

Clean Up Your Mouth! Saliva, Gums & Kissing Bad Bacteria Goodbye – Trina Felber with Dave Asprey – #866

Dave Asprey:

Today, we're going to talk about something that you probably didn't think about, which is what's going on in your mouth and your gut microbiome are really, really connected. You've been hearing me talk for 10 years about how to fix your gut bacteria so you can lose a 100 pounds the way I did, so your immune system and your brain will work better. But we never really think that your gut starts in your mouth. And I've got an expert today, a registered nurse, a BSN, MSN, and CRNA. Trina, what are those?

Trina Felber:

Registered nurse is a diploma. I originally was a diploma nurse, went back and got my master's or my bachelor's degree in nursing, and then got my master's degree in anesthesia.

Dave:

Awesome. So I should have actually Googled what all those things are. But you've been on the show before though, and you're my resident expert in making my mouth and my teeth look great. See, they're so good. And you convince me that my long-term use of peroxide was something I should curb back. Although I still like a little bit every now and then just for getting rid of some of the stuff I don't want growing in my mouth. But using your remineralization Dirty Mouth Toothpowder has really made a difference and you taught me a lot about stuff. So I wanted to have you back on to talk about what you're doing, the latest stuff from Primal Life Organics, and you've got toothbrush and LED, things that make your gums healthier and all kinds of cool stuff, so let's talk about saliva and spit. Sound fun?

Trina:

I'm excited. Yeah, absolutely. I love your audience. You guys are ready to create change and you're dedicated to health. And after being at the Biohacking Conference again, it was so amazing to interact one-on-one with everyone. Saliva is really important. I also want to touch on, when I re-listened to our podcast from about a year ago, the one thing that we didn't elaborate on, that I think we really need to, is gum recession, receding gums. And can you regrow gums? Because I get a lot of questions about that, especially from the demographic of 30, 40, and beyond. And there's a lot of good information out there about gum disease, but what about your gum tissue once it starts to recede, what can we do about that?

Dave:

So gum secession is like what fluorine is about to do?

Trina:

What was that?

Dave:

Wait, did I say that out loud? Oh, I'm sorry. Wrong topic. Oh my goodness.

Trina:

We can go that direction.

Dave:

No, we're talking about our mouths. It turns out the receding gums are a major issue, and not always, if you're over 30. In my 20s, I used to go to the dentist four times a year, because I had so much plaque and my gums were really messed up. And it turns out well eating stupid amounts of kale and raw spinach and having oxalic acid issues and toxic mold, which makes all that worse, will cause you to do weird stuff in your mouth with plaque. So getting my gums fixed was really important, and there's genetic reasons, and there's a lot of people who even have surgery to put their gums back.

And so there's the bacterial stuff and the inflammatory and autoimmune stuff that I was dealing with, and then there's other causes that happen over time. And I want to be super clear, so you were on maybe around up so 300, we talked about skin, and then about a year ago, we talked about achieve orgasm with a dirty mouth, which is by the way the maybe second best title for a podcast ever. And so, I'd like to come back with you and talk about these different topics, and specifically gums is worth its own episode because it was a problem in my life, and I think it precedes a huge number of other problems that we're only really learning about now. Why are you into gums at this point?

Trina:

A lot of reasons, because gingivitis can be developing in your gum tissue long before you're aware of it. By the time the dentist tells you that your gums are pulling away from your tooth, before they even noticed that is an issue and tell you that it's a problem, it could have been going on for a couple years. Here's the key, it's 100% preventable. And if you search that, even on the ADA, gum disease and cavities are 100% preventable. They're also treatable. But a lot of times we get to the point where it's so bad that the only treatments we know that are available are what the dentist can do in the office. And then that increases your cost and your pain level, because you've gotten so far that they haven't been treated and they're just getting worse and worse and worse.

So, saliva is [inaudible 00:05:06], and we started talking about saliva or you wanted to talk about that, which is great because saliva is a secretion no one's talking about. And it's one of, if not the most important secretion in your body, because it does so many things, including, we touched on this last time, nitric oxide production. And nitric oxide production, if you have an imbalance in the microbiome inside your mouth and inside your gut, so this is how they're really interconnected, if there's an imbalance between either one of those, nitric oxide declines and your body can't produce nitric oxide. Nitric oxide is a vasodilator, it's related to internal health, it's anti-inflammatory, it creates better sleep, better brain function, so many things created when you have a good supply of nitric oxide.

If your oral health is not up to par and then the microbiome, if your saliva is not being produced the way it should, you're dehydrated, some medications or supplements can lower your saliva production, and your gut isn't healthy with the right microbiome, that could actually lead to cardiovascular disease as well as Alzheimer's been linked. There's actually studies that show a decrease in nitric oxide is also related to or can impede neurological degeneration, which is Alzheimer's and other things as well.

Dave:

Here's what I'm absolutely certain of from looking at the studies, Trina. Alzheimer's disease is not caused by bad bacteria in your mouth, but it is almost certainly made worse and may be sparked by bad bacteria in your mouth. There's such a strong relationship there that when you look at *The End of Alzheimer's*, the book and the interview I did with Dale Bredesen, and a guy we very greatly respect, we do know that there's an auto-immune component, and the fact that it starts up here is something that no one really thinks about. We're so focused on our poop that we forgot our saliva.

I also know from years ago, and I don't think I mentioned this last time, but if I did forgive me if I'm repeating myself, I used to make my own mouthwash because I'm like, "I don't want fluoride and scope and weird stuff they put in those," this is, man, what are they back then? This would have been in the late 90s. So I'm like, "All right, I'll use vodka, no problem." So I would take vodka and some water and some xylitol and mint extract or whatever, and I'd switch with that stuff. I wouldn't do it before I would go driving, because you might have the wrong breath, but I would get the driest eyes ever because it would trigger that. And this is actually a documented thing.

And then there actually is a difference with erectile function, if you do that every single night, because of the nitric oxide thing. So who would have thought that sterilizing your mouth at least with those compounds would have that effect? And so you're explaining some of the science and at the time, I'm like, "Maybe I don't like dry eyes," and I didn't know it was related to erectile stuff. So, there you go.

Trina:

Yes, it's related. Your microbiome nitric oxide is all related to a lot of system, including infertility in both men and women. It's been proven that it causes preterm labor. And it's been linked with all inflammatory diseases, like you said, whether it's the root cause of it or a contributor because of other factors. But it causes the liver, when you have the wrong bacteria inside the mouth, there's a lot of things that come into play and it causes the liver to release or produce C-reactive proteins. And the C-reactive proteins or CRP is an indicator of an inflammatory process that's going on.

And if you have other things happening, your dental health can definitely make things worse, be the cause. No one really knows, but what we do know is that if you have good oral health, there's a good possibility that you will keep everything else, either stable or healthy.

