, experiencing traditional foods and culture and just getting into some very interesting and sometimes kind of dangerous situations while he tries new things and learns about food.

Stephen Le is a biological anthropologist and in the book, he talks a lot about, like the history and also the health benefits and maybe lack thereof, of anything ranging from insects to different fruits, to meat, to animal milk, to spicy food and beyond and listen, if you're a long time paleo eater and you think that maybe there's nothing in this book that you kind of haven't heard before, you will be surprised because besides his own personal forays into jungles and hidden hole in the wall restaurants all over the world, which again goes back to, it's a super entertaining book.

He tackles topics like the widely held belief even among meat eaters that vegetables are the healthiest part of your diet when in fact, in many cases, that's not true due to their own internal defense mechanisms, our inability to combat them, he talks about how, even if we settle on our own ideal ancestral diet, the foods that our ancestors ate thousands of years ago don't even really exist in their original form anymore and how we can deal with that challenge.

That's really just kind of the tip off the iceberg but I just enjoyed this book because it's entertaining and it's educational and it kind of just makes you think about the world and your food in a new way. Which is always what I'm hoping to accomplish with this podcast. Definitely recommend you pick that up, *100 Million Years of Food*, and of course, listen to this podcast interview after I talk to you for a hot minute about our show sponsor, Bonafide Provisions.

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[INTERVIEW]

[0:04:00.4] AVH: Stephen, thank you so much for taking the time to chat with me today, I'm really excited.

[0:04:03.8] SL: Yes, I'm excited as well.

[0:04:06.6] AVH: I want to ask you some questions, unfortunately I was hoping I could get to you in person because it says here in your bio on the back of the book that we're going to talk

about today that you were a visiting professor, the department of biology at the University of Ottawa and I am actually in Ottawa so I was hoping to connect with you in person but it seems like you are actually across the country now, is that right?

[0:04:25.8] SL: Yeah, that's right. I bailed out of Ottawa at the end of August. I'm sorry about that, but here I am.

[0:04:30.2] AVH: You got out at the right time, didn't you?

[0:04:31.7] SL: You're staying in snow and I'm sitting in the rain.

[0:04:34.2] AVH: Exactly, yeah. Well, in Canada, you're picking one or the other I suppose. But it was really cool because this book, and I have to say, *100 Million Years of Food*, I really enjoyed reading this book and I have to say honestly that as someone who interviews people and reads books and does a lot of research in this area of whether it's ancestral health and nutrition and paleo eating and diet in general. I sometimes can be a little bit jaded and think you know, when I begin a book, is this going to tell me something that I haven't already read a million different times or in a million different ways.

I was really entertained and riveted, and I learned a lot from this book. I really appreciate that in the way you wrote it was in a way that was very accessible to people, you were really telling stories as well as giving information. Yeah, it was really cool and you referenced so many things in Canada that I as a Canadian, I can relate to and I was excited about them from Nova Scotia and you talk about sort of fishing and the Maritimes, and you mentioned Bearbrook farm which is an incredible farm in Ottawa where I actually do a lot of my protein shopping. That was really cool.

[0:05:41.2] SL: Great, yeah.

[0:05:43.0] AVH: It was really cool to read about your adventures as well as the things you learned on your adventure. I guess just to kind of start before I get into some of the more technical questions, you do so much travel to exotic places where it seemed like you're relying on local friends and people, maybe people that aren't even friends yet to kind of help you

navigate these places. Is that something that kind of comes naturally to you, is that something you learned as you went that that's the only way you can kind of make it when you're traveling to places that are really foreign?

[0:06:13.8] SL: Yeah, I think it's a skill and a habit that I developed over years of traveling and I think over time my comfort zone has increased just to give you an example, when I was hitchhiking through Malaysia, people told me that I shouldn't do that, it will be very dangerous and so on. But you know, invariably within half an hour, somebody would stop by and give me a ride and then more often than not, these people will be able to give me hints on where I should grab my next meal to find my next local fair. It worked out really well for me to sort of blend in with the locals as much as possible.

[0:06:49.5] AVH: Why do you think that we have this sort of fear of foreign places like that when it seems like in places outside of North America, people are much more willing to notice a person struggling and help them. You know, I think about being in Canada or United States and if I'm kind of standing on a corner looking around lost, I don't really want to have to rely on someone coming by to ask me if I'm okay because that's not always going to happen, you know?

Whereas in other places, you can almost rely on somebody coming up to help you at some point. Why do you think we have that kind of disconnect between what we think about the outside world and what the reality of it is.

[0:07:26.2] SL: I think part of the problem, a lot of blame has been laid on the media and in particular in the 1970s, there were some well-publicized cases of people getting kidnapped and killed when they were hitchhiking. I think from that time onward, some people trace the gradual decline in trust.

This has taken us a little bit further afield but one of the topics that I have done a lot of research on and speaking about is trust and basically, from the end of World War Two, the Western countries have experienced the decline in trust across the board. One of the theories is about the media. My take on it, one I think is an interesting aspect is that people have actually been living longer lives.

In some ways, our lives have got a lot safer in the last couple of decades and paradoxically, that will make us more cautious because if you have a long-term investment, you're a lot more worried about keeping that investment around. If you think what somebody else who doesn't go out there who is going to be leaving tomorrow, there are going to be a lot more carefree and more risk taking.

I think yeah, it's true that unfortunately, across the Western countries, we've become a lot more risk averse and that means that we're more afraid of exploring local foreign culture.

