Episode 114 Transcript

00:00:03:29 - 00:00:04:19

Dr. Jaclyn Smeaton

Welcome to the DUTCH Podcast, where we dive deep into the science of hormones, wellness and personalized health care. I'm Dr. Jaclyn Smeaton, Chief Medical Officer at DUTCH. Join us every Tuesday as we bring you expert insights, cutting edge research, and practical tips to help you take control of your health from the inside out. Whether you're a health care professional or simply looking to optimize your own well-being, we've got you covered.

The contents of this podcast are for educational and informational purposes only. The information is not to be interpreted as or mistaken for medical advice. Consult your health care provider for medical advice, diagnosis or treatment. Welcome to today's episode of the DUTCH Podcast. I'm really excited about today's episode because I got the chance to talk with an expert on fertility, a field that I love so much.

We talk a lot about fertility and reproductive health in women, but today's episode has an extra special spin because we're going to be talking more about men. Now, if you are a practitioner who treats fertility, or maybe you're a woman who is trying to conceive, you probably know that most of the time women carry the educational emotional burden of trying to conceive.

And not only that, but more often they are going through more workup and more treatment. But what's so interesting about today's episode is we're really coming at it from the point of view of the fact that it takes two to tango. Both male fertility and female fertility needs to be optimized in order to have a healthy baby. Today's guest is Dr. Afrouz Demeri.

She's a globally respected naturopathic doctor and a women's health expert, and she's a leading medical voice behind the brand We Natal. With over 18 years of clinical experience, she's helped thousands of couples improve their fertility and achieve healthy pregnancies. She's formerly the director of functional medicine at UC Irvine. And Doctor Freeze is dedicated to empowering women and really redefining whole body health starting before conception.

00:01:55:12 - 00:02:14:00

Dr. Jaclyn Smeaton

She calls it trimester zero. So beautiful. Her work with natal pairs science backed ingredients with her own clinical insights to really deliver comprehensive prenatal approaches for both men and women. I think you're going to really get a lot out of today's episode, so let's go ahead and get started. Well, Doctor Mary, I'm so excited to have you on here.

00:02:14:00 - 00:02:21:10

Dr. Jaclyn Smeaton

I've seen you out and about. I've had the chance to see a lot of your work, and it's so nice to actually get to make a connection today. So thanks for being here.

00:02:21:11 - 00:02:22:03

Dr. Afrouz Demeri

Thanks for having me.

00:02:22:03 - 00:02:42:18

Dr. Jaclyn Smeaton

I always like to start because we have a lot of providers that listen to our podcast. I love to start by just asking you a little bit about how you ended up where you are as a natural pathway doctor. You've practiced at UC Irvine. You know you were in a very conventional setting. Can you just tell us a little bit more about your backstory so our listeners can get to know you?

00:02:42:21 - 00:03:01:12

Dr. Afrouz Demeri

Yes. Well, I found that graphic medicine mainly because I was sick and I always wanted to be a doctor. But I'll fast forward to how I got into the field of fertility. That is a field I never wanted to be in. I always thought it was just so heartbreaking and I loved kids. I always wanted to have like ten children.

00:03:01:14 - 00:03:25:13

Dr. Afrouz Demeri

And, I had my first daughter and in the hospital sitting there after her seventh eye surgery, I started to realize this is not how my story was supposed to be. I was super healthy, never drank, smoked. I was 28, I was young, and this is not what I expected. And so that's when I guess she chose the path for me.

00:03:25:13 - 00:03:47:10

Dr. Afrouz Demeri

Her coming made me realize there's so much missing and there was so much information I didn't have. And I wish you know, I had and there was a lot of regret, and blaming myself and even the doctors was were all focused on me and it was just my problem. And I felt very lonely. I felt very depressed.

00:03:47:13 - 00:04:07:27

Dr. Afrouz Demeri

And it changed everything for me. And so that's how I got to really dive in. And I created the concept of trimester zero back then, because I realized we were buying a house at the time, and we did so much digging in into this house, the room, the foundation. I mean, we did not buy until like, everything was fixed.

00:04:07:27 - 00:04:32:14

Dr. Afrouz Demeri

And I realized nobody looked at me, looked at my husband's like he was completely out of the picture. And, you know, she wasn't growing. And so when a year or two, years of me being told it was my breast milk, it was me. It was me. I asked if they could run a Turner's test, and lo and behold, unfortunately, I did like the results.

00:04:32:14 - 00:04:54:16

But she did have Turners, and I thought, what, I supposed to miscarry her? That's where a lot of miscarriages come from, which I had had previously. And that's when I dug into research of meiosis. And how could how could something come about without a whole X chromosome? And I was just told everything is chance. Everything is just, you know, it's never going to happen again.

00:04:54:19 - 00:05:18:20

Dr. Afrouz Demeri

And then she had Peters anomaly in our eye, which was also by chance. And I was always that girl that had that 1 in 1,000,000 things go wrong. And I was like, wait a second. And I was seeing it in my patients. I specialize in pediatrics from right from the start. And I realized we got to go back to the prenatal, the nine months, and then I would see these moms and I can like, wait, no, this is like before conception.

00:05:18:20 - 00:05:36:22

Dr. Afrouz Demeri

And so I guess that my interest really chose me because I had to figure out what am I going to do because I wanted to have more kids. So it was really because of my own self that I selfishly ended up being a specialist in this area. So that's my different story than most people.

00:05:36:24 - 00:05:55:23

Dr. Jaclyn Smeaton

I appreciate you sharing your story. I think we're going to have a fabulous conversation today because as you know, this is a big passion area for me as well. I think one thing that really stands out to me in your story is you explaining, like people are looking at you, people are pointing to you. It's, you know, your breast milk, your body, your body raising the baby.

00:05:55:25 - 00:06:12:22

Dr. Jaclyn Smeaton

And I think one of the things that you've really focused on your career, and I think this is a great place to start, is that the approach to fertility is not just about mom. Right. Can we start there? And can you share a little bit about, you know, why you're so passionate? You work with this company. We need all that you've formulated products for them.

00:06:12:23 - 00:06:31:24

Dr. Jaclyn Smeaton

Tell us a little bit more about, you know, that experience that women have. I hear it too, and I saw it in my practice. They're the ones that do the research order the supplements, book the visits, even if it's male factor. Fertility. Yeah. Infertility. Women take on this like disproportionate emotional labor. Educational labor.

00:06:32:01 - 00:06:33:21

Dr. Afrouz Demeri

Yeah. Well, let's.

00:06:33:21 - 00:06:34:06

Dr. Jaclyn Smeaton

Talk about that.

00:06:34:07 - 00:06:59:24

Dr. Afrouz Demeri

Thank you for hosting this, because I think it first starts with educating, educating couples that fertility is a team sport. It. And when, when Ronit and Vita, who are the founders of we Natal, came to see me at UCI as patients, I'm allowed to share as they've shared freely. And they had had a miscarriage each separately. That's the first question I asked is like, okay, where are the men?

00:07:00:01 - 00:07:23:06

Dr. Afrouz Demeri

Oh, let's look at the sperm. And they were just shocked. They were like, what? Really? You

think it would be home? And I was like, was 5050, you know, and so even well-educated

women, even though I was an actual Catholic doctor at the time, I was not getting the

answers from the authority, you know, the OB GYNs and the, pediatricians.

00:07:23:06 - 00:07:50:12

Dr. Afrouz Demeri

And so I think first it starts with educating couples that fertility is a team sport, and then encouraging and normalizing pre-conception health optimization for men and focusing on

their nutrition, their lifestyle, their environmental toxin reduction, their use of cell phones

and radiation and emfs. And, you know, it's not just about, oh, his sperm counts are fine.

You know, I hear that all the time.

00:07:50:14 - 00:08:13:17

Dr. Afrouz Demeri

If they do get tested, it's like, it's not him. It's me. And women I realize have this false belief.