Dave:

If you're a longtime listener, if you've read one of my books, if you're in the Upgrade Collective, by the way, hello, Upgrade Collective live studio audience, thank you guys for being here, I've been saying, look, there are three lab tests that you absolutely need to do. And there's many others I recommend, like vitamin D is a good one, but that's surprisingly not one of the three, because you should just take your vitamin D and it's better to tune the amount you take there.

What I'm talking about though is, inflammatory markers. If your diet's working, you go on The Bulletproof Diet and you're worried, "Oh no, maybe there's cholesterol or the same stuff humans have been eating forever that makes our hormones," maybe it's bad or anything else, you look at homocysteine C-reactive protein, which you just mentioned, and then the Lp-PLA 2, which is a sign of vascular health. So if you have inflammation of the arteries, you would know. If you have inflammation anywhere, you'd know it. What we don't know is what percentage of inflammation or even what percentage of CRP is coming from oral health versus, I have some kind of a thing in my gut, I have an injury in my body or something growing somewhere. Do you know, if you were to guess even, how much of that inflammatory marker is coming from our mouths?

Trina:

I don't know if there's any way of measuring that, to be honest with you, because I don't know that there's any difference between what's being produced from inflammatory process inside versus inside your mouth. I know, and what's really interesting when we were talking about nitric oxide, fluoride, I don't like to talk a lot about fluoride because there's a lot that's out there, but I just came across a study that really blew my mind as far as fluoride and nitric oxide. Nitric oxide is so beneficial in the mouth and fluoride has really no place inside the mouth as far as I'm concerned. But in the presence of fluoride,

nitric oxide will react with fluoride to create fluorine, chlorine, and bromine to form nitrosyl halides that are toxic or harmful. I thought that was really interesting. Have you heard of that before?

Dave:

I have heard of it and there's so much bad stuff that happens. Anytime you have nitric oxide, it's kind of the hero, the way you're talking about it, the way most health influencers, and frankly doctors, talk about it. They will basically say, "Nitric oxide, healthy arteries, sex," nailed it, right?

Trina:

Right. Oh, that's it.

Dave:

Good.

Trina:

Yeah.

Dave:

But there are three kinds of nitric oxide. And then you can sort out how functional is your functional medicine practitioner? And then you say, "Okay, there's the inducible nitric oxide," which is something that you can turn on or off, which surprisingly that's the bad one, because of the pathway you just described. It turns that on, and you don't want nitrosamines floating around and you don't want to peroxynitrite in particular. And if you take hydrogen gas, for instance, that can help to stop that type of pernicious nitric oxide.

But the two good kinds, the kind that you're hacking by fixing your mouth with the stuff that you're making and the stuff you're talking about, there's endothelial, or eNOS, nitric oxide. That's the stuff for hard-ons and well, whatever the female equivalent of hard-ons are. All the words I know for them aren't that polite. I know [inaudible 00:13:27], is that it?

Trina:

Clitoral-

Dave:

Well, it's engorgement actually.

Trina:

Engorgement, that's what I was looking for.

Dave:

But you need blood flow for things to be the way they're ... I'm not going to say what one of the Upgrade Collective guys said, but it's hilarious. The female equivalent of a kickstand in the morning. Anyhow, both sexes need enough of that for things to work down there. How's that for sounding like I'm 5,000 years old.

The issue though is there's also eNOS or neural NOS, and that's something that you need as well for brain function. So it's funny that they say, "Oh, just randomly throughout take some beetroot." Well, it turns out beet will raise inducible way more than the other. So nitric oxide also is dependent on your NOS1, NOS2 and NOS3 genes. So it's super wacky when you get into it. But what I do know is that no matter what genetic expression you have, if you trash your oral microbiome the way that I did, it's going to have a negative effect on the good NOSes. And I don't think it's going to have any beneficial effect on lowering the bad NOS. I also know that taking supplements designed to raise NOS probably won't work either at all or as well if your oral bacteria aren't there. So that's not optional if you want to be a good biohacker.

Trina:

Right. And you don't want to waste money because those supplements aren't cheap either.

Dave:

We're going to talk about something else that raises nitric oxide that is not a bacteria that you can put it in your mouth.

Trina:

Okay. Tell me.

Dave:

Do you know what it is?

Trina:

Yeah.

Dave:

You know what it is?

Trina:

I probably do.

Dave:

It's red.

Trina:

Oh yes. Oh my gosh.

Dave:

Everyone's waiting with bated breath on our audience here. Is it red licorice?

Trina:

It's not red licorice. It's not red licorice. Hold on. Can I do the visual? Hold on.

Dave:

Sure.

Trina:

Hold on.

Dave:

Oh wow, we've got a visual, of course if you're listening in your car.

Trina:

Hold on. There we go. Wait, wait for it. Wait for it.

Dave:

I hear a beep. It might be red light. So Primal Life Organics company makes, I'd call a bite guard, I don't know exactly what to call it.

Trina:

A mouthpiece.

Dave:

A mouthpiece, there you go. You stick it in. It's not really a guard which you leave in for a long time. You stick it in your mouth and it uses red light to treat the teeth and gums. What does red light do for nitric oxide?

Trina:

Well, it will, first of all, red light therapy is going to help with the condition of your gums, it's going to improve the overall environment inside your mouth, it's going to help with the right environment to grow the right bacteria that in the longterm is going to help with nitric oxide production.

And then it's also going to help with, your saliva is going to be able to function even better, as we know that saliva plays a big role in nitric oxide production, the breakdown of or digestion, which starts inside the mouth and that contains the enzymes, also contains the minerals for your teeth, and it's also alkaline to some degree. It's actually neutral. But it's supposed to neutralize acids inside your mouth. So red light therapy actually penetrates your gum tissue and will increase blood flow and reduce inflammation of the gum tissue.

Dave:

It also speeds collagen synthesis, which they're made out of, and it increases nitric oxide, which is really cool. And if you do, particularly the super high-powered, we have a new clinical grade, something you'd put on your head or on a specific part of the body from true light, you do that, you can actually measure differences in nitric oxide. And if you take a smaller LED device and you put it on your gums, you'll probably, on a saliva test, I would bet you'd be able to do it.

But if you guys don't believe me, take one of the panels, and then maybe put it over your reproductive area and see what the difference is even the next morning. You can locally increase nitric oxide. It's very easy if you're a guy and you're like, "Wow, that was a powerful morning." Well, this is the

effect of local red light on an area. And local red light on your gums isn't going to give you a gum on, but it has that same local strong effect. And I really noticed the difference. And if, I don't have bleeding gums anymore, but for much of my life, it was just I always bleed. And this though they're tighter for lack of a better word. So it's a noticeable effect I think on multiple pathways.

Trina:

Did you say gum on?

Dave:

Isn't that a word?

Trina:

I think that's going to be the title for this.

Dave:

Pamela made that up, she's the one who told me.