[0:08:38.7] AVH: Yeah, that's interesting. I guess there's almost, there's also a piece of, you know, the more information we have access to and the more overwhelming that can get, the less we almost trust the things that people are telling us or the things that we're seeing, there's that kind of issue too but I guess really, it's interesting that you do research on trust considering how much you have to use that in your daily travels.

I mean, you're telling these stories about jumping on a stranger's bike and they're taking you out to some restaurant or place or to meet someone else and how much you kind of had to rely on, I don't know, general good heartedness of people that you barely knew which was, I just thought it was a really interesting part of the book in the story that I didn't expect to find, it was really cool.

[0:09:23.5] SL: That's a huge amount of fun to be able to do that, you realize really that underneath, people are all the same around the world. So many times— I've met people that looked really scary on the outside and then they turn out to be the sweetest people on earth. Just to give you another quick example, when I was in Japan and hitchhiking, there's some people that pulled over that looked like gangsters, these young toughs, they were driving some souped up sports car.

When I was in their car, they treated me so differentially, I was really touched by their kindness.

[0:09:52.8] AVH: Yeah, I guess what you're saying too, it's more fun this way and also you have some really good stories to tell like you would be a great person to have at a dinner party

because you got some pretty cool stories. I guess people will have to read the book to get to some of them that I got to read but can you— we're going to talk about food I promise, but I'd love for you to— if you can kind of pull this off the top of your head of all the traveling that you've done, what is maybe one of the most memorable meals you've ever had and why it was the most memorable meal you've had?

[0:10:24.2] SL: I would say, easily, that would have been in Saigon, in Vietnam, when I found a bar, either you have specialized in insects and other odd creatures and that was the first time I ever had the chance to eat a live insect and it was a palm weevil larvae and you had to dip it in fish sauce and then hold it by the head so you wouldn't get— wouldn't bite you on the tongue.

I had a lot of hesitation in eating it, I'd had never eaten anything alive in this respect. I had had octopus in Korea where they flash boil it and then they cut off the tentacles and the tentacles are still moving around as you're trying to chew them down, that's one thing. Actually, the living insect was a whole different experience, it was difficult for me and another girl who was at the same dinner, same group, she was hyperventilating as she was trying to get herself to eat it. It's a huge psychological block.

Once you get past that, it turns out to be an amazing source of fresh omega three fatty acids among other things, right? It's basically sushi at its freshest.

[0:11:29.4] AVH: Right, I remember reading about that actually in the book and thinking like I need to check my badassness because I'm somebody who is very open to eating insects and I have some experience eating insects but that story kind of took it to like a whole other level. I was thinking like, is that something I could do and I'd like to think that it is but I mean, yeah, that's definitely a step up.

Is there anything. I'm thinking about all these shows that I love to watch, like you know, Andrew Zimmern and Anthony Bourdain and these guys who go all over the world and have this incredible cultural experiences and eat things that no one in North America ever has access to eating. Was there anything during all of your travels that was just plain and simple, disgusting or that you really didn't enjoy and you had to maybe for politeness reasons had to kind of get

through, but was there something like really memorably tough for you to do I guess? From the living insects?

[0:12:21.7] SL: I try to keep a really open mind to fermented shark.

[0:12:25.1] AVH: Yeah, that's the Iceland delicacy, yeah. I've heard lots of bad things, scary things about that one.

[0:12:30.5] SL: I bought a whole jug off this stuff and I thought I would be able to finish it off at the airport because I didn't have much money at that time and that was supposed to be my main source of protein for my trip home and I just couldn't eat past I think two cubes of this stuff. It was like eating something out of a toilet bowl, I don't understand how people could do it. I understand you have to have a lot of vodka for it to go down.

It's probably an acquired taste on top of that, but I just couldn't do it.

[0:12:55.0] AVH: Wow, okay, all right. Well, that does seem to mirror what a lot of very adventurous people with really developed palates seem to think about that particular dish. I think you're not alone in that but okay, cool. All right, I could ask you questions like this all day but I do have some other questions that maybe more applicable to the people who are listening to this podcast, you talk about a lot of different things in terms of the history of humans around the world and the things that we ate and why we ate them and how our bodies are either evolving or changing or not. To manage the different kinds of foods that we have access to.

I just kind of want to get into some things that maybe I haven't read about or knew about before this book and one, which was— happened early on in the book that I wanted to talk about. Is this idea of spicy food and some of us are just drawn to it and obviously certain cultures eat a lot of spicy food, some cultures have no tolerance or desire for it at all, but also, the idea again from sort of the primal perspective that it seems like human beings are the only animals that willingly, purposefully eat spicy.

To the point of being painful food. Can you talk about that a little bit?

[0:14:09.7] SL: I guess as a qualifier, I should mention that there are anecdotes about other mammals being able to eat spicy food. Apparently, dogs in Mexico hang around villages where there's a lot of chili being dumped into the garbage, they are able to eat spicy food and also I've read about an experiment where they had Chimpanzees and they exposed them to chili and after a while, apparently, at least one of the chimpanzees needed to have some chili in his or her food. I think It's not just humans but so far, the humans are the best documented cases of eating spicy food.

I guess the question is, why is it that, do you want me to talk about why is it that we acquire this taste for spicy food? Yeah, okay. The best accepted theory right now is that spiciness helps to eliminate or reduce the bacterial load in our food, and in really hot tropical countries, they have a problem with spoilage of meat and spiciness seems to deter the bacteria from multiplying in the food.

That's one aspect of it but that doesn't really explain, I don't think it's a full explanation because it still brings us to the problem, how do people end up getting to like that food in the first place? We can understand that it's safer perhaps to eat that food because it's spicy. Everybody from an early age tries to avoid eating spicy food.