It's almost like sometimes it is them. And we have proven that it's then, like, get sticky their

head. You know, I'm just looking at some patients I have today, like the head morphology is

so abnormal, you know, and it's it's shown in front of them.

00:08:13:17 - 00:08:43:02

Dr. Afrouz Demeri

And yet women still want to take on that burden. And I don't know if this is just the, you

know, nurturing side to us, the feminine within us. I don't know what it is, but I've also seen

the mindset that we take on the blame. And so I don't want to just blame the doctors. I also

see in my practice that we we have this nurturing quality of like wanting to fix things, you

know, wanting to find out what's wrong so we can be in control and we can do something

about it.

00:08:43:04 - 00:09:03:20

Dr. Afrouz Demeri

Men typically in my practice, don't want to be seen as something's wrong, you know, and that they're broken or that there's something we have to fix. So just bringing that balance of that feminine in that masculine within the relationship. So it feels like a we, you know, that's

what I love. We needle because it's, it's a we we are creating life.

00:09:03:23 - 00:09:17:00

Dr. Afrouz Demeri

We are going to be parents together. We are going to have to decide what we're going to do when it comes to vaccines. And so it's an, you know, things to buy and how to feed the kids. And, and it has to be together.

00:09:17:02 - 00:09:45:15

Dr. Jaclyn Smeaton

Yeah. It's really interesting that I think that, you know, we're talking about like, what's different between men and women when it comes to how they address infertility, how they work on it together and how there can be this natural inclination. And I'd love to share just a brief story of something that really changed my perspective. When I'd been in practice for about 15 years in the field of fertility, and I was actually at a professional networking event talking with a colleague of mine who I'd known for years.

00:09:45:15 - 00:10:08:01

Dr. Jaclyn Smeaton

We were friends. He and his wife had been trying to get pregnant, and they asked me to, like, just take a look at their information and provide some feedback, which I had. And they got pregnant and had a miscarriage. And the miscarriage had been maybe 3 or 4 months before I saw him. And we were at this networking event, and he broke down in tears about his own experience in that, on his.

00:10:08:01 - 00:10:30:21

Dr. Jaclyn Smeaton

And it was really an eye opening experience for me because he shared the challenge of grief and loss for for him, but also this cultural focus on mom through the bereavement of a miscarriage and also his feelings as a partner where he wanted to support his wife. He knew she was grieving too, and felt almost like he had to kind of put his own needs on hold

to care for her.

00:10:30:27 - 00:10:52:17

Dr. Jaclyn Smeaton

And it really, it really gave me, you know, where we see that imbalance. I think as women ourselves, we sometimes see that it's kind of an unfair burden put on women. But it really made me realize there's also an unfair like missed opportunity that we culturally also put on men to not be as involved in the fertility journey.

00:10:52:19 - 00:11:11:11

Dr. Jaclyn Smeaton

It was really just an eye opening experience and really led me to be more inviting and really make sure I was very forward with an invitation to men in a very open way. Not with any blame, but like this. You know, you can get as involved as your wife in this process. And many of them did. Not everyone, but many did.

00:11:11:14 - 00:11:33:22

Dr. Afrouz Demeri

Yeah. I do find that that compassion, that what you're saying that inviting that maybe they are interested. They do want to learn. You know, I have a course on this and I find usually the women, you know will say, hey, do you want to watch this with me? And it depends on the intention. Are we to just become more well, or are we here to find problems to fix?

00:11:33:22 - 00:11:58:24

And I think that mindset of I'd like to call it it's called salute agenesis, which means basically research has shown when we do things that bring wellness, that bring you to more joy and mindfulness, and to be more present, that helps the cortisol curve, that helps your antioxidants. It helps how you choose different foods. It helps how you suppress your emotions with alcohol or marijuana.

00:11:58:26 - 00:12:23:20

Dr. Afrouz Demeri

When you are coming at it. From that angle of understanding, compassion, love versus let's test everything and see, like if we have high this high that, you know, and then figure out when we're going to do that is stressful in itself. And I for fertility and cancer patients, those two are typically already coming in. They are exhausted that the man does not want to be there.

00:12:23:22 - 00:12:47:24

Dr. Afrouz Demeri

He feels like, you know, he just is becoming robotic even, you know, intercourse and that my job is to make sure I'm helping first that reconnection. You know, there's a sometimes my career and my patients say it's a little bit of therapy to just hear them, just to listen, just to say, what do you guys think? Do you need, you know, as sometimes it's the guys are not sleeping enough.

00:12:47:24 - 00:13:05:04

Dr. Afrouz Demeri

You know, I can't tell you how important men menstruate, fertilize these types of sleep. They're sleeping late. And research shows that if they are getting less than six hours of sleep, it's going to impact their sperm. And, you know, it's simple things like they'll say, oh, he needs to go to bed. Well, why isn't he you know it.

00:13:05:06 - 00:13:27:08

What what is the reason instead of just telling someone? Because often they know. They know they're not eating well. They're know that. They know that the fast food or the soda drinks that they're hiding from their wife, you know, and so there is a little bit of therapy involved in just getting us to come together and be honest, be real and first.

00:13:27:08 - 00:13:46:15

Dr. Afrouz Demeri

See, so when I am presenting, you know, sperm counts and DUTCH results and this and that, it's with, it's with a different mindset. And I didn't have that ten years ago when I was practicing. It was more I was the investigator and trying to figure out what's wrong so that I could give them tools to fix it. You know, it felt good to me.

00:13:46:15 - 00:14:10:04

Dr. Afrouz Demeri

It felt good to them. It was measurable. It was scientific. But the more and more I practice now, I realized there's such an art in how naturopathic medicine excels, and it's in the way we take a case. It's in the way we can put everything together and figure out, like how to peel that onion. Where are the red flags?

00:14:10:06 - 00:14:25:07

Dr. Afrouz Demeri

What are what I always say to my patients, which I love about what we do, the obstacles to cure and removing those first instead of here is the prenatal I'm taking all this stuff. Why is it not working? Right, right.

00:14:25:09 - 00:14:52:02

Dr. Jaclyn Smeaton

Yeah, yeah. It's interesting. I feel like the longer you are in practice, the more, simple your toolbox becomes where you're like, if I could just be really effective on nutrition and sleep and stress management, like, everything else is going to fall into place, you need less. You

focus on those basics so much more. And I've really seen that same turnaround and not like the biochemical, you know, the chemistry, the labs, that approach to medicine so critically important especially to diagnose and understand the root cause.

00:14:52:02 - 00:14:57:03

Dr. Jaclyn Smeaton

But it's we need to also be emphasizing that art as well. I completely agree.

00:14:57:06 - 00:15:14:00

Dr. Afrouz Demeri

Yeah. Because a ten years ago I was just telling them, hey, you just have to do this for 72 days, okay? Just just give me that time. It's super easy. You know, your wife has to do this preconception nine months and maybe a year or two later. It's a lot. It's not fair. Come on, you can do this.

00:15:14:00 - 00:15:50:03

Dr. Afrouz Demeri

You know, I was like, we were pushing them, like, cut out the alcohol just less cause he hadn't. Don't smoke weed. Let's figure figure out how to, like, fix it for just this time. And then I realized years later, seeing them as dads and the issues they're having now with their kids who have ADHD or have this and that and the disconnection between the family, I was like, I'm doing a disservice if I'm just trying to optimize sperm, which used to be my focus is just have the healthiest sperm, the healthiest egg, get them pregnant, healthy pregnancy, healthy birth off, off you go.

00:15:50:03 - 00:16:12:18

Dr. Afrouz Demeri

And often the research unfortunately stops there. You know, in our practice we get to see them 18 years, 20 years later and say, oh, interesting. Even my own daughter, okay, she's got the eczema. She's got the allergies. Interesting. All the things we learn about. And then

this kid doesn't what did we do differently. You know, how was their nutritional status of the mom?