Trina:

I love it. I love it. Yes, your junctions of your cells or the tissue junctions, the cell junctions in your gum tissue, I like props, so I have a bunch of props that you guys can't see down here. So this is really pretty beautiful, healthy gums. It's like a coral pink, the more red that it gets, the more it's going to start to pull away and recede. And that's when you have some, what I call leaky gum syndrome. It's when you don't have a gum on, it's when you have a gum off. And this is when the gum comes off the root of the tooth. You start to get exposure here. What we're talking about with red light therapy, what's really cool that we haven't mentioned, which I'm sure everyone understands this with the skin, is that it doesn't just affect the outer layer, it actually penetrates into the tissue. So where there's damage, it goes deeper than what you see.

And depending on the thickness of your gums, the inflammation, it can actually penetrate into the pockets of the gum tissue, possibly even towards the bone. And your bone needs collagen production. It also is really important in keeping your teeth stable. Peritonitis or periodontitis, which is the next step of gingivitis. When you have gingivitis and you don't take care of it, it leads to the inflammation deeper, which basically shows that the bone is affected. You can see on this side where the bone is very high, it's supporting the root of the tooth, but as the disease progresses, there's less and less security of that tooth because the bone keeps distracting.

So the cool thing about red light, not just is it going to increase the blood flow and the nitric oxide, but it's also going to penetrate deeper into the pockets of the gums, but even possibly between the teeth where it might be becoming, there might be becoming space between there, or even if there's not space, because red light can penetrate, it could penetrate into those spaces that you can't really get to. Flossing does a great job, but it doesn't get deeper into the tissue.

Dave:

It's one of those things where my, I tell my kids, "Look, brush your teeth already." And they say, "I don't want to. I forgot to floss," all that kind of stuff. I never, I always had adequate brush your teeth at least twice a day and all that sort of stuff, I can't say that I flossed every day. But no one ever told me why, all the downstream things. And all I really care about teaching people on this show is, what are the highest

return on investment things you can do that keep you from being as trashed as I was as a young person, or keep you from being as trashed as most of us get to be as we age. And I absolutely underestimated the importance of the very beginning of the digestive tract. And it's like, oh, if it tastes good, you can do it. And maybe that's not quite how it ought to be.

So, now you're recommending that we add red light to our mouth with the mouthpiece that you guys make. And I think there is great sciences for why that should work. I've seen that it works when I use it. How often though, do people need to use this? Does it change as you age? What's the minimum effective dose of this?

Trina:

With red light, you can't really overdo it. It's not going to cause any damage, it's not going to cause any breakdown. I usually, on an average week, with the red light, now, we didn't talk about blue light yet, but there is a setting on here that you could do both red and blue light. And when you're doing both red and blue light together, and we can talk a little bit about what blue light does, but we recommend, it's a 15-minute treatment, which is what this is set for, so you would do a 15-minute treatment. When you first start the program, we want you to do it five days a week for four weeks, mainly because you want to get that base. You want to reset the microbiome. You want to change the environment. You want to increase the blood flow. You want to detox the tissues and get those nutrients as well as those minerals to, it's not just the gums, but the teeth. You want that whole environment.

We're also talking about your palate, your hard palate, your soft palate, that's all going to be affected as well. Your tongue, the light doesn't just stop at your gum tissue, all of the soft tissues in the front and around your mouth are also going to be affected. Your mouth is extremely dirty. It's exposed to everything, including pollution, the air that we breathe, everything. So your mouth tissues are really, really dirty. And the benefit of using the device with the gel that we created as peroxide free, it's got clay in it, the reason I put clay in there is because clay binds, it's an ionic bond to toxins. And when it creates that bond, it pulls that toxin out and then you spit it out. It doesn't allow it to go back in. It's such a strong bond. So using clay with the light is going to deep cleanse the tissues of your mouth and allow healing to happen faster and allow the red light to work better deeper.

So it's about 15-minute treatment for the first month, for five days a week. And then after that, it's really up to the person that's using it. I recommend at least one treatment a week, possibly two, depending on where you are and what you're doing. You can use the red light alone and a five-minute treatment if you're just doing red light and you want to do it as a bonus. Or once you're done with the first month, you can throw the red light in for five minutes and get great benefit, because a red light five-minute treatment is really good.

I do recommend using an oil when you do this. And I recommend, with Primal Life Organics I made up a gum serum which is an olive oil base with some of the essential oils, and the reason I recommend that is because while you've got increased blood flow with the red light, you've got some nutrients that the olive oil is going to be soothing. And then you also have the essential oils that are going to help with the cleansing of the gum tissue as well as the reducing of inflammation and increasing blood flow as well.

Dave:

So you would brush your teeth using the clay that you guys make, and it's got other stuff in it as well. And that I really did notice a substantial difference. So you're doing that, and then sometimes when you have five minutes and you're doing your hair or whatever, you put on the gum serum, then you put in

the light set on red. And tell me what the blue light does again? Blue light can have topical effects, we know for sure. And what is it doing that's different?

Trina:

I was going to try and shut it off and turn it to blue. Well, I'm doing that. Yeah, so blue light, there it goes, this is the blue light. So this is all blue and then there's also a setting, I'll switch it. This is the blue and red. It comes up-

Dave:

Well, so you pretty much always use both together, I think?

Trina:

Most people do, but it just depends. So on average, most people will do both together. If you have receding gums or really have some gum issues, infection, inflammation, if you're someone that gets sores in your gums, if you're on chemotherapy or cancer treatments or any medications that cause your gums to be compromised, the red light is actually a bonus. Just to do it red light only for five minutes when you have a second. And really you can do it when you're checking your email, you can do it when you're making dinner, when you're driving. I've done it when I was grocery shopping, I've done it in the airport, it's really beneficial.

The blue light is the same idea. In fact, is that it will penetrate into the tissue. So the blue light is also not just going to be the surface. When we talk about bacteria, most bacteria that are bad have, they call it the heme. It's like the red, and that's why bad bacteria looks dark on the surface of your tissues or your teeth. It has a heme or porphyrin type of molecule. The studies have showed that the blue light kills them, kills that. But the good bacteria doesn't have that. So while this is going to affect your good bacteria, the blue light, it will not affect the bad bacteria because of that.

Secondly, because it can penetrate, again, into those where you can't really get with a toothbrush, it can penetrate through the gum tissue and possibly kill the bacteria that's harboring underneath there. When we talk about plaque, plaque is a biofilm. So what it does is the bacteria creates this acid, which creates this film, this sticky film, it's sticky and it gets hard, which if it gets hard, they have to chip it away, what it does is it creates this film that protects the bacteria, which can then harbor. What happens inside your mouth doesn't stay in your mouth. Your mouth is not Vegas. So it will actually harbor underneath and then create this inflammation of the gum tissue, those pockets then open up those junctions. You've got the inflammatory markers coming up, and now you've got the ability of things that shouldn't pass through your gum tissue to pass through your gums and either get into your bloodstream or affect your bone tissue.