Another theory behind this is that in some ways, pain can be pleasurable and this is an idea I think goes to the psychologist Paul Rosen. He suggested that things like, if someone gets hit by a lightning bolt then for the first few seconds, they're in utter terror. But then after that, they quickly recover and then they feel elated after that.

The same experience that occurs at a roller coaster at a horror movie. Things that we really dislike, we also tend to like soon afterward, another example is really sad films. For some reason, a woman in particular feel quite good after watching a really sad— averse experiences tend to create pleasure afterward and it's been proposed that spicy food falls into the same category.

[0:16:18.0] AVH: Yeah, that's so interesting. It seems like a lot of the reason we continue to eat spicy food is more like psychological or sociological than biological requirement, right? Because even people who in cultures that did not grow up eating spicy food for food safety reasons, it's

like we almost do it as a competitive or something where we're proving how tough we are and how much pain we can endure while we're eating these foods.

I mean, there's like competitions about how you can, if you can stomach these ridiculously dangerously spicy foods, right? Yet we all kind of still do it and are interested in watching other people do it.

[0:17:00.3] SL: Yeah, I lived in South Korea for a couple of years and my first year there, I couldn't eat the spicy food, I was really unhappy there with the food and I had to pour water into my soup to water it down to make it edible, but by the second year, I had to have kimchi in my fridge and kimchi is this really spicy fermented cabbage dish that it's all over Korea. I found out through experience that we can quickly acquire this as well, within a one year, we can acquire this taste, even for someone like myself who had really low tolerance for spicy food.

After living in Korea, I got addicted to the taste off chili. Yeah, it's interesting fact.

[0:17:39.6] AVH: One of the things that I kept kind of coming up against as I was reading your book is that a lot of the general sort of health concept that so many of us grow up with that we take for granted is being like black and white, this is a healthy thing to do. Doesn't seem to be so black and white after all, maybe not as much conclusive evidence in favor of some of these things as we thought.

One example of this being the benefit of, eat your vegetables, eat a lot of vegetables, eat mostly vegetables, vegetables are across the board healthy and the best thing that we should be eating and we should be eating mostly vegetables. It seems like in the something that you've kind of touched on, the book, that sentiment isn't always accurate across the board and in fact, in some cases, there is more evidence of their harm, things like phytonutrients and stuff that makes them really hard to digest. Can you—

I guess, start kind of high level on that and talk about why and how plants can sometimes be problematic but maybe also why we are sort of under this assumption that just eating a mostly plant based vegetable based diet is the healthiest for everyone when that's not necessarily the case.

[0:18:48.4] SL: Yeah, that's a huge topic. Let me take a few angles on this. The first thing that we could observe is that plants are doing their best to avoid being eaten, just like animals. The way that animals avoid being eaten is to fly away or to attack anybody who tries to eat them. Plants can't move away from potential predators and so what they do, they produce all sorts of toxins.

This explains why I think in traditional science societies, people did their best to avoid eating plants. Whenever they had a choice, they would prefer to eat something with claws and feathers because they all have to do, it's just catch the animal and then cook it and they would be virtually assured that they would not die. Now, there's a few exceptions of poisonous mammals and fish, right? But they are very rare, you have to look really hard to find a mammal or some sort of a mammal that you can die from eating.

There are insects that are more dangerous of course and there's nasty diseases that can be spread among, let's say fish from eating seafood but by and large, if you catch an animal that's trying to get away from you then it's probably a good meal if you can get your hands on it. Now, plants have all sorts of toxins, right? We do our best, we have done our best in traditional diets to neutralize all these toxins and so we do things like we boil, we steam, we grind, we bake and so on. There's all sorts of ways of reducing these toxins but even then, if you have a whole bunch of vegetables and you do your best to process it.

It still doesn't feel the same as having a barbequed portion of meat, right? You don't get that same satisfying feeling, that's because I think not only are you missing some of the essential fatty acids but you're also— your body is having to deal with all sorts of toxins and through thousands of years of reading, we've been able to reduce the level of these toxins to tolerable levels, right? Now you look at tomatoes or red peppers or cucumbers and so on, they look nothing like the wild plants and so they've lost a lot of those original toxins. Now we're able to eat them but by doing that, we've also reduced some of their potential benefit. I think in traditional societies, people recognize the value of plants as medicine. They were widely used as to cure people of various diseases.

By the same token, I don't think anyone would suggest that you should open up your medicine cabinet and start dumping out pills and start eating them as a healthy meal, right? Which is essentially what we do when we go to a salad bar and try to create a healthy meal by selecting things that have different colors. I think that's a very haphazard way of approaching the concept of a health meal.

By contrast, the traditional societies, people figure it out how to combine things in various ways that tasted really well and that we're not hazardous to people's health.

[0:21:24.9] AVH: What are some ways as average people going to the grocery store. I mean, I guess that you kind of eluded to this that a lot of these plants now have been bred to be less problematic and also less healthy. But what are some ways for people who do want to get like a wide range of sort of you know, nutrients and antioxidants and all the good things that you can get from plants, how do we kind of approach doing that in a smart way?

[0:21:51.1] SL: Yeah, I think Michael Pollan had a great line here, he said, eat whatever your great grandmother ate, I think that was the line. When you look at the way that traditional diets processed vegetables, you know? They often steam them and boil them. Nowadays, nutritionist tend to look down on those methods because they say we're losing a lot of the nutritional benefits.

But, our ancestors were able to live quite healthy lives and they're able to enjoy their meals. I think there's nothing wrong with things like boiling or baking our vegetables and so on, especially if you do it in ways that are consistent with the traditional diet. To give you a specific example. Bitter melon is very common in Southeast Asia.