00:16:12:21 - 00:16:36:12

Dr. Afrouz Demeri

And dad how was their weight, their body fat percentage of mom and dad? So yeah, the the genetic stuff that we learned when we were in school versus the epigenetic and also just the lifestyle and the environment that the sperm and egg is and to me is fascinating. And the environment, for me, a huge component. Our emotions are how we feel.

00:16:36:15 - 00:17:00:07

Dr. Afrouz Demeri

And I think that's my favorite part of Pre-conception care is just meeting these two souls that want to have another soul. And it's like, let's get to know what are the obstacles. Why isn't it slowing? I know that we're bombarded with our environmental toxins and what we find in the umbilical cord and all of that, but adding that to their story is only usually going to make them more stressful.

00:17:00:07 - 00:17:22:26

Dr. Afrouz Demeri

And I know we think we have to inform, but we have to be so careful because often I do surveys on all my patients after they leave. When you see that, they are now feeling less hopeful because now they've got all the science, that's that's where the art comes in. It's like, what can we measure that is changeable or that therapeutically is going to have better results, you know.

00:17:23:02 - 00:17:52:11

Dr. Afrouz Demeri

So that's I think the art and that's when I'm mentoring a lot of doctors or at UCI, you know, we had the largest naturopathic residency group and also medical students, sitting with us

and learning. It was not just about testing, testing everything. It's about what is the link to that patient's symptoms, physical exam findings. You know, if, if, if everything has to kind of be graphically linked so that we are clear on if.

00:17:52:11 - 00:17:53:16

Dr. Jaclyn Smeaton

We I.

00:17:53:18 - 00:18:00:21

Dr. Afrouz Demeri

Hypothesize that we're going to change this marker. It's going to have an outcome that we are or so.

00:18:00:24 - 00:18:30:08

Dr. Jaclyn Smeaton

Yeah. The other thing that's so interesting about fertility and male fertility is where the research is on this today at least, is that in fertility in men in their 20s, 30s, 40s is tied with higher rates of chronic disease. Yeah. Earlier Alzheimer's disease, cardiovascular disease and several cancers. Yeah. So it's really interesting because I was, you know, reading this article and I actually end up putting together a presentation for AMP one year where really infertility is kind of the canary in the coal mine for chronic disease.

00:18:30:10 - 00:18:52:26

Dr. Jaclyn Smeaton

It's the first place that chronic health issues really show up. So I think that's another point of view where if you think about couples coming into you to conceive, if they're struggling, not only do we want to help them have a baby, but you don't want it to be just 72 days, because the infertility is a sign that there's an opportunity for health promotion, that could change the trajectory of their health.

00:18:52:26 - 00:19:05:07

Dr. Jaclyn Smeaton

So not only to have a child, but to be around to enjoy a relationship with that child into the child's adulthood, it's so critically important. So I love the frameshift that you introduce here about really thinking that whole person approach.

00:19:05:10 - 00:19:26:03

Dr. Afrouz Demeri

And and what I see often isn't told to anyone, really, the patients who are having these miscarriages, they're not told that it could be the sperm, it could be that it's coming from that. I mean, I'm one of those people that it's pretty rare to have a child with Turners, you know, and and so I dug into meiosis.

00:19:26:03 - 00:19:49:24

Dr. Afrouz Demeri

I'm like, okay, well if she got one X chromosome 80%, the research shows most likely from me and didn't get that X chromosome. And I was like, what nutrients are needed for meiosis? You know, just going back to basic things like zinc, B12, all the methylation, all the magnesium, that we need for ATP production, all that we know the mitochondria is so dense and sperm and eggs.

00:19:49:27 - 00:20:11:16

Dr. Afrouz Demeri

So these basic things and at UCI we just, my colleagues just finished doing a clinical study looking at couples before they can save and their nutritional status. You know, it's like, how do we not have research on this? And lo and behold, of course, vitamin D is very low, you know, and so most prenatal don't have enough vitamin D.

00:20:11:16 - 00:20:40:28

I didn't take enough vitamin D, I didn't know about my H4. Back when I got pregnant, I was on a very high dose of folic acid. And my kids both are unfortunately Antifa. And you know, they they cannot methyl light very well. DHEA was very low in these couples. Iron was low. It wasn't calcium. So a lot of times I'm educating my moms because I know some nutritionists out there are very big on taking calcium, calcium, calcium.

00:20:41:00 - 00:21:13:02

Dr. Afrouz Demeri

But I would say calcium is not something you need to supplement with. You should be getting your calcium from food. Vitamin K was low, folate was low. So these things, yes, are very important in the right place at the right therapeutic form to be taken in a prenatal. But what's interesting, the data also shows that just because you're taking something and let's say mom's levels look good, that doesn't always mean that it's going to make it through you, through the placenta and into the baby.

00:21:13:02 - 00:21:32:13

Dr. Afrouz Demeri

And so that's something that when I was pregnant, I remember thinking my mom would say, I Persian. Oh, don't worry, she'll just take whatever she needs. You know, you're going to be the one that's deficient. And so when I was, you know, vomiting for the first three months, which also has been linked to sperm, now, you know, I was like, it's okay.

00:21:32:13 - 00:21:53:07

Dr. Afrouz Demeri

She's getting everything she needs from me. I'll just become deficient and I'll sacrifice myself. That's what women do. That's fine. But the data shows now that it's important, you don't want to just stop birth control pills and take a prenatal and get pregnant often that those stores or the mom will actually use it for herself first, then the placenta, then the baby.

00:21:53:07 - 00:22:18:06

Dr. Afrouz Demeri

So I think nutrient status in both men and women is so important. And supplementation is really to supplement because we cannot get this stuff enough rancid, with the microbiome

and our low stomach acids and stress and the environmental toxins and too much body fat

and liver health that is, you know, out the door because it's so burdened.

00:22:18:08 - 00:22:36:04

Dr. Afrouz Demeri

We do need to supplement. And it's important, you know, that you're taking a good prenatal. And that's why I was so excited when they approached me. By the way, I am not I have no affiliation with them. So if people buy it or not, I don't get anything. I was just so

happy to create something and help figure out this is how much food it's needed.

00:22:36:04 - 00:22:59:14

Dr. Afrouz Demeri

We need this much vitamin D, we need copper for iron to become bioavailable and recycled. You can't just take iron and zinc on its own. Zinc is going to be. It's so important for fertility. But copper is what recycles iron, and iron is often recycled. We don't have usually a true anemia as. And if we do, we need to figure out why.

00:22:59:16 - 00:23:23:13

Dr. Afrouz Demeri

And so I'm biased because I helped formulated by I formulated it because I wish there was something like this out there when I was pregnant. You know, it's something I take now. I take it from my hair. I always say people who are trying to get pregnant typically, hopefully are the healthiest. So things that I get it for them usually are in the best forms, the best kind of B12 and folate.

00:23:23:15 - 00:23:38:11

So it's something I say it's a really good multi especially. They're also, visual, I take it from my brain health, you know, because we care so much about the baby's brain and their eyes. But then as soon as they're done, we just stop, you know.

00:23:38:13 - 00:23:53:10

Dr. Jaclyn Smeaton

Right. Yeah. It's great to continue that. And really, any cycling female who's having a menstrual bleed would benefit from a prenatal vitamin as a style of vitamin, because it has the iron and a wide variety of other nutrients. Yeah. Okay. Can you talk a bit about choline as well?

00:23:53:13 - 00:24:11:23

Dr. Afrouz Demeri

Yes. So choline is something that I don't think any prenatal back when I was taking prenatal s had it in there, fast acetylcholine a lot of people have heard about you know, we know that's really important for the brain. And choline is something that often people will just think they'll just eat eggs and they'll get it from there.

00:24:11:23 - 00:24:41:24

Dr. Afrouz Demeri

But we put 400mg in here because that is what's actually recommended. And believe it or not, that that's an actual recommendation for fertility, for prenatal also, except no one is getting that from eggs. So super important for brain. The brain function of the baby and mom. And, this is this is, I think, one of the only prenatal that I know there are, but we were the first, at least to put 400mg of Colleen in there.