Dave:

So a lot of people might have heard about using ultraviolet light to sterilize things, which we're not doing. And frankly, it would probably not be a bad thing for five or 10 seconds. But certain regulatory bodies would say, "You can't do that." So the science there is effectively censored and shut down, even though the bond might be good for you.

So, blue light though, it doesn't penetrate very far, but it does have an effect. And if you're saying what, I didn't know that the color of light, other than just direct sunlight had an effect on bacteria. It actually has a profound effect on bacteria, especially dark bacteria. And it also has an effect on places you wouldn't expect. Like if you take out 10 nanometers of sunlight using an optical filter, aphids won't grow. And so, sometimes this very small changes in light affect small biology in ways that

don't, well, I guess they do make sense, but it's very surprising. So you're like, "All right, you have major problems in your mouth, brush your teeth with the right stuff. Don't use fluoride and all that stuff. Use light to stimulate healing. And the microbiome changes in addition to the tissue itself." Okay, that's cool and most people don't know anything about that.

Talk to me more about regrowing gum tissue.

Trina:

Let's talk about the main reasons that gums start to recede to begin with. So bacteria we've talked about a little bit. Bacteria is probably one of the biggest reasons. And bacteria is based off of diet. The bad bacteria likes to feed off of acids. A lot of the foods that we drink are acidic by nature. What's interesting is a lot of dental products that are mainstream, but also natural are formulated and they're not alkaline, they're also acidic, so that if you're brushing with the wrong stuff or using mouthwashes that contain alcohol trickles and those types of things, they also create an acidic environment where the bad bacteria grows as well. Some of those ingredients, including higher doses of peroxide, I know we talked about that a little bit, but those can be caustic, or if you don't, it can be harsh on the gum tissue as well.

Brushing too hard, we don't think about it, but it's common sense, but we still do it because you feel like you need to scrub to get your teeth clean and your gums. But a lot of people just brush way too hard. It's really a soft motion. The softer you brush, the more you actually stimulate detoxification and increasing blood flow. It's like a massage. Sometimes when you massage too hard, you create inflammation, you create more problems. And the softer that you massage, like lymphatic massages if you've ever had them, are extremely, there's no depth to them. It's very light touch. So if we get out of the habit of brushing too hard, you can affect your gums that you can actually stop.

The reason I always tell people when they say, some people tell me you can't reverse the recession. And it's always a two-part, you're absolutely right, and you're absolutely wrong. You're 100% right, and you're 100% wrong. The reason you're 100% right that you can't stop recession is if you don't make any changes to what's causing it. If you don't stop the root cause of what's causing your recessed gums, you will never stop the process and they will just continue. But if you make a couple changes and you don't necessarily have to do a lot of additional stuff, I know we talked about the red light, that's probably an additional step, but if you make changes in the products that you're using by allowing the good microbiome to go, stop using the harsher ingredients, you can definitely affect the changes of your gums. You can stop the process, you can stop brushing so hard, and then you can regrow the gum tissue.

Gums are made up of epithelial cells and the epithelial cells are the same type of tissue on your skin, so you can regrow gums. I've actually had customers that had gums that were four and five on the scale, come back and email me and say, "My gums are now a two, three." So it is possible, you just have to stop what's causing it and make some changes.

Dave:

All right. That makes a lot of sense. Now, I want to know how quickly is someone going to see changes in their gums? Because we can talk about all these magic things. You get Alzheimer's disease 20 years later, okay, you're going to miss that signal. But if someone does the stuff that you're talking about and they've had problems with receding gums, is this a one month, six months, 12 months?

Trina:

And you know what? I can't give you a real good defined, "Hey, within a month, you're going to see changes." You will probably notice changes very quickly. It depends on everything that you're doing. If you make this change, if you stop using mouthwash, you start using the good stuff and oil base, the

tooth powder, the clay base, the alkaline. I have some tips for eating, what to do to help your mouth as far as your meals go. The red light will definitely help. Most people notice that if there's inflammation, if they have mouth sores, if there's bleeding, that decreases pretty quickly. If they're doing my program, that decreases pretty quickly.

Dave:

Like two or three days, you should see less bleeding if you do the stuff right.

Trina:

Yes.

Dave:

Yeah.

Trina:

Absolutely. In fact, when I do red light, and when I do the light therapy, my mouth feels different. You can feel the heat, not just from a little bit from the lights themselves, they just put off a slight amount of heat, but really in your gums, you can feel that increase in blood flow. So most people, when they're telling, when I hear from customers, because I don't hear from everybody, but their dental checkups get better and better. So whatever that timeframe is, if it's a six-month checkup, it's been six months, they're reporting that they're getting better and better.

So that might mean that your gums stop bleeding very quickly, reduce inflammation two, three months, and by your six-month checkup, you're getting growth back. But because of our diet, having, even if you're eating clean and healthy, you're still drinking coffee, right? We're still drinking wine. We still eat red meat. Those are all acidic by nature. We still sometimes divulge in some type of sugar dessert, that type of stuff, there are some things you will never not do 100%. So because of the environment of the mouth and the things that we throw in it, there are acids. And they can just hold things, but if you're healthy and you're doing the right things, it won't backtrack it. You can stay on track and you can slide off your normal for one or two times in a row and you can still bounce back is what I'm saying. You won't get that, "Oh my gosh, now my gums are bleeding because I had a dessert."

Dave:

I have found that swollen gums and even bleeding gums are one of the best leading indicators other than just how you feel in the morning and maybe stiff joints in the morning to see how you did. So if I do something I shouldn't have done nutritionally or I'm exposed to some toxic environment that my body really doesn't like, you got a floss and that's weird. And there you go, it's very predictable. So if you're listening to this going, "oh yeah, sometimes it happens, sometimes I don't." It's not random. It's actually a very strong and clear warning sign that something made your immune system or your inflammatory environment wrong.

All right. I got to ask you this. Is kissing lots of people going to give you better or worse mouth bacteria?

Trina:

Oh my gosh, that's a great question. I love that question because I was actually talking to a dentist, and I actually did a post about, is gum disease or gingivitis contagious? The short answer is yes, 100%

contagious. There was a dentist I was talking with and she said that she had a client who was going through a divorce, and she'd known this client for years. So she knew her history with oral health. Always very clean, never had plaque, great gum tissue, shows up one day and her gums are a mess. They're bleeding, they're inflamed. She now has a cavity that has, trying to figure out what happened? What changed? When she found out she's going through a divorce? She said, "Is there anybody new in your life?" And the woman said, "Oh yes. I just started seeing a gentleman." She said, "What's his dental health like?" She goes, "Oh, his teeth are bad. He's just got really bad teeth." She was catching the bad bacteria from him through kissing and she ended up with worse dental health.

Dave:

So there you go. You should have good teeth so that you can have people kiss you.

Trina:

Well, you also need to make sure that you got to share your dental products with your family and whoever you're kissing. That's the thing, you got to give them a present, a Christmas.