When people eat it there, what they do is they typically fry it or they boil it and then you add some meat and some mushrooms inside of it and it make as pretty good meal, it's still quite bitter but it tastes good and there's been suggestions that have helped to address problems with type 2 diabetes because it will lower your blood sugar level.

There's a case that I read about where there was a doctor in India who figured that he would go to the extreme and he made a juice out of bitter melon and he drank it every day until he died

and it took about a month, I think for him to die, and his wife vomited blood from this juice concoction. It shows you that these kind of vegetables, they've got a lot of toxins and they can be wonderful compliments to a meal but they have to be treated with care.

[0:23:18.2] AVH: I guess this goes back to another one of those sayings, that maybe we can pay attention to, which is everything in moderation and maybe there can be too much of a good thing and you know, you can overdo even healthy things like vegetables. One thing that you talk about in the book and I don't want to put you on the spot here but it's just something that really stuck out to me because I thought it was just really interesting and for people who maybe do some foraging and stuff on their own or kind of sourcing their own plants and vegetables and mushrooms and things like that.

You talk about the different categories of plants and what they mean and what they kind of do. There's like, the enemies, doppelgangers, sorcerers, werewolves. Can you talk about that a little bit because I just thought it was really interesting?

[0:24:01.6] SL: Sure, yeah. I don't have the categories in front of me but the idea is that there are some plants that we absolutely avoid because they're extremely toxic and so ricin is an example. This toxin that's just a little bit can kill a person. In those cases, we've done our best to recognize these plants and to avoid them whenever we see it.

Then, there's other plants where we can be harmed if we ingest these plants in great quantities but we recognize that and so we tend to take these in smaller quantities. The soy bean would be an example of that where this is a plant that has phytoestrogens and the purpose of those phytoestrogens is to deter animals like sheep from eating them.

If a browser eats too many of these phytoestrogens, then the female can become sterile. It's a good way for the plant avoid being eaten. On the other hand, people have learned in Asia that if you cook these in a certain way, then they can produce tofu and so on which are pretty good meals. To be treated with caution but we can make good meals out of them and then the other extreme are plants where we, I would say case like corn and rice where we still have to be a little bit cautious because you can suffer great harm from just eating these things exclusively.

But, if you treat them with care then they can become staples of a diet and in this case, we can eat a lot of these things and get a lot of benefit. Like in the case of rice, if you completely remove the wheat germ and you end up with the white rice inside then if you have a diet exclusively white rice then you can suffer a disease, beriberi.

Same thing with corn, if you eat the corn, just corn, then you can end up with another kind of nutritional deficiency, pellagra. These were great afflictions hundreds of years ago when poor people had to exist either on white rice or corn. We've learned that traditionally, people knew how to get around those problems by processing it correctly.

[0:25:54.6] AVH: Generally too, across all sort of cultures and even in places where maybe food variability wasn't quite as high, people were still getting a wider variety off types of food generally than we are eating today, is that right?

[0:26:10.7] SL: Depends on the particular location but yeah, for example, in places in Europe, a few hundred years ago where people were very impoverished and they had very little variety in the diet, right? The upper class would have had a lot more fresh meats available to them for example. They wouldn't have to deal with those kinds of diseases. And hunter-gatherers in general had a lot more variety in their diet prior to the agriculture revolution.

The agricultural revolution 12,000 years ago is the point when the human diet starts to narrow and a lot of the nutritional breadth was lost. In place, we got a calorie supply that was a lot more reliable and so the human population grew after the agriculture revolution.

[0:26:52.9] AVH: Yeah, it's such an interesting concept because I think a lot of us, we think, you know, we go to the grocery store and of course we have more variability than any other time in history because there's 80 different types of cereals and there's a million different types of lunch meat and things like that but when we're talking about actual food.

I guess when you look at the ingredients of a lot of these processed options, they all boil down to the same few ingredients anyway, right? Which is corn syrup and corn-based kind of sugars and stuff like that. We actually don't have as much variety and then of course, you talk too about how we've moved away from a lot of, generally speaking, we've moved away from game meat

and different parts of the animal and different parts of the animal and different animals and we're all just kind of eating the same two or three or whatever animals or fish that are sort of widely available across North America instead of some of the more nutrient dense and I think, more delicious animals. But it's kind of fallen out of favor.

[0:27:51.1] SL: Like raccoon.

[0:27:52.8] AVH: I've never eaten raccoon. I feel like living in Canada, that's something I probably should get on but I mean, I've had bear, I've had moose, I've had elk and all kinds of fun things and I find them, the more I'm exposed to different kinds of animals, the more I understand sort of what real wild living animals are supposed to taste like and then that's in stark contrast to the sort of factory farmed chicken and beef and stuff that you can get, you know, in grocery stores but I don't know, maybe if more people tried it and kind of kept their minds open to it, they'll find that they're actually, not only more healthy but more delicious in a lot of cases.

[0:28:30.6] SL: Yeah, I was really delighted when a trapper gave me— well, I received a hind leg from a beaver and it tasted wonderful. I know it's the national icon and so on but—

[0:28:42.7] AVH: There's a lot of them though, right? I mean, it's probably fine.

[0:28:46.2] SL: They're considered to be pets right? In a lot of parts of Canada for the damage they do. They make great meals and they're a lot more sustainable than taking animals that are not really well adapted to the Canadian climate. I think— I saw the same issue in Australia where kangaroos are also fantastically abundant and rich in all sorts of nutrients but why Aussies are really averse to eating kangaroo because it's in their code of arms, right? And the Aborigines would love to see kangaroo meat become more acceptable in their diet. It would make a lot more sense, I think.