00:24:41:26 - 00:25:09:27

Dr. Jaclyn Smeaton

Yeah. You know, having experience in the supplement market and, like, interest in this product area, it is unusual to see it. I mean, even more than 50mg of Colleen because

Colleen is typically added to a prenatal. So you might see it on the list, but it'll usually be like 25 or 50mg. But you're right, you need hundreds. And you can tell how recently a formula was updated by whether or not the choline is sufficient because that research is quite new.

00:25:09:29 - 00:25:25:17

Dr. Jaclyn Smeaton

So it's really definitely a critical, critically important nutrient, that I always recommend people check their prenatal for. Yeah. And I love that vitamin D you mentioned as well because again, most prenatal, excuse me, have only a low amount of vitamin D where we know most people. That's not enough to achieve sufficiency.

00:25:25:17 - 00:25:53:04

Dr. Afrouz Demeri

And that's probably the most important thing I think. And in my fertility journey, I've figured out that the most important thing I want couples, at least moms, to optimize for the future of that child and future. I'm thinking in their 20s, 30s, 40s, 5060s is their immune health and when that is the wealth of your family, is how strong your immune system is and the immune system of your kids.

00:25:53:06 - 00:26:21:05

Dr. Afrouz Demeri

And I mean, we saw this with Covid, there will be things that come and just wipe people out. You know, it's like survival of the fittest. And that starts with your gut health. We know we do know that the microbiome is not just in your gut. It's everywhere. Different microbiomes. And so I get parents to because I find right now, like everyone is so worried and stressed since Covid and they're like Lysol ING everything and no one gets dirty and everything is just perfect and clean.

00:26:21:08 - 00:26:45:22

And, you know, people are so worried about getting sick, they're so worried about, yeah, having a cold or flu or, anything, anything and everything. And that fear has also shown to change the microbiome. That's stressor. And so that's why going back to the DUTCH tests, it's important to see cortisol because if it's too low or if it's too high.

00:26:45:22 - 00:27:10:19

Dr. Afrouz Demeri

And it's interesting because I think I've been told by the DUTCH people that I've done the most DUTCH tests in history since 20 15,000. Most people are so worried about high cortisol, but that's not what I've seen. And so, I think it's really important to measure these things, to understand yourself, not to, again, just lower it or increase it, but to the.

00:27:10:21 - 00:27:34:13

Dr. Afrouz Demeri

Interesting. I thought I would have had really high. I feel so, you know, wired or tired or adrenaline that I had. Makes sense. I'm so exhausted and not having that resilience as a mother to be or a father to be, and how that impacts your microbiome and how that impacts the immune system of the baby that now you're going to have to figure out, are you going to vaccinate?

00:27:34:13 - 00:28:04:20

Dr. Afrouz Demeri

Are you going to do all of them? When are you going to do them? What's going to happen with that first fever? Because I see, you know, the moms coming in. And 20 years ago I didn't see as many issues with kids as I do now. You know, it's it's it's quite scary. And often parents are worried, you know, they know someone who had a kid, with pandas or Aspergers or autism and, you know, they're having their third or fourth and they're worried, you know, these are things that we do have to we have to optimize this.

00:28:04:20 - 00:28:44:29

This has to become mainstream. It has to get taught in schools where you're not just educated on sex education, and that's it. And you know how to prevent. We have to start talking about this to kids so that they know. So I have a 12 year old boy that that pew puberty years and what they eat, their lifestyle, what they're putting in their body is so important later because he doesn't care about having kids right now, you know, but at least educating the parents to say this is a critical time for later on in their life when they become dads, you know, and even all the birth control pills and everything that's given to girls

00:28:44:29 - 00:29:05:23

Dr. Afrouz Demeri

nowadays and how, you know, what can we control? I know we don't have the Teflon and hopefully all the cookware and all that's cleaned, but our parents did so right. Our burden is already I say our cup is like half full, you know, because my grandmother I know used it and I know my mom had it. And so yes, we do need to do things differently.

00:29:05:23 - 00:29:26:27

Dr. Afrouz Demeri

And people will say, oh, you know, I need to detox. You don't need to do anything. Our body does everything for us. No it can't. Our environment is not the way our grandmothers and their grandmothers had it. So it is a little scary if you look at the stats. And I usually don't talk about those, especially to patients, because it's like, okay, I'm not sure if my kids, kids are going to be able to have kids.

00:29:27:00 - 00:29:49:00

Dr. Afrouz Demeri

I'm not sure where my son is going to end up being with his, you know, sperm. But as a natural mom, this is the stuff I talk to them about. You know, they are reading labels. When they were 4 or 5, my son was saying, this has this much carbon hydrates, you know, and it's good to educate, just from a perspective of you learn about science, you learn about mitochondria.

00:29:49:00 - 00:29:53:28

Dr. Afrouz Demeri

Well, do you want to learn about what affects the mitochondria? You know, that's right.

00:29:54:01 - 00:30:12:06

Dr. Jaclyn Smeaton

Yeah. It's interesting. I have three teenage boys. They're 13, 15, 16 and then two younger children. But we found out recently because we were asking our boys like, why don't you have friends over the house more often? And they said, well, can we be honest with you, mom? Yeah. And they said, you have really terrible snacks. Yeah. None of my friends want to eat the snacks at our house.

00:30:12:06 - 00:30:31:05

Dr. Jaclyn Smeaton

Like no one wants Greek yogurt. We want cheese. That's our chips. And I was like, oh, you know. Yeah, let's just think about the social implications of a healthy diet. But that period, you're right. A lot of people don't know that that pre pubertal slow growth period is so critical for boys in particular. Not so much for females.

00:30:31:07 - 00:30:48:27

Dr. Jaclyn Smeaton

When it comes to the impact on their testicular health as adults. And it's a really interesting time period when it comes to epigenetic imprinting. Men and women are males, and females have different times with highest risk, like for females. That's what perinatal in the womb. And then.

00:30:49:01 - 00:30:49:11

Dr. Afrouz Demeri

For.

00:30:49:11 - 00:30:50:04

Dr. Jaclyn Smeaton

Conception.

00:30:50:08 - 00:31:19:00

Dr. Afrouz Demeri

Which I didn't even know I was pregnant, you know off. Yeah. Women don't know and right. Everything is not everything, but almost everything is done. That's right, I find out. Oh, I'm pregnant. And then women start changing things and so. And 50% like are unexpected. Unexpected. So it's really important to educate girls, especially when they're in their teenage years in case there are those oopses, you know, that, you know, you did everything as best as you could, you know.

00:31:19:03 - 00:31:19:26

Dr. Afrouz Demeri

Yes. What we.

00:31:19:27 - 00:31:34:24

Dr. Jaclyn Smeaton

Want. Yeah. And then with with males one of them is that pre pubertal period, which when you think about the health of the next generation being entrusted to 12 year olds, we better find a way to make like ramen noodles more nutritious because otherwise we're in trouble.

00:31:35:01 - 00:31:58:16

Dr. Afrouz Demeri

Yeah absolutely. We're just educating them on like, electronics and you know. Yeah, naps. And you know, we were measuring we had our Tesla and we were wondering because, you know, there's a lot of testicles sitting on heated batteries for a long time. And I was having a

lot of like, you know, my, my give legacy. I would ask them like, hey, I've noticed, have you guys done any studies?

00:31:58:16 - 00:32:11:19

Dr. Afrouz Demeri

Because I have my male Tesla drivers and, you know, and I'm looking at their, motility more than anything, being slowly slowed down. And so we bought all these gadgets and we were measuring our car in different locations and the.

00:32:11:19 - 00:32:12:14

Dr. Jaclyn Smeaton

Ones you find.

00:32:12:19 - 00:32:16:18

Dr. Afrouz Demeri

So actually, I didn't find it to be too bad, which I was surprised. That's good.

00:32:16:24 - 00:32:19:02

Dr. Jaclyn Smeaton

I was like, I had never thought about that before.