Dave:

This is going to be a little bit gross, and some of my friends who like to kiss a lot of people may not like this. But we know the impact of fecal transplants, right? That's the other end of the same tube. So you should kiss healthy people. In fact, you should aim to kiss people healthier than you so they might give you some of their goodness. Is this not good health advice?

Trina:

This is what no one's talking about. That's why I love you, Dave.

Dave:

For real, this just makes sense.

Trina:

It totally makes sense, right.

Dave:

So, in addition to asking them for all of their private medical records, before they can come into your restaurant and lick a fork that someone else might lick, you also should ask them for all of their dental records for their own safety, because that's how the world works now.

Trina:

Ask them to stick out their tongue. And if they scraped their tongue, if someone scrapes their tongue, they probably are doing some pretty good dental health.

Dave:

Okay. Can we talk about tongue scraping? You keep sending me these fricking tongue scrapers, and they're stupid, and I hate them. Convince me that I should scrape my tongue.

Trina:

Why don't you want to scrape your tongue?

Dave:

It's annoying. It's gross. It wastes time. And then I have to have this weird metal thing under my counter, and I just don't like it.

Trina:

How much time are you taking to scrape your tongue? It takes 10 seconds.

Dave:

I know, but I want that 10 seconds of my life back.

Trina:

One, two, three. So your tongue, if you have a white coating, that's bacteria, it's another biofilm. And so that bacteria covers up your taste buds. If you scrape that off and keep that bacteria at bay, your food is going to taste better and your breath is going to be better as well. It really is, and when you swallow, now, think about this. So everything that's inside your mouth, you swallow, except when you spit it out. If you bring something in, put something in your mouth, you swallow everything. You salivate all day long and you don't even know it. Every piece of food you eat takes in anything down in your digestion. So it passes over your tongue every single time. And if it's icky bacteria, you're feeding and seeding your gut with whatever's landed on your tongue.

Here, this is a question, I wonder if you know the answer. Do you know why after brushing your teeth with, I call it, toxic paste, something old school off the shelf, causes your taste buds or the taste, if you drink coffee or you drink orange juice, it's got that weird taste to it? Do you know why?

Dave:

That metallic nasty taste?

Trina:

Uh huh, do you know why?

Dave:

Not certainly. I would imagine that you've overstimulated the artificial sweeteners, these and those are really bad. So you're overstimulating the taste buds there. And even if you just have aspartame or even saccharin, everything tastes bad afterwards. So I think that's a part of it, but there's probably some other stuff.

Trina:

The science, I love this, this is where I geek out. So the SLS primarily, but the harsh ingredients in mouthwash and in toothpaste removes the phospholipid layer on your tongue. And the phospholipid layer is what keeps your taste buds more neutral. And it takes about five to 10 minutes to rebuild that level, that layer. Whereas brushing with something that's alkaline, without those, like my Dirty Mouth Toothpowder, you can brush your teeth and you can then drink your coffee, and it doesn't taste any different because we haven't disrupted the phospholipid layer of your tongue.

Dave:

Yep, phospholipids matter on your skin too, that's why you don't want to use any of the topical stuff. And all of your topical things that you make are free of the bad stuff like that. And guys, if you think back to the episode we did about, oh geez, this is at least a year and a half ago, about the end of food allergy, with a Stanford researcher who wrote a book by the name, she talked so much about how some food allergies are caused by disruption of phospholipids on the skin. And then if you're rubbing eggs all over your skin, you can actually become allergic to eggs just that way.

Well, you have a different kind of skin that's more sensitive on your mouth. So if your toothpaste is disrupting the membrane, you're doing all sorts of bad things to you, which is why for 20 years now, I have not touched the toxic pastes, the things that they give you for free in hotels and all that. It's actually better, you're going to hate me for this one too, when I didn't have toothpaste, I will brush my teeth with soap, the normal soap you would, that's way better than the crap that's in the toothpaste.

Trina:

But I have a better one, if you forget your toothpaste, call the hotel and ask them to bring you baking soda

Dave:

Smart. They have baking soda that they'll just bring you? I've never tried that.

Trina:

Most hotels that you're staying at have a kitchen, right?

Dave:

Yeah.

Trina:

Yeah, so they'll have baking soda. So you just ask them for a teaspoon of baking soda, send up to your room. Baking soda is great to brush your teeth with because it's alkaline, so it's not going to destroy your good bacteria, it's going to clean your teeth. What it won't do long-term which is why you don't want to use baking soda or charcoal by themselves long-term is they don't have the minerals in them. But I've told a lot of my customers, when you forget something, when you're packed and you're somewhere, don't go by toxic paste, don't brush with soap, just call down and get some baking soda or go get baking soda at the closest-

Dave:

Or salt even, right?

Trina:

Salt, yes, same thing. Himalayan salt is also good and it will have some of the minerals in it for your teeth. So yes, that's another alternative. Totally.

Dave:

Okay, so that's actually really good advice there. All right. Let's talk about the recipe for healing a cavity. And I want to compare your recipe to my recipe. You go first and then I'll add any ingredients, and you can shoot them down or not shoot them down. So rebuilding enamel and healing cavities, what do you do?

Trina:

All right. How much detail do I go into? Okay, there's about 10 steps to healing a cavity. I'm going to try and narrow it down. So the formula for a cavity, if I make it super simple, my formula for a cavity is bad bacteria plus sugar equals lactic acid. Because really what a cavity is, is acid, no matter where it's from, whether it's from food, it's from bacteria, it's from drink, from anything, acid wears away the enamel on your tooth. And if it's worn down in one spot, it's a cavity, if it's worn down everywhere, you end up with sensitive spots.

So to reverse a cavity, you have to get rid of the bad bacteria and the acid. And the way to do that is to stop using the bad stuff that's causing that in the first place, eat healthier food. So cut down on the sugars, especially the artificial sugars. Fruits are better. Of course, they still have some sugar in it, which is why I always say you can't eliminate sugar altogether. But if you get rid of the bad bacteria or at least keep it in balance in check, there won't be that lactic acid buildup, and your saliva will then be able to function 24/7.

Because let's face it, we brush our teeth twice a day for two minutes. That's not even the best way to protect yourself against cavities. The best way to protect yourself against cavities is to allow your saliva to function the way it's supposed to, to neutralize the acids in your mouth, which if you're eating right and have the right bacteria, it should be able to neutralize it when you do have your coffee, or you do drink your wine or eat your red meat. And then it will also have the minerals in it to remineralize your teeth.

If you're brushing with the right products, they will be alkalined by nature. The best way to know if your product is alkaline is baking soda, as far as a natural ingredient goes. Baking soda is a signal to you that the product you're using is alkaline. It needs to have minerals in it. Clay is one of my favorite. I use a blend of three clays in mine. Clay is not just calcium and phosphorus. So clay has manganese and silica and all sorts of things, not just for your teeth, but for your gums. French green clay is in mine. I love it because it has the phytonutrients from LJ and other plants as well as dead animals in it.