[0:29:18.1] AVH: Yeah, it is actually kind of ironic that I have had kangaroo and I have never had beaver or raccoon for that matter. So that is kind of funny. I'll add it to my list now. Now I have some 2019 goals which I am pretty excited about. Another thing that you talked about that again was like flying in the face of I guess conventional wisdom is getting into the talk about

calories and the idea that, where obesity is hugely on the rise, and it is exploding and the reason why there is so many of us that are fat now is because we're just eating more and moving less and that's it, end of story.

We need to exercise more and eat less calories but that again is a more complicated story and if you look at traditional hunter-gatherers, they maybe aren't actually moving as much or too much more than the average person living in the city, and that it may actually be less about how much we're moving and about how much we are not moving. Can you get into that a little bit?

[0:30:14.9] SL: Yeah, so as you mentioned the two traditional ways of dealing with excess weight is to either eat less or to exercise a lot more, and so what happens there is that when people eat less that works for a few years but then eventually their will breaks down and they have to start to eat again or their metabolism slows down and the weight ends up creeping back up again anyway.

The second approach is to hit the gym more often and again, people get a gym membership and that works for a while but then they either lose interest in the gym and their will power breaks down or again, their metabolism compensates and they end up increasing their weight again or they hurt themselves in the gym and they end up with even more serious problem where they can't even move around because of your gym addiction.

So what the people did traditionally was they didn't go to the gym and they didn't have to worry about how much they ate. They just moved around a lot every day and they didn't have sedentary lives sitting in front of a desk or computer. So I don't think people, science have nailed down the exact hormonal pathways if this works but the saying is that sitting is the new smoking and so the idea here is that yeah, if we don't get around, if we don't move around enough during the day then we end up reducing our life span.

So probably the key here is not to go on a diet or to eat or even to crash the gym but to just get up and move around as much as you can and I understand that this is very difficult for a lot of us because we have to work at a computer or we have to be at the desk but I think there is also new inventions that help us deal with this problem. So for example, desk treadmills are becoming more popular now and you could walk and work at your desk all day.

The less extreme measure is to work at a standing desk and that is what I do in lieu of being able to wander around the fields all day looking for my food.

[0:32:05.1] AVH: Right, that is actually what I am literally doing right now. I am talking to you at my standup desk and I am fidgeting around which comes very naturally to me anyway but also turns out to be pretty healthy. So that makes me happy but I think it is an important distinction to make that it is not just— there is a difference between not moving enough and long periods of being sedentary because people think like, “Okay I have heard this 10,000 steps a day thing. So if I get that I am good and that’s all that matters”.

So they can work really hard for an hour a day or go for this really vigorous walk and then do nothing the rest of the day and you think that is the way because our brains are very goal oriented and will go, “Okay this is the answer. This is the thing. This is the marker we have to hit and that’s it” and it’s easier to get our heads around and it is also sexier to think like, “Okay, well I get this hard workout in. I worked hard, I deserve a break now. I deserve to sit around for four hours because I did some really hard work out”.

It is a lot harder to get our heads around you will be healthier and fitter and look better. You don’t have to go to the gym, you don’t really have to restrict your calories a lot, you just have to keep your body moving because that’s this sort of nebulous concept for a lot of people. It is not as easy to write down in your journal or your fitness tracker, right?

[0:33:18.6] SL: Yeah and I think the cruel aspect of exercise too that it ramps up our appetite and so yeah—

[0:33:25.0] AVH: Yeah, I know that.

[0:33:25.8] SL: How many people have been in agony because they’ve worked out and they had a great work out and now they just want to splurge on a Sunday or something like that and then you’re back to square one.

[0:33:34.0] AVH: You're right, yeah. Okay, so next stop I have— I can keep coming with the questions here because I am making so many notes when I was reading this book because there were so many interesting things I wanted to ask you about, that's why I love this job, because I get to read this book and instead of just having these questions and thinking, "Man I wish I could talk to the author" I get to do that so I am very excited.

But one of the other topics that I wanted you to touch on because of course with a healthy lifestyle it is not just about food. There is a lot of lifestyle factors as we just eluded to with movement and things like that but contribute to health, and another thing is sunshine and climate and the area geographically on earth where you live. And there was a chapter where you were talking about people in colder darker places maybe having more food allergies or skin issues and other issues.

Perhaps related to vitamin D deficiency and also imbalances of Omegas, and is that something you can touch on a little bit, I guess besides just telling us we should all move to Florida or something?

[0:34:37.1] SL: Well, the blue zones that were documented by Dan Buettner. He talks about these places around the world where people live the longest and those are all in places that they happen to have a Mediterranean-like climate, and so this is California, this is southern Italy, this is Greece and this is Okinawa. So yeah, these places they all have the wonderful benefit of being sunny most of the year round and not much rain.

So one of the benefits of all the sunlight is Vitamin D and we know that it has lots of linkages to our immune system and what people have been doing in recent times, we're also I think aware now vitamin D is a health issue, so people have been trying to compensate by taking more vitamin D pills and the problem with that is that the body has no way of regulating vitamin D that's taken orally, the body has no way of knowing if that is the correct amount.

But if you take vitamin D through the skin then the body will naturally adjust if there is too much sun exposure. So you won't die from a vitamin D overdose if you sit outside all day. On the other hand, of course, is there are the legitimate fears of skin cancer and so people are really confused about that and at the same day there is the companies that are pushing really hard for

us to wear a lot of sunscreen all day and so I think if you look at your skin type, you can guess at what kind of climate your ancestors have had to deal with.