00:32:19:04 - 00:32:39:10

Dr. Afrouz Demeri

Yeah, I had heard a lot of NDEs. Talk about it being really bad for sperm. You know, my husband's testosterone was too high, and so I was like, Interesting. But that doesn't always mean that sperm is going to be impacted. But I've seen many men with low T who are going to Tesla drivers, and I was curious.

00:32:39:10 - 00:32:58:02

Dr. Afrouz Demeri

So I don't think we can I mean, this is at any cost one of my tests. Right. But they they can be I mean that's just a Tesla and I don't know I don't know if it takes the battery is longer and older it gets. But these are things that we need to really think about because it's so sensitive to the environment.

00:32:58:02 - 00:33:05:18

Dr. Afrouz Demeri

It's outside the body. That's right. And that's why you need millions. Because so many of them are so sensitive that they die.

00:33:05:18 - 00:33:06:18

Dr. Jaclyn Smeaton

You know. That's right.

00:33:06:20 - 00:33:24:25

Dr. Afrouz Demeri

And, they're small versus eggs. And air quality is so important. I know you were talking about men's sperm and and how it's linked to their mortality and all these other things that we're seeing that no one's ever thought about. Because I know my husband when I tell him this, or I'm writing a book right now on this, he's like, oh, we don't want to have more kids.

00:33:24:25 - 00:33:32:23

Dr. Afrouz Demeri

I'm like, this is your longevity. This is your health. You know, maybe one day it'll be like a biomarker screening test.

00:33:32:23 - 00:33:50:28

Dr. Jaclyn Smeaton

Just absolutely. I mean, that's been suggested because it is so sensitive and it's a downstream measurable that takes into account all the factors of your exposure. It really is a pure it's curious. We're like, I've thought about that. Should every man 30 and up have a semen analysis every five years or two years or whatever?

00:33:51:03 - 00:34:07:21

Dr. Afrouz Demeri

Honestly, I think that would that would tell me a lot because guys also always think that they're doing, you know, they'll say, oh, I eat well, I'm good. I'm exercising some. They're over exercising, they're overdoing it, and it's having a stressful response. So yeah.

00:34:07:23 - 00:34:19:17

Dr. Jaclyn Smeaton

Yeah. Yeah. So interesting. Well, I want to talk a little bit more about male fertility. Yeah. And really, one of the things that I want to talk about, you know, tying this in with is when we look at fertility, of course, we care a lot about female hormone balance.

00:34:19:18 - 00:34:20:00

Dr. Afrouz Demeri

Yes.

00:34:20:00 - 00:34:28:08

Dr. Jaclyn Smeaton

Tell me a little bit about what we think about with male hormone balance and fertility. What matters? Does it matter as much as females? What should we be thinking about or looking at?

00:34:28:11 - 00:34:49:11

Dr. Afrouz Demeri

Yeah, I think what most people don't realize is, yes, testosterone is important for growing the gonads and growing a lot of things, but it's actually FSH that matures the sperm. And so your talent has a lot to do with this follicle stimulating hormone, which most menopausal women get tested. But I love running a FSH on men through blood.

00:34:49:11 - 00:35:18:13

Dr. Afrouz Demeri

And LH. So these are two that we are looking at from this level prolactin. Believe it or not, in 11% of men who are infertile has been shown to be also just like we see in women an issue. So that's something I might add on, thyroid hormone, which I think everyone should get tested. I've seen men with Hashimoto's with their TPO elevated, and I think that's important to address, just like we would for miscarriage prevention in women.

00:35:18:15 - 00:35:40:28

Dr. Afrouz Demeri

And there's data showing that, you know, going on thyroid hormone replacement can help. Same thing with men. Estradiol estradiol. It is also super important. We always think of that as a female hormone. But that is very important for the maturation of the sperm. And then we need to have enough for also libido. So I love the DUTCH test.

00:35:40:28 - 00:36:03:19

Dr. Afrouz Demeri

And one of the fortunate things that I was able to do at UCI in the years that I was there, was everyone's blood, work was covered through insurance. I always ran a gamut of blood tests, and then they would do the DUTCH tests at the same time. So I got to see. So I worked a lot with the conventional endocrinologist who were a bit more, you know, didn't believe in anything else but serum.

00:36:03:22 - 00:36:25:20

Dr. Afrouz Demeri

So I kind of had to prove myself and say, look, you know, it's very similar and it's useful information and it's looking at metabolites that I can't get. So it's so I'm seeing now with my men. This gives me the full picture of why something could be off. You know, is it because of the oxidative stress that we see is elevated?

00:36:25:20 - 00:36:45:08

Dr. Afrouz Demeri

Is it because glutathione? Is it because B6 is low? Is it because their melatonin is low, which is important? Also for men as well. So I love the DUTCH because of that testosterone. And now I know it's changed a lot there. We've got the five alpha reductase at the top too. Which also can show me the androgen metabolism.

00:36:45:08 - 00:37:07:15

Dr. Afrouz Demeri

You know, but just having that baseline testing, I think for men, even if they're not trying to conceive, is so important because men typically like to see something, you know, it's like they'll even bring me a Excel sheet, something like, you know, values over the month and how it's changed with what they've done, especially the engineers out there.

00:37:07:18 - 00:37:22:26

Dr. Afrouz Demeri

But yeah, I love seeing the aromatase and the alpha reductase activity and then just all the other biomarkers that are on there. And I'm sure every year they're just expanding, such as just always surprising us have been with them forever, which is nice.

00:37:23:00 - 00:37:25:20

Dr. Jaclyn Smeaton

Always looking at new things that's for sure. Yeah.

00:37:25:20 - 00:37:39:28

Dr. Afrouz Demeri

Yeah. So I would say the other ones would be lh fsh prolactin, tsc h what am I missing? Testosterone. And then I like to always add in crp and homocysteine.

00:37:40:00 - 00:37:41:18

Dr. Jaclyn Smeaton

Those are, those are inflammation markers.

00:37:41:18 - 00:38:02:02

Dr. Afrouz Demeri

Yeah. And commission markers at UCI. It was nice because I was able to add in il6 and, TNF alpha and other, you know, hallmark inflammation markers and see how their diet would change. And so that's that was what was nice is here, just do this for three weeks and let's see what it changes. You know. And that can.

00:38:02:02 - 00:38:10:29

Dr. Jaclyn Smeaton

Be so motivating. And that's like one of the pieces. But some labs that aren't insurance covered can still add value if it helps provide feedback to the patient that they're on the right track.

00:38:11:02 - 00:38:40:05

Dr. Afrouz Demeri

Yes, yes. But I would say most often I see estradiol being too high in a lot of at least the population I'm seeing. Whether they're the beer drinkers or, you know, just the late night

stress eating and figuring out why their testosterone is lower or going towards estrogen and what can we do but first before fixing it and, you know, lowering it or making them detox it out, I love to always just have a conversation so they understand.

00:38:40:05 - 00:39:01:10

Dr. Afrouz Demeri

They understand like what's happening with this hormone. You know, hormones are like but I always say like the little whispers, like someone's whispering and say, hey, we need to do this. But we have to understand why they're whispering that, you know, they're just the messengers, so we can't kill them and like, push them this way or that way is such a harmony that we have to look at the whole orchestra.

00:39:01:13 - 00:39:21:24

Dr. Afrouz Demeri

And having kids is helpful because often I find if they're emotional, if they're mad, if they're sad, I'm not trying to fix it and tell them, like, not to be mad and not to cry and try to understand and right. That's what the DUTCH does to me, really helps me get like a, a big picture from far back and then go, okay, interesting.

00:39:21:24 - 00:39:44:07

Dr. Afrouz Demeri

I found that this was low or a lot of times I'll see everything is low and if everything is low, then I'm wondering about nutritional status and what's what's not being fed and mitochondrial dysfunction. And you know, maybe they need more nitric oxide support through beets and things that they do and things they can do is, you know, that would help their blood pressure.