Dave:

Did you say there's dead animals? We're going to sue Primal Life.

Trina:

Oh my gosh, it's awesome. You need those nutrients. They're great for your-

Dave:

What do you mean there's dead animals in there?

Trina:

They're great for your bones. Your audience loves this. They're like, yes-

Dave:

But where are the dead animals coming from? From French green clay?

Trina:

It's from the sea.

Dave:

So it's basically like microscopic sea life you're talking about?

Trina:

Right.

Dave:

Okay. I was picturing mammals or something. I'm like, wow, that's expensive clay.

Trina:

No, so it's gotten LJ from sea life. And it's anti-inflammatory and it's analgesic. So French green clay is going to reduce inflammation in your gum tissue. And if there's any pain or anything going on, it can help reduce that pain as well. So also, hydroxyapatite is another big buzzword in dental. We are going to be adding that to our tooth powder formula very soon. It's not going to be a new formula. We're going to take what we have, our formula now, and we'll be adding hydroxyapatite

Dave:

I like it that you continuously evolve. There are, many, many, many years ago, I started using hydroxyapatite. I used it for maybe a year before. It was a study or something, because I was having real problems with yellow teeth and receding gums and bleeding gums and all that kind of stuff. And maybe it worked or something. But your recipe is all the topical and oral and mouth stuff you can do.

I think to have really healthy gums and for regrowing enamel, you also have to address omega-6 in the diet. You've got to cut these seed oil that's been a core part of the Bulletproof Diet for 10 years. And lectins are a part of it. If they trigger auto-immunity for you, then well, don't do those because you have bleeding gums every time you eat bell peppers, if that's what they cause, either they do or they don't. Even if you like them, it doesn't matter.

So you got to look at the fact like systemic inflammatory stuff, but when you're looking at whitening and healing enamels specifically, you got to get to the other primary Bulletproof ingredient, which is grassland butter. And there's a factor in it that was called the X factor by Weston A. Price that is almost certainly vitamin K2. And there's MK-7 and MK-4 are the two types of it. And I think a mix of those two is most likely beneficial. K1, I can take it or leave it, which is why you should have kale, because there's K1. Well yeah, K2 is where it's at, which comes from fermented products and it can be made in your gut. So if you want to heal cavities, cut out your seed oils and all that kind of crap, cut out other inflammatory things in your diet, make sure you're getting enough vitamin K2 and probably vitamin D. And then you might need some boron and some silica and other things like that.

But if you're doing that and you're doing the topical stuff, you just talked about, all the Primal Life things, especially the clay, I think, and especially just alkalizing after a meal, I think you can really do things that would be incredible. Oh, and I forgot one other thing for my recipe. And I want you to blow holes and all this, by the way, if you can. And that is, ozonated olive oil for extreme cases, orally or if with cavities could be worth doing. And then there are probiotics that might be worth doing as well.

All right. That's my complete list. So if you're dealing with, I don't want to get mercury fillings or any other fillings for that matter, well, it's a lot, you could do. Maybe you have to do all of it, but I poke holes in it. What am I doing wrong?

Trina:

I'm not poking holes in any of it, because that's, no, I'm sorry. That's totally true. That diet aspect, and you want me to poke holes?

Dave:

I want to be wrong. No one ever pokes holes on my stuff, come on, except for those calorie people, but they're all angry, so I don't listen to them.

Trina:

The only thing I will say is when you're supplementing and you're taking supplements, if your gut isn't healthy, you're not absorbing it. Chances are good that you won't be absorbing it, and then your saliva will be weaker because your saliva pulls from your bloodstream. This is why women that have babies end up with a cavity after the baby's born, because their saliva gets depleted because baby's pulling a lot of the minerals from their body to create their own bones and teeth.

But what you mentioned, all of those supplements are extremely important when you're wanting to, well, anytime, even if you don't have a cavity and you don't have gum disease, it's preventative. So let's not worry about healing them if we don't have them, let's just prevent them to begin with. And all of those things are extremely important. But like we talked about at the very beginning, oral biome, gut biome. And you've got to make sure that your gut is healthy, because if you're not absorbing the supplements that you're taking, especially when they're papillated, you're not, if you put something in your mouth and you put it on your gums, you absorb it very quickly. But if you swallow a pill, there's a possibility that you're not absorbing everything that you could be absorbing and you're eliminating it more than you're absorbing it.

So if you're still having a lot of issues, health issues, and you're taking a lot of supplements, definitely double-check your digestive health, because that's where that disconnect could be coming from.

Dave:

I think that that is, it's such a comprehensive list between everything we've done here, that anyone who's saying, "I'm looking at getting your 10 holes drilled in my mouth." You might want to look at all this stuff. I know for a fact that you can reverse cavities and I've seen it done. I've seen it done in my kids. It's not to say that one of my kids doesn't have a filling or two. And I'm like, "Maybe you should tape your mouth." Which is the other thing we didn't mention. If you don't want to get cavities, taping your mouth at night when you're asleep so you don't have air in there seems like a good idea. Right? Have you ever thought of making a nighttime mouth guard that's fully insertable that keeps you from grinding and just give you red and light all night long?

Trina:

I was told by one of my board members to stop making products.

Dave:

Yeah, I remember that guy.

Trina:

No, I actually have thought about that. I have thought about making a mouth guard or something that you can wear at night that will help with dental health.

Dave:

Got it. And guys, what Trina is talking about there, I'm on the board of directors of Primal Life Organics, and that sounds all big and ooh. The way it works on the board of directors, usually meets two to four, sometimes six times a year with the executive team, and you look at how the company is doing, and then you provide wisdom and feedback for the executives. And I know because Trina is like me, she's a hacker, and she wants to make the latest coolest stuff. When I was involved with Bulletproof, back when I was running things there, there was a time when I sat down in my board of directors different people that are on the board today, they said, "Dave, you have so many products that's going to break your company." And I couldn't hear them say it. Literally, I didn't hear them, because you'll filter out reality that you don't want to be true.

And it took them telling me like 10 times, because one of my board members in particular, who I miss, would just kept saying that. And finally I'm like, "Oh, okay. I guess we'll kill 200 products." Did you guys ever know there was more than 200 products in Bulletproof? Yeah, there was. And he said, "Dave, we've been telling you for six months." And I was like, "Why didn't you tell me?" It literally was like that.

So guys, I had this conversation, exactly the one I'm sharing with all of you, if you're entrepreneurs or whatever, with Trina, because for six months I've been telling her, "You need to not put all of your attention to new products because that's the most fun. You've got to be able to take the amazing stuff you have and then actually do the hard work of telling people why they matter."