If you have very light skin then that means it probably came from a climate like northern Europe where there was sun that was only available for a very short window in the year, and that is when people are outside than we're outside absorbing a lot of vitamin D and conversely, people who tan very easily or have very dark skin, then their ancestors would have been in tropical climates and they would have been outside all day. So I think as much as possible, try to mimic that kind of pattern.

And get the appropriate amount of sun exposure set up to try to find you vitamin D through pills or sun tanning salon because that can lead to other kinds of risk.

[0:36:44.9] AVH: So all of us in Canada are screwed basically unless we're very, very fair skinned. I mean I guess what is the answer though for those of us who do live in places and even within Canada there are places that are never— I mean you have been to Nova Scotia, there are places that are never hardly ever sunny. So what do people do if they can't get or do their quarterly trip to the Caribbean or they are scared of tanning beds for whatever reason?

That is why people are supplementing with vitamin D pills. So what is the option? Do we do our best with the vitamin D supplements and just try to be smart about dosing and pay attention? Is there a way to tell if we are overdoing it or under doing it? I guess for some of us the reality is we're not going to get the right amount of vitamin D from the sun because of where we live.

[0:37:35.8] SL: Yeah, I guess that in the next couple of decades what's going to happen is that people are going to expose themselves to more sunlight. I think people will cut back on the sunscreen and they're going to wear less clothing to protect themselves from harmful UV rays but the question is the balance and doctors are not going to help us very much in this regard because doctors by the nature of their profession, they have to be risk averse.

So they are always going to be over cautious. There are few doctors like Michael Holick in Boston who advocate exposing yourself to more natural sunlight, but he's a lone voice. A lot of doctors are really afraid of going that route but I am pretty sure in the next couple of decades,

the recommendation are going to become more moderate in terms of protecting ourselves from natural sunlight and more and more people are just going to live the way that the first nations did before Europeans came.

And that's just to be outside all day and to get the natural exposure and yeah, there's going to be the concerns about the skin cancer. So we do a bit more research but I think by and large, the results are going to support a lifestyle where we're outside more every day.

[0:38:42.3] AVH: Yeah, I love that and I think that again, as with so many of these things when it comes to health, it is about using common sense and understanding your own body. I mean in the last few years I have definitely started to lean that way in terms of sunscreen use. I don't think I even own any sunscreen anymore but I am not going to go on a vacation to Mexico in the middle of January and immediately go outside with no clothes on for 12 hours straight.

There are ways that you can get your body acclimatized and you can be smart about it and when I am in Canada, I can go and sit outside all afternoon and I tan pretty easily and I know when I am feeling good. I know when I have had enough. I know when I should go inside and take a break and I think it is just being smart about it but I literally in the past three or four years cannot use sunscreen really ever and I have not had a burn because I am more mindful and paying attention.

And when you are eating healthy and all of those things, those things help too. Yeah, I guess bottom line Canadians and people in the States too that aren't in the sunny spots we just need to be very opportunistic when it comes to our sunshine exposure.

[0:39:47.9] SL: Yeah and there's been some suggestions that is intermittent pattern of exposure where people work in an office all week, nine to five and then on the weekend they become sunshine warriors and then they go out and they bake themselves for those two days in the weekend and then they go back to the office. That kind of pattern of exposure might be more harmful in terms of getting dangerous skin cancers but I think that more research needs to be done.

But anyways, that is the cruel aspect is that it is hard for us. A lot of us to get outside when we are supposed to be working, and what do we even say to our bosses, but I think the trend will be that people either work outside more or there is going to be some new sun lamps that are going to have modern levels of UV at first but gradually those devices will become stronger and stronger as we learned the limits of our skin.

[0:40:35.0] AVH: Right. Well it makes sense that the weekend warrior sunshine is the same as the exercise part, right? It is like, you don't exercise or move and you are sitting all day long all week and then you go on a 12-hour hike on Saturday and then you go to the gym for four hours on Sunday and then you're crippled the rest of the week while you are sitting in your desk and we want to just get things done and do things to extremes, but I guess ultimately, it really is about finding those times during the day and the week.

And incorporating it into your lifestyle and making it a priority. So most of us— I mean some of us are that busy I suppose, but most of us can probably find 10 minutes during the day to step outside really quickly and go for a quick walk and move our bodies and look up at the sun for a minute and we can do that if we pay more attention to it and make it a priority in our lives I think.

[0:41:25.9] SL: Yeah and in a lot of these traditional societies, people did their best to stay out of the sun, right? Because they only have to go out because they have to and they had to work in the fields and when they did, they covered themselves up with hats and a lot of long clothing as much as they can because they know the effects of the overexposure, and if you come down from a northern country like Canada and you hit those tropics.

Then everybody is walking around in shorts and t-shirts and they think we're nuts right? Because we are overexposing ourselves, so they recognize the dangers but they are in a different situation because they are overexposed and then they're trying to reduce their exposure to sunlight and we have the opposite one.

[0:41:58.4] AVH: Right, yeah. There is another question that was related to the paleo diet that I thought was really interesting, and because one of the big conversations that the paleo community is having very specifically is now the concept of either moderate reasonable carb intake versus no carbs, and do we need carbs and carbs are evil, et cetera, but there was a

piece there that you're talking about starch and genes required to produce this amylase that helps you break down starch in the mouth.

And that some people have them and some don't or some have less and that this may have a connection to obesity and to our ability to break down certain foods. Can you talk about that because I thought that was really interesting?