00:39:44:07 - 00:40:07:06

Also. It would also help because they're so hot. Often the men that are coming in there, they have a lot of internal heat and Chinese medicine, often from suppressed emotions, suppressed, suppressing everything in and being the fixer and the provider. And so that heat right is also not very good for the, for sperm. And so literally their temperature is, is high and they'll say that I feel hot.

00:40:07:09 - 00:40:28:27

Dr. Afrouz Demeri

And so, you know, things like beet juice or celery juice or things like cool cucumbers, yogurt, you know, changing their diet depending on their disposition versus if I have a guy who was pale and, you know, more on the cold side, their diet is going to be different. I'm not going to give them things. That's going to make them feel more low blood pressure and, you know, faint on me.

00:40:28:27 - 00:40:49:21

Dr. Afrouz Demeri

So yeah, just individualizing it after I do these tests can be really helpful because they feel empowered, they feel seen, they feel like this is just for me. Yeah. Of course, on top of the prenatal for men, which, by the way, is also a great multi because it's got the acetylcysteine, it's got the Co Q10 and it's got the acetyl l-carnitine.

00:40:49:24 - 00:41:08:00

Dr. Afrouz Demeri

And then I can add on top of that if I need something that I know they're not going to be able to get from food alone. You know often I find they have to be eating gallons of so many things to absorb and assimilate a lot of these things. So yeah, it doesn't work. The the doctors that I used to work with who would say, oh, they don't need all that.

00:41:08:00 - 00:41:26:19

They can just eat well. And I'm like, they do eat well, but our well is not really well anymore. Our food. That's right. Oh grow things. And I'm looking at this one like this. Tomatoes don't taste and I'm using organic soil and composting. But it's still it's still not that great you know. And I thought that was yeah that was.

00:41:26:20 - 00:41:43:22

Dr. Jaclyn Smeaton

The probably leaps and bounds above the conventional produce you find in the grocery store. I actually had a friend over that does all of her or get a gardening. And she asked me for a tomato. She made, like a sandwich and she plays the tomato, and she said, oh, I can't live. I don't know how you can eat this tomato, you know, I'll bring you some real tomatoes next time.

00:41:43:22 - 00:41:58:26

Dr. Jaclyn Smeaton

And it's just because we were short on it and they didn't have anything like any heirlooms at the store. It's just not quite in season yet. But you know that. And when you compare the home gardener to just conventionally grown produce, you can be making really great choices in the store and still not get the nutrition you think you're getting.

00:41:58:26 - 00:42:23:05

Dr. Afrouz Demeri

Yeah, I mean, I, I love going to Greece for just the tomatoes. The Greek salad tastes so different. And yeah, it's not necessarily always what we add to it. It is the whole concept of obstacles of cure. I think in Europe so many things are banned, you know, on in skin products and shampoos and things that we use here, the chemicals, you know, and so that goes into the water, it goes into the air, it gets into our food.

00:42:23:05 - 00:42:28:25

And so maybe that's why it tastes better is because of the things that are not using Kobe.

00:42:29:01 - 00:42:38:27

Dr. Jaclyn Smeaton

Now you talk you touched upon mitochondrial health and oxidative stress. Can you speak about the like what those are? Maybe, first of all, if listeners are new to that concept and why they're important for male fertility.

00:42:39:05 - 00:43:02:22

Dr. Afrouz Demeri

Yeah. So the way I describe this to my kids, because my daughter not having an X chromosome, that's where all our mitochondria come from. So from a very young age, I had to figure out how am I going to optimize her. These little fuel boxes of her cells, like give her energy, you know, because she already was born without half of what other girls have.

00:43:02:24 - 00:43:24:08

Dr. Afrouz Demeri

And so I did a lot of digging in into the research of what feeds the mitochondria, which is where most of the research comes from, like CoQ10 and things like that. But then I thought, wait a second. A lot of patients that I see in practice who had fibromyalgia, chronic fatigue syndrome, or just poor sperm, is it that the mitochondria is like getting fed?

00:43:24:08 - 00:43:46:21

Dr. Afrouz Demeri

Or is it that it's broken and it's damaged and we are not making new ones? And so I was looking at some data on chronic fatigue syndrome of fibromyalgia patients and seeing what they were using to help them. And there was a great product. If I can mention product, it's of course ATP fueled by Research nutritionals, which had great results.

00:43:46:21 - 00:44:11:08

Dr. Afrouz Demeri

And so I started using, you know, ways to help upcycle, recycle and just regenerate new mitochondria and not just feed them. But that's something that I might look out for. My male fertility is antioxidants to help. So what can we do to feed them? But if I find that they've had a lot of viruses like cytomegalovirus, herpes virus, Epstein-Barr virus, you know, all the herpes family viruses.

00:44:11:08 - 00:44:35:14

Dr. Afrouz Demeri

And then they had we know with Covid where most people had no sperm. But just viruses in general can be very damaging. Right. And that's why it's so important to have in your staples things that help the mitochondria. So nutrition good nutrition foods. But sometimes we need supplementation. It's not enough. I know my husband was hit hard with Covid and it affected his memory.

00:44:35:17 - 00:45:03:02

Dr. Afrouz Demeri

You know like he wasn't the same. He would say things and I was like, you just told me that, you know, and he's had this long Covid. So I've been really working on his mitochondrial help. Or guys will say, like, you know, they get sore after they workout, you know, so there are lots of ways we don't have to do these advanced testing on mitochondria, which most clinicians don't have access to, but just symptoms, you know, just fatigue, especially after working out memory.

00:45:03:02 - 00:45:24:07

Dr. Afrouz Demeri

Mitochondria is everywhere. It's what we need to feel alive to have energy and it's our fuel. And so the antioxidant tests that we can do can help because that's what's going to feed the mitochondria, you know. And so I love the eight oh FDG test on the DUTCH test. That's one of the biomarkers I've been using for a long time.

00:45:24:09 - 00:45:46:12

Dr. Afrouz Demeri

But this great on have that. And then on the Boston heart test I usually would see the glue to fire and CoQ10 and, I love the Boston heart on my men too, because often they're worried about heart health. They're worried they got a lipid panel and they're wanting to take a statin, which destroys mitochondria. And I'm like, no, wait, let's figure out why your cholesterol is high first.

00:45:46:14 - 00:45:49:15

Dr. Afrouz Demeri

And so the Boston heart test is great for telling us if it's.

00:45:49:17 - 00:45:52:09

Dr. Jaclyn Smeaton

What's on the box. What do you remember? What markers are on the Boston?

00:45:52:09 - 00:46:19:07

Dr. Afrouz Demeri

Yeah, there's very long names, but there's four tests and two of them will tell you if it's a basically how talks to inhibitors work is it begins its production where the liver is making too much cholesterol or is it reabsorption which is a gut. And that's where food and fiber helps. And sometimes you see a statin, which helps the production go down is not needed because they are not older producers.

00:46:19:07 - 00:46:48:21

Dr. Afrouz Demeri

They're actually over absorbing and they're not pooping out the cholesterol. Yeah. So things like, burger mont and, you know, fiber and the microbiome and even dietary changes on

that person who's got high absorption would be optimal. Sometimes it's a mix. So they're genetically just over producers. And so you have that like I had an Asian woman very thin, you know, very low body fat percentage, at least viscerally.

00:46:48:21 - 00:47:11:17

Dr. Afrouz Demeri

Maybe there have been some, but not externally. And her cholesterol, her Ldl-c was 190. And so she was surprised and she was told, you know, that she needs to go vegan. And in her case, no, she was overproducing. It's it's kinetically and overproduced. So the Boston heart test can be very helpful. And figuring out why someone has high cholesterol and then want you to know the why.

00:47:11:20 - 00:47:34:26

Dr. Afrouz Demeri

What else is going on? What are the right hole sizes? Is it oxidized? Is inflammation there? And then we can do a carotid ultrasound and see is the plaque actually hard. Is it going to lodge. Is it is it open here before we jump in and stat. And so this brings me to a good point for fertility. I find often it's medications that men are taking.