So that's the work I do as an advisor and as a board member, because look, if you make the most amazing thing ever and no one ever uses it, you didn't succeed. Making it doesn't matter. And I know hundreds of crazy inventors who have never succeeded because no one ever used their crazy inventions that could change the world. So part of what I do is I curate and I find the good stuff and bring it out there. And so I know the product line and I know Trina's motivations and work very well because we have that kind of relationship.

Now, I'm seeing some questions from the Upgrade Collective. I'm going to take a couple of live questions.

Trina:

Absolutely. Can I mention one more thing about receding gums that people don't think?

Dave:

Okay.

Trina:

So when I talked about brushing too hard, there have been studies that have been done between a manual toothbrush and a sonic toothbrush. And what the studies have shown is that a sonic toothbrush plus a plaque a little bit better because of that sonic vibration, also reduces the pressure that someone's putting on their gums, so they brush less hard. So it's a softer brush. And the vibration, if it's the right vibration or frequency can stimulate blood flow. Just like I was talking about massaging too hard.

Sometimes the sonic vibrations are too fast too hard, and may do more internal damage than actually spark the increased blood flow.

We are coming out with our own, and it's really cool because it's biodegradable bamboo, toothbrush that is set at a frequency that is more in line with healing gums. There's a bunch of settings on it. I have one here. These will be available very soon.

Dave:

So this is an electric bamboo toothbrush [crosstalk 00:55:02]

Trina:

It's an electric bamboo. So yes, it's really cool because, where is my one that I have open? The brush head itself is what is bio-degradable. Let me pull one out so I can show you. The brush head itself is biodegradable. Of course, this has to be in a plastic casing because it has to be waterproof, but it has a bunch of settings for cleaning, whitening and gum sensitivity or gum health. But it's the actual brush head that is bamboo. The bristles are biodegradable, infused with charcoal, and then the inner casing is what holds the brush onto the spike. And that is made with corn starch. So you can literally throw the toothbrush in the compost and it's going to degrade over time faster than the plastic brush heads that come with most toothbrushes.

So brushing with something sonic, so if you're not brushing, if you're doing a manual toothbrush, I still like manual toothbrushes, and sometimes I still brush with my manual one in the morning, but I love brushing with the sonic at night just because it does a little bit deeper of a clean and it does more of a massage with that vibration of the gums. And that will spark regeneration simply by increasing blood flow and that massage effect of it.

Dave:

I actually have 13 different toothbrushes each with slightly different action for manual. You really use a manual and an electric? Right, you're a nerd. Sorry, you can just use your electric and just not turn it on, and then it's a manual.

Trina:

Why didn't I think of that? You're so smart.

Dave:

I'm just like, why are you doing this? But maybe your manual has some paddles or something. I don't know. It's scary.

Trina:

No, it's real new. I haven't even thought of that yet. I just love the sonic vibration, it's so soft.

Dave:

You sent me one, it's cool. I like it.

Trina:

Yeah, but it's just fun. But I didn't even think about it because I just like using the manual for the vibration.

Dave:

Anyway. That's just the lazy me doing the lazy me thing. All right. Now, there are a few people here in line. I think I want Ski. You had a really interesting question. You want to go?

Ski:

Thanks for having me on for a question. Trina, last episode I think you mentioned, we started to get into the realm of connecting the meridians to the individual teeth, and how that's very important for overall health. Recently we also heard about some of the dangers of a root canals. So if somebody is facing these inevitabilities where their dentist is saying, "The tooth has to come out," or "We've got to do something with this in terms of a root canal," what are the alternatives?

Trina:

That's a great question. I would say that just like any other medical opinion, you can go to another dentist and get another opinion. But I would make sure that it is either a biological. I would prefer a biological dentist over a wholistic. But if there's no one near you or close enough in it, honestly it's worth the travel of an hour or two to a biological dentist if that's what you're facing.

I would say get a second and even a third opinion, if you think, because once you sever that connection, it's gone forever. And I've heard from a lot of biological dentists that they can save a tooth, even when they're being told that it has to either be pulled or a root canal. So I would just say, make sure that you get a second opinion from someone who is either a biological preferably or a holistic dentist. I don't know if Dave has anything to offer.

Dave:

Most of those dentists have ozone and lasers, medical lasers, that can do ridiculous things to shrink an inflamed nerve and to sterilize it. So yes, I would say, keep asking and all of that. All right. Patricia, you had a question here, because I think you're getting, you're having problems knowing where to start. Do you want to hop on real quick?

Patricia:

I'm fully embracing this. I'm looking at your website and seeing all your products, what would be the ideal package for us to get going? And it can be comprehensive, but.

Trina:

It will look like this.

Dave:

The detox kit.

Trina:

Yeah. Now, this doesn't have the red light on it. And I know Dave, you have links that you can give everybody for that stuff?

Dave:

I think you guys made especially davesdentalkit.com. Wow, I love it.

Trina:

Yeah, you guys have the links where they'll actually get a better price too. But the dental detox kit is where you would start. That's going to have everything that you need for a 60-day window for brushing your teeth, your tongue scraper. And it's even got a detoxing deodorant because for me, the next dirtiest place is your armpits. And I really want to help you clean those up, so I throw that in the kit as well. And then the LED teeth whitener, you can also, that's the other item that I would suggest if that's where you're going and you want to upscale or upgrade it, your dental health.

Dave:

Which is dirtier, the mouth or the armpits?

Trina:

It depends. Who are we talking about? You or me?

Dave:

Me. No, you have to answer it. You don't have to answer that.

Trina:

[crosstalk 01:00:29] your armpits.

Dave:

I don't know, I shower, but I'm not going to be looking on my armpits, because I've been working on that yoga pose, but I don't have it quite down. All right, let's go to our next question here who I believe is Alan. Alan, what do you have to say?

Alan:

Quick question here. So I have a monthly subscription to your tooth powder and the toothbrush. So my question is on tartar, and how to battle that, because I'm on manual toothbrush, obviously yours at this point, and just wondering what else do I have to do specifically? Because my dentist pointed out it's actually more of an issue nowadays with me than before, if I'm making any sense here.

Trina:

Tartar, I couldn't hear very well. Still having tartar buildup or plaque buildup?

Alan:

Exactly. Tartar buildup specifically, because I'm on your ... And I do have your brushing, your tooth powder, that's all I'm saying is for tartar buildup.

Trina:

Okay. Are you using any other brands besides mine for mouthwash or anything like that?

Alan:

No.

Trina:

Okay, good to know. Because when people do that, it can cause the damage. What about your diet? Are you taking the supplements that Dave mentioned?

Alan:

Yes, Bulletproof diet actually.

Trina:

Okay, perfect. I would suggest the red light and blue light, if you don't have that. That's probably going to be the next thing that I would suggest because it's going to actually penetrate the gum tissue, and it would be like a 15-minute treatment. So that's what I would recommend after that. And some people are a little bit more prone to plaque and build up. Is it hard plaque or is it soft?

Alan:

I say it's soft.