[0:42:42.5] SL: Yes, so it could be that there is a genetic predisposition in some people to accumulate more weight as a result of eating starches and it is based on the ability to break down starch and there probably will be more. This is just the tip of the iceberg, I think. There is so much more other kinds of enzymes that can be explored. So I think what we're talking yeah, we might learn that there's this varying disposition to become obese.

On the other hand, we do know that obesity doesn't really exist. It didn't exist in traditional society. So aside from the fact that we have varying genetic predisposition to obesity, the lifestyle is I think the overriding factor and if you can find basically a way to live, to mimic a traditional lifestyle, then you don't have to worry about having a genetic predisposition to obesity. So I think that is the lesson that I learned.

[0:43:32.4] AVH: I thought it would be really interesting to, near the end of the book when you were talking to a couple of different nutrition experts, one of them of course being Mark Sisson whom I think our listeners are all very familiar with because he is a big primal paleo eating guru, but you spoke to Mark and you spoke to someone who is very pro I guess animal proteins and fats and really high fat, and then you spoke to someone who was really I guess more like vegan vegetarian, vegetable-based.

And so basically the conversation is still that there are so many different ways to approach health and it's going to probably look different for different people depending again on where your ancestors were from and where they lived and how they ate and you talk at the back of the book about some sort of key points, some key overarching things that anybody can start to pay attention to and take into account when they are trying to improve their lifestyle and their approach to eating in a way that more aligns with how their body is supposed to work.

And I was hoping that you could – without giving away too much of the book, but just talking a little bit about what some of these key points are. There's things that we already touched on like move a lot and then something that probably everyone's heard which is to maybe not drink too much all the time, which is not to be a buzz kill but we all know that too much booze is problematic, but there are a couple other parts to this too. Can you talk about that a little bit?

[0:44:59.5] SL: I think one of the take away points is that we haven't touched on anything on parasites. So part of the explanation for the recent rise in food allergies has been the hygiene hypothesis where we're getting less exposure to parasites these days. Here again, we haven't been running into another kind of dilemma, right? I am starting to recognize that we need to expose ourselves to more parasites but then if you go to the other extreme then you can end up dying from some sort of infection.

And so what is the right balance? I think everyone is going to have to look for this but if you— so the issue of washing hands I think is going to come up more and more in the future and so I have read about one proponent of the hygiene hypothesis coming up from he or she but basically, they would wash their hands without soap as they were speaking, but again, this would mean it will cause public health officials to go nuts, right? Because they really want to reduce the risk of infectious disease being spread around.

But there we go, we have this problem with food allergies propping up. So there is going to be a lot of interesting conversations about this in the future and everyone is going to have to choose a different way to go forward, to the extreme where people avoid getting vaccinations entirely and so I think that's dangerous in many ways to society, and so we are going to have a conversation about how do we expose ourselves to adequate levels of parasites.

And another point that we haven't discussed very briefly was the idea of plants and that they should be treated with respect. You know they're not our saviors and if we eat them in appropriate ways and process them carefully then they can be wonderful compliments to a meal but yeah, they are not magic bullets for us.

[0:46:40.2] AVH: One of the last big questions I am going to ask you before I'd let you go here so I don't keep you all day, but it is a conversation that has come up on this podcast many times

and in the conversations I am having a lot, and I thought that you proposed a different way of looking at it and I have seen before and this is the idea, the concept of living, eating, training, whatever for performance and vitality versus longevity.

And it seems to be in a lot of cases that to have a lifestyle that is conducive to one of those things, it's going to be almost at odds with the other. So often times I am talking to trainers, nutritionist who are like, well if you want to be big and strong and perform really well at your sport when you're younger you need to train really hard, you need to eat a lot of protein and you need to do X, Y, Z and that may not be so good for your longevity, but if that is what you're focused on now.

And then conversely, okay you want to live to be a 150? Well you need to cut your calories in half and you need to stop working out so hard and be way less stressed out and so anyways, it seems like you got to pick one or the other, but one of the things that you touched on that I thought was interesting was the idea of whether we are talking about more calories, eating more meat and things like that that you almost want to do less of it when you're younger and then up it as you get older to support strength and longevity which most people would see it as the opposite way.

So you think when you are growing and young and you are this big robust person you've got to eat more and eat more meat and then you slow down as you grow older and you were saying maybe the opposite could be true.

[0:48:15.2] SL: Right, one of the really interesting research results in the last couple of years in nutrition has been finding that across a lot of different animal species humans included reducing the amount of protein that we eat extends life span and one way of thinking and conceptualizing this is that evolution doesn't really care how long an animal lives. The key is how many copies of that animal are given to the next generation.

So if an animal eats a lot of protein then it can be in some ways healthier and stronger and it can reproduce more quickly but that doesn't mean that they ask to stay around longer and conversely, if an animal doesn't get enough protein then this nature's second strategy then is to

try to conserve resources until the moment when the animal can finally reproduce. In humans, people who eat a lot of red meat, girls will reach the age of menstruation earlier.

And so this is an example of reproduction occurring at an earlier stage and conversely if girls have less eating red meat and then their age of menstruation is later and then they'll end up giving birth later. I mean there's more talking about hypothetical hunter-gatherer kind of society. So I think one of the really intriguing ideas in here if we analyze that is if we cut back on the amount of red meat, the amount of protein that we eat at an earlier point in life then we might be able to extend the lifespan of our children.

Conversely when people get to an older age, meat is easily digestible. It's got a lot of nutrients and so it makes sense at that point to be increasing the amount of meat that we have and there's been one small study to suggest that this is okay. So older people who ate more red meat, eat more protein end up living longer. So we're still in the preliminary stages of these kind of studies but I think overall the message in the future will probably tell our kids that they should be eating less meat.