00:47:34:29 - 00:47:55:07

Dr. Afrouz Demeri

Even just and it's even something they think is you know, it's over the counter or the Zyrtec or them, whatever they're doing, but they're doing an often and typically I say, and they and they'll say, my doctor said this was fine for fertility. Even women, you know, this one's okay. You know, there's no teratogenic effects. And I often keep it simple.

00:47:55:07 - 00:48:20:29

Dr. Afrouz Demeri

I say, if I wouldn't give this to my kid, you know, often it's probably their their liver is not going to be able to metabolize, but obviously it's a psychiatric drug or something that's very

serious. And you can't just suddenly stop it. This is a conception, this is the pre-conception time to see how can we optimize if I have symptoms, if I'm on meds, how can I see if there's alternatives, if there's other ways of addressing the root cause?

00:48:20:29 - 00:48:43:29

Dr. Afrouz Demeri

So I don't need to be on these maps because often they're mandating they're not fixing the reason why there was that imbalance to begin with. And so yes, that the test can tell us here's where you're at, okay. This is your assessment of your fertility but also just of your health. Here nutritional status, your antioxidant status a lot of it is outside the brain.

00:48:43:29 - 00:49:05:18

Dr. Afrouz Demeri

So norepinephrine and some of the neurotransmitters this is coming out through the kidneys in the urine. So it's not 100% that that's what's happening in your brain. But it can give us lots of clues. You know. And I think an experienced doctor, when they're listening to the symptoms, they're able to extract. Okay, there's a history, you know, of this man.

00:49:05:18 - 00:49:26:09

Dr. Afrouz Demeri

Often I'm finding so much information of just what happened to them in utero. What was your mom's health like when you. When she was pregnant with you? What number were you? You know, the first child often gets a lot of the mercury from mom. It goes back, and we had a lot of feelings. And really, the detoxification for mothers occur when they give birth.

00:49:26:09 - 00:49:33:09

Dr. Afrouz Demeri

That is one of the ways that we rid ourselves a lot. And so that first child is going to get a lot more than that. First, I hate.

00:49:33:09 - 00:49:35:04

Dr. Jaclyn Smeaton

Thinking about that, but you're so right.

00:49:35:04 - 00:49:54:24

Dr. Afrouz Demeri

But that's what I didn't know with my doctor. You know, I had so many feelings, and I was told that it was more dangerous to take them out than. So I left them all in. And when I measured my mercury levels in my blood, which should be zero in every one after I had had her, because I wanted to have another one.

00:49:54:24 - 00:50:17:14

Dr. Afrouz Demeri

But I was so terrified it was five. And yes, I mean, I would have sushi, but not that much, you know? And I really love tuna that much. And so these are the little things that we can test that are important. Heavy metals are important. You know, things that you don't want to look back once that child is made and go shoot, I wish I had done a.

00:50:17:14 - 00:50:19:07

Dr. Jaclyn Smeaton

Little wish I had, you know.

00:50:19:09 - 00:50:20:04

Dr. Afrouz Demeri

Because part of.

00:50:20:04 - 00:50:51:28

Dr. Jaclyn Smeaton

It is I think a lot of parents end up questioning like, should I have done more? Right?

Because we have the presence of so many childhood chronic illnesses now? Yeah, even things like childhood obesity can be linked back to preconception care. So it's about like how your metabolism responds to food you can feed to. And actually there's some really interesting mouse studies, epigenetic studies with the agouti mouse model where two moms that are genetically identical, these are mice fed exactly the same number of

calories of chow during the pregnancy and postpartum.

00:50:52:03 - 00:51:10:05

Dr. Jaclyn Smeaton

One mouse was given folic acid or folate. Maybe it was it was a methyl I think it was folic

acid and choline. The other one was not so had like methyl donors and not. And then when you look at the offspring, the mouse of the supplemented mom was a normal weight. And

actually the coat was brown, which is what it's supposed to be.

00:51:10:11 - 00:51:35:20

Dr. Jaclyn Smeaton

And the one without the folic acid and choline was obese and yellow, which is a disease state. It's like a diabetic mouse. And this was only 20 or 30 days after birth. And otherwise the mice had exactly the same environment. So it's really fascinating when you look at these mouse studies at just how impactful nutrition is in that preconception and perinatal

time, it's so, so impactful.

00:51:35:20 - 00:51:39:04

Dr. Jaclyn Smeaton

And for both both male and female partners for sure.

00:51:39:07 - 00:52:02:00

Yeah. So the healthy you're making me realize just it goes back to if we're being very scientific and anatomical, it really is that the wealth you pass on is the wealth and the health of that cell. Every cell of your body. And that's why we love sperm and eggs, because we are creating these things often, you know, and they're impacted.

00:52:02:02 - 00:52:20:28

Dr. Afrouz Demeri

So we can measure a lot. So that phospholipid bilayer, which is why it's so important that the shape of that cell is proper. And that layer has to do with fat. And how much good fat, healthy fats you're eating. But that's where the choline comes in, and that's where the EPA and DHEA and the fish oils come in, which everyone needs.

00:52:20:28 - 00:52:48:09

Dr. Afrouz Demeri

I mean, no one is eating enough fish skin, which is often polluted anyway. So you want to, you know, third party tested good. Cod liver oil is one of my favorite fish oils. You know, to get that retinol, to get that vitamin A, which is needed for iron to be absorbed for Condra. So, you know, my kids were on cod liver oil when they were young, and they you know, if moms are worried about taste, you just have to keep exposing.

00:52:48:09 - 00:53:09:28

Dr. Afrouz Demeri

They say, what, like 15 or 17 times. But trying to get their first food was liver. You know, because we're Persian, we eat a lot of liver. I know that's gross to a lot of my friends who don't eat liver, but liver is is just so full of nutrients and, bone broth and, you know, just lots of soups and stews and things that are just full of minerals.

00:53:09:28 - 00:53:31:24

Everything just leaches, hopefully good stuff into that liquid. It's easy to absorb. So for my fertility patients, often I say keep it simple, eat like ancestors, eat in season. You know, if it's really cold and it's winter, you know, you're probably hopefully not having like cucumbers and watermelon and too much salad. You know, it's just cooling and it's actually hard to digest salads.

00:53:31:25 - 00:54:06:07

Dr. Afrouz Demeri

You know, we don't give kids at six months or a year. Like here's a raw cauliflower, a raw broccoli, all lettuce raw. They would be very gassy and right uncomfortable. So just, you know, nutritionally keeping it like your grandmother and their grandmother, how did they eat. And making a fun getting creative in the kitchen, you know, and using this creating life in other aspects of life as well, whether your business your garden, a painting, something where that creative energy feels like it's fueling you, it's not just nutrients.

00:54:06:07 - 00:54:26:04

Dr. Afrouz Demeri

And my doctor said, I have to take an extra zinc and copper and this, this and this and all these pills, because that can cause stress and, you know, waiting for the result of that next sperm analysis to kind of get the go from me to say, okay, you're good to go. You know, it can take away the beauty of reproduction.

00:54:26:06 - 00:54:47:02

Dr. Jaclyn Smeaton

Yeah, absolutely. I want to ask you just a couple more questions, a little bit different. One of them is that we're seeing this big rise and like, testosterone replacement therapy in men, even young men who are looking to boost their testosterone. Have you seen that a lot in your practice? And what's the impact about of TRT on fertility?

00:54:47:06 - 00:55:10:04

Yeah, I think I attract pretty well versed. Women who probably have educated their men. Then they know that, you know, that negative feedback loop is not going to help. You know, I think if they are done having babies, then yes, they will be on TRT most often. I find they're on the DHEA, and trying to get their own body, or at least they've probably heard me speak about that.

00:55:10:04 - 00:55:31:28

Dr. Afrouz Demeri

I always prefer for my men and women to get their own body to make it, and if it's not making it, why is it stopped making it? And often in the men and the younger men, there is a stressor on the body that's making them not make it as much. Whether the stressor is real physiological, emotional stress or it's the stressor of nutrients being depleted.