Trina:

Okay, so that's actually not bad, that's okay. A little bit of buildup every day is still normal because you do encounter the bacteria and you do encounter sugar and acid. So if it's soft, that's good. Flossing and everything you're doing is amazing. Keep doing that. The other, this is a hack, the other thing that, what I like to tell people is, when you, at nighttime, especially, but during the day too, if you take your finger and just dip it in the toothbrush and then place the powder along the gum line, because it's alkaline and with the clay, it can actually help reduce the amount of plaque. But even so, a little bit of not hard plaque but that soft plaque, is still going to build up a little bit just because of diet and the bacteria and sugars. But all you do is put this and just place it on your gums, right at the gum line.

Dave:

Thanks Alan. Tracy, what do you have?

Tracy:

Thanks for taking my question. So I had a question about your red light device and how it works differently than using a full body device say like the Joovv, if you're using that?

Trina:

Well, the science behind it is basically the same because it's going to work to increase collagen blood flow and reduce the inflammation. But you can't put a Joovv light in your mouth the way you can put the mouthpiece. So this is designed with 16 red lights and 16 blue lights, so 32 lights. But when you put this in your mouth, I won't be able to talk, you can see how the red light then is going all the way around inside your mouth. So the science is the same. It's just the device is made for your mouth. Before I made these, I would take a small red light device and try and shine it in there. But it's only in one area, you're not actually getting it. So this is just made for your mouth.

Dave:

If you guys saw my talk at the conference, Tracy, red light just doesn't penetrate very far, the infrared does. So even like the true light panels, amber light, same thing, it doesn't go deeply like that. So you could put an infrared light and that can help with circulation, but you don't get any of the red stuff. And then it's not the infrared that's helping the teeth, it's the red. And it's just not going to be able to penetrate the way it needs to.

So whole body nitric oxide levels will go up. Healthier nitric oxide will probably help your teeth a little bit, but it won't have the effects on local tissues. And it's, if you don't necessarily believe that, you can put a true light panel, try it over most sensitive regions. It's either nipples or the reproductive organs in men or women. You totally feel that difference, right? So it's local and systemic, and you're just going to feel a systemic thing.

If you got to Upgrade labs, we have a whole body, very intense clinical grade thing. And if you lick a strip that tests your levels of nitric oxide, it'll actually turn pink over a 20 to 40-minute session. You're not going to get that from, for the Primal Life Organics thing on your teeth, you're going to get the local effect that you can't get, even with the clinical thing, because you can't get the red light in your mouth.

Trina:

And the red light, and I don't know the nanometers for skin, because that's not my thing with the skin, but then they might be different for skin and gum tissue. So ours is set, the red light is actually set in the blue light is set at the right nanometers for gum and dental health.

Dave:

Nice. We have time for one more quick question. Diane, you want to go?

Diane:

Yes, thank you so much. So a couple of really fast questions, because I know we're at the end. My implant is repeatedly getting infected and thankfully I've gone seven months now, but the last time it was by a strep, strep called [inaudible 01:06:16]. It's specifically found in the mouth and gut, right? So I'm wondering if any of the products will help battle that. I'm afraid to floss my teeth now for fear of this, any blood and then bacteria gets in and it goes right to my implant.

Trina:

Definitely can help the tooth powder and the gum serum. So any of the bacteria, most of the bad bacteria inside the mouth, like we talked about, has the porphyrin, it is alkaline or acidic by nature. So changing the products that you're using can definitely help. One of the things that I usually suggest to people, especially that have issues with their gums and especially between the gums, this is my dental floss. You can do this with floss, but you don't want to do this with something that's toxic or harsh. But with my gum serum, it comes in a dropper. You drop a dropper on your finger, and then if you put your floss right through it and add the gum serum right to your floss, as you're flossing between your teeth, here's my guide, when you're flossing between your teeth and getting down into your gums, what you want to do is create a C.

So, you really should still be flossing because that bacteria will just continue to, it's going to continue to grow and get worse. So by not doing it, you can be causing more harm and actually cause a biofilm to be created. So what you really want to do is continue to floss, but you've got to floss the right

way and you want to floss with the right thing, putting the oil on. But when you put this between the teeth, you want to rock it and also create a C. You don't really want to do it super hard.

If you have a little bit of blood, that's probably okay because you're cleaning it out. You want to do the cleaning. Over time, and especially if you're changing what you're brushing with and even adding the red light therapy, that bleeding and inflammations should reduce. It's the bacteria that's probably causing the problems in the first place, and if you don't do something to stop the bacteria and get rid of it, it may not heal correctly or heal at all.

Dave:

Right. I love that answer, thank you. And Diane, I would do everything that you just heard from Trina, and their stuff really, really does work. Like I said, I'm on the board of directors, that means they keep sending it to me and I keep using it, and I like my mouth. There's also episode 808 with Professor John Tagg who has a specific strain of probiotic that knocks down strep. And I would consider given that you had that going on, consider adding that to the protocol after you've done everything that Trina just mentioned, especially before you go to bed. You're like, let's make sure the good bacteria that fight off bad infections for you would be the right thing to do.

Well, Trina, thank you for your third information packed episode. Our resident tooth experts and now spit expert and a tongue expert, I don't know, what do you call that? I don't know if I'm not going to call you an oral expert because that would just go down the wrong way.

Trina:

Yeah.

Dave:

Did you see what I just did there? I hope you didn't, because I didn't do that on purpose until after I said it and now I am apologizing.

Trina:

There's a lot of great things that-

Dave:

I'm apologizing to our entire audience. Truly that was not planned. Now, on that amazing note, Trina, I always appreciate your sense of humor and just your incredible nerdiness about teeth and oral health. I search out people who are just obsessed with certain things, because they become great experts on it. And they're experts at actually doing it. And sometimes they're professors and academics, and quite often they're biohackers. They are saying, "Okay, you have a background, you have an education and stuff, but you just got into this and you look at how do I change it?" So there's a thing you can find out about people who are the people who just know all there is to know about this thing. And if they don't know, they know who to ask. And you're that for oral health, so thank you for that. Thanks for all the stuff you're making at Primal Life.

And you had a couple of URLs for our listeners. I always ask people to provide a discount, and I had some leverage because I'm on your board. So you made a URL which makes me feel special, davesdentalkit.com, for the dental detox that has most of what we talked about. And you have the LED teeth whitener, naturalteethwhiteners.com/dave. So people get a deal on that.

Trina:

And by the way, through both of those, you can get the LED, and you should be able to also, if you want the toothbrush, that's the only way right now that we're allowing it special for Dave. So if you are interested in the toothbrush, you can actually order it through one of those links as well.

Dave:

Cool, so you guys get special access to something that doesn't pollute the oceans with non-biodegradable bristles, which is cool. I will see you again probably in another six months or whenever it's time to do another oral episode. Thanks, Trina. Thanks Primal Life Organics for this episode.

Trina:

Thanks Dave.