And tell their elders that they should be eating more meat. The tradeoff of that is that if you eat less and get less protein then you may end up with a shorter stature and probably it is a big deal in our society as people get a lot of status from being tall but I think we may recognize later on there is going to be help draw backs from having too tall the height and increased rates of certain kinds of cancers associated with taller stature.

So I think this is probably the trend for the future too, for societies to scale down in terms of height and think more about the long-term consequences of eating protein at an early stage in life.

[0:50:46.2] AVH: That is really interesting. I mean as someone who is 5'4, I feel like I am already doing okay because I am just a little bit shorter than average so I am good to go. Okay, so then if younger people, if we want to maybe be a bit more mindful about how much meat, how much protein we're taking in but also we now know that maybe filling ourselves up with a lot of vegetables all the time could also possibly have its drawbacks. What is left, what are we supposed to be eating?

[0:51:15.9] SL: Yeah, so if you are coming from a European background and it's something like the Mediterranean diet, it is easy to access. We are all familiar with the kind of food that people eat in southern Italy or Greece or France. There's lots of sea food, there is some protein, there is a lot of Olive oil and some vegetables and you top it off with some red wine and some cheese and it tastes pretty good, right?

That being said, people in the Mediterranean region as soon as they got more meat, they started cutting back on the olive oil and they added more meat and their life spans were affected accordingly. So I think if you look to the traditional diet, you will see that they always find ways of substituting for meat and they make sure that their meals tasted really good. So they have fish sauce or tomatoes and other sources of umami and they make their meals good without having a lot of protein in it.

[0:52:06.8] AVH: Yeah, I mean Mediterranean diet sounds pretty darn good most of the time but it is interesting, you know you mentioned about too that even as babies, we all naturally gravitate towards meat. Like if you cut off some delicious steak and then some carrots on a plate for a toddler, guess what they're going to go for first which I guess makes sense because again in the sort of instinctive biological way, we are more concerned with growing big and strong and being able to procreate than we are with being able to live until we're 90 so it makes sense, yeah.

Okay, all right it is good to know. It is a little late for me now because I am passed the point of when I was young what I could eat already and I have already crushed enough protein for most people but okay. We'll move on with the knowledge that we have now, it's good. The final question that I have for you today is now that you are our guest you can tell us what you have on your plate in terms of what you are working on.

Or what you are researching, or what is coming up next for you, are you writing another book but also, since you have written this book and all of the travels that you have done and adventures you've had and research you have done and things that you have learned, when you aren't travelling around the world and having these amazing experiences and where you are in rainy Canada and you are teaching and things like that, how has your lifestyle or your

approach to eating and health changed since you have learned all the things that you have learned?

[0:53:30.6] SL: Yeah, growing up in Canada I had a complex where I really didn't want anything to do with my Vietnamese background and I avoided any food that had fish sauce and I just wanted to eat cereal with a lot of sugar and milk and toast and jam in the morning but after spending a lot of time in the tropics and southeast Asia and I am quite happy with my wife to cook a bowl of noodles and to have a little bit of fish or some protein in there and some vegetables.

And now my son still prefers to eat Canadian as much he can and you know he thinks we are crazy but I think after reading this and doing a research for this book, I am a lot more comfortable with eating a traditional diet whether it be southeast Asian or Mediterranean. So that's been a big shift and in terms of practically speaking, it can be hard to source a lot of these ingredients and so you have to be creative. We visit— we are living in Victoria but we have to visit Vancouver to sometimes find our ingredients.

And my wife and I have taken up crab fishing and we were thinking of making a shrimp trap at some point so we can get some fresh omega threes and I think we are lucky to have in North America to have access to these kind of fresh wildlife and we just have to be creative and then now look back to your past for inspiration, but it doesn't have to be dogma, right? No one says that if you didn't grow up with lentils and you can't eat that in your everyday diet. I think we can substitute traditional cuisines.

We are always constantly being innovated and there were works of art and so I think that process is still going on today. We still got to mix and match and find things that work with plants and animals that were locally available and look to the past for inspiration.

[0:55:10.9] AVH: I love that. I think that is a great place to end off, although I will say we could probably have a whole second podcast just about your crab fishing hobby that you have recently taken up, because that sounds very fun and interesting and super Canadian and a great, great topic maybe for next time but Stephen thank you so much for taking the time. Thank you for writing this book. That was incredibly entertaining and illuminating.

And is there somewhere that people can go online or where they can find your book or find out more about you?

[0:55:40.5] SL: Yeah, sure. You can find the book I think at any of the major online sites. Amazon carries it and so does Chapters and so on.

[0:55:47.6] AVH: Awesome. Great, Stephen thank you so much for your time and hopefully we'll do this again sometime soon.

[0:55:52.3] SL: It was a pleasure.

[0:55:53.2] AVH: All right, take care.

[END OF INTERVIEW]

[0:55:59.1] AVH: That's it for today. I hope you enjoyed the podcast. If you did, please leave me a nice iTunes rating and review and remember, if you fill up the form that's in the show notes for this podcast, you can win a cookbook. So take a minute and do that for yourself, that would be great and don't forget to check out also Paleo Magazine's website because there is lots of exclusive content on there. There are recipes, there's articles, they do a free giveaway every week of cookbooks or treats or different things and you don't have to sign your life away.

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[OUTRO]

[0:56:47.8] AV: The intro music for Paleo Magazine Radio is a song called Stronger performed by Alter Ego and I hope you love it.

[END]