00:55:32:01 - 00:55:48:04

Dr. Afrouz Demeri

You know, I find boron can help men. I've seen that used, and it helps. But most men that are trying to conceive are not coming to me on TRT. They already know that hopefully their urologist or someone has told them that that's not going to work.

00:55:48:06 - 00:56:09:11

Dr. Jaclyn Smeaton

Great. Yeah, great. And then what about everything that we've talked about today? Do you think any differently when a couple is going through IVF. And I think particularly like IVF about 30% of the time, maybe it's even higher now. They're using Icsi inter cytoplasmic sperm injection where they're the lab is selecting a sperm to penetrate an egg and fertilize artificially.

00:56:09:14 - 00:56:14:23

Dr. Jaclyn Smeaton

Do you think anything different about the suggestions that you give to men in that situation?

00:56:14:23 - 00:56:37:05

Dr. Afrouz Demeri

Yeah, I mean, I see a lot of egg freezing. I think that's grown huge on the rise. I prefer if the couple can conceive you, me or someone before the Icsi. So I have time to optimize that sperm that is still, going to go through that testing. And the other thing is, I always like to see a DNA fragmentation in tests.

00:56:37:05 - 00:56:49:27

Dr. Afrouz Demeri

Just like I said. We looked at the house, we looked at the foundation. I wish I had done that test or I had had access to that, you know, because that is something that we didn't have good tests back in the days. And so, yeah.

00:56:49:27 - 00:56:54:06

Dr. Jaclyn Smeaton

The the methodology was poor and it was really it had negative research around it for a very long.

00:56:54:06 - 00:57:20:22

Dr. Afrouz Demeri

Time. Yeah. But now I am seeing and there is research coming out saying that okay, men with poor parameters usually do have more DNA fragmentation. So just the quality of the sperm for those, you know, my patients I know watch the DUTCH podcast. But that would be a test I would do before Icsi, before IVF. I still want to optimize the egg and sperm as much as possible, especially in my women who are doing egg freezing.

00:57:20:22 - 00:57:38:27

And I can't tell you how heartbreaking it is when I have had the patient not know they had PCOS, not know that the air quality was not good, and they were like, oh, I had so many. And it was they said it was amazing. And now they find their life partner, they go through the IVF, they go through that and none of them take and it's it's devastating.

00:57:38:27 - 00:58:03:08

Dr. Afrouz Demeri

So it's even more important because now you are spending a lot of money, a lot of it's stressful on the body. It's stressful emotionally. It's not a natural process. So the environment also with implantation has to be optimized. I'm even more careful, with my IVF patients. I'm absolutely recommending acupuncture. I used to do acupuncture and Canada, on all my patients.

00:58:03:08 - 00:58:28:14

Dr. Afrouz Demeri

They have. And very, very, very important to do that. But often with implantation, if things are not flowing to the uterus, really important to increase nitric oxide precursor. So I might add in for the men and women, some citrulline and arginine and beads. Neo 40 is a product I use a lot. I love for heart health, but it's also really helpful for fertility.

00:58:28:14 - 00:58:49:21

Dr. Afrouz Demeri

And the main ingredient is beets. Just beets. But yeah, for IVF where I'm usually on top of it and I say, wait, give me a chance, let me work with your reproductive endocrinologist and let's have a good, good just feeling that this is going to be the best because we did the best on both ends. And not to chance.

00:58:49:23 - 00:58:56:14

Dr. Jaclyn Smeaton

Now I'm going to put you on the spot with the final question, because you surprised me by talking about DUTCH so much today, which was fabulous and I love it. I love talking about using.

00:58:56:15 - 00:58:58:09

Dr. Afrouz Demeri

It more than anyone else, apparently in the world.

00:58:58:09 - 00:59:12:07

Dr. Jaclyn Smeaton

I know. Well, this is why I'm asking you this question. Do you have any good stories or like patients that come to mind, fertility cases where they're results of the DUTCH test? Maybe surprised you, but were really important for that case?

00:59:12:09 - 00:59:40:26

Dr. Afrouz Demeri

No, it's. I have three men coming to this, and I actually title my assistant, pull their results list in case I had that to talk about something. About one of the cases I can think of at the top of my head. That was a a star. You know, one of one of your patients that will tell you they come in to see you and you feel a little flattered that they picked you because, you know, they're famous and you're surprised to find that it's the mail.

00:59:40:26 - 01:00:01:25

Dr. Afrouz Demeri

But online on social media and to the millions of their followers, that's not what they're saying, that it's the woman, you know. So in this case, I can think I did the DUTCH test on them. And the antioxidant level was very low in the men. And let me think what marker was there, because I thought that they needed a sperm analysis after that.

01:00:01:27 - 01:00:21:29

Dr. Afrouz Demeri

And they were like, oh no, I don't need a sperm analysis. And I was like, based on these parameters that I'm seeing, there's just it's probably poor sperm. And the agglutination was very high on this patient. And they were told that everything was normal. And I said, you know, could this be immune? And I seen all the biomarkers.

01:00:21:29 - 01:00:46:19

Dr. Afrouz Demeri

I didn't think it was immune related. So you know, steroids is which is typically used, which I don't really like for men. And so I just increased vitamin E, C and selenium. And we saw the ad alternation come down to zero. And they had a child. And it's so interesting that they didn't disclose to the world that it was because of this, but that it was the female that, you know, spiritual timing.

01:00:46:19 - 01:01:09:02

Dr. Afrouz Demeri

And it could have been, you know, but again, two things with this is the DUTCH helped me with the oxidative stress marker. That was very subtle. Make me made me think that I'm sure this is impacting sperm. And then to that, what you see online is not always the truth. And that men still have a hard time.

01:01:09:02 - 01:01:24:03

Dr. Afrouz Demeri

Or maybe it's a woman protecting, I don't know, but I thought that would have been a really good place to tell the world. Hey, like the reason we're we haven't been able to conceive was because of male factor, you know? But it's something that's still, I think, hard for people to talk more.

01:01:24:03 - 01:01:25:01

Dr. Jaclyn Smeaton

Of a stigma still.

01:01:25:01 - 01:01:54:13

Dr. Afrouz Demeri

Yeah. Yeah, yeah. Especially if you're, I guess very famous. I don't know, but I wanted people to know that because often they'll blame themselves. They'll think it's me. And a urologist told them that their sperm numbers looked good and everything was good. But they had missed that. Or I said, you know, like, if it's different than being sticky, if they're just all basically clumping together and there's not a lot of movement up to where we want it to go again, you ask why?

01:01:54:15 - 01:02:20:03

Dr. Afrouz Demeri

And. Right. You know, we could do more mark paint marker testing for vitamin C and E and selenium and see all these things inside a cell. But that's one that comes to the top of my head. Yeah, I've, I see a lot of high estrogens, that don't necessarily always cause male infertility. But to me, just like a woman who is, you know, very much relative estrogen dominant, it's going to have an impact.

01:02:20:05 - 01:02:41:01

Dr. Afrouz Demeri

And often that goes with other things, that goes with high fat body fat percentage, high toxicity, where all the fat is storing the toxins. And so it's it's nice because it gives me clues as to the whole picture. And then I can display it to them in that way so they understand what's happening. So yeah, I have hundreds of dogs.

01:02:41:03 - 01:02:52:11

Dr. Jaclyn Smeaton

Yeah. Wonderful. Well I for years it's been awesome to have you on the podcast. Thank you for your support and of our business, but also for your time today. Thank you. So it was really lovely to get the chance to speak with you.

01:02:52:13 - 01:02:54:07

Dr. Afrouz Demeri

Thank you. Thanks everyone.

01:02:54:10 - 01:03:04:22

Dr. Jaclyn Smeaton

If people want to learn more about you, I mean, when they can find the information that we need, all but the link in the show notes, where else can they find you? If they were interested in following you or connecting with you to join your practice?

01:03:04:22 - 01:03:26:19

Dr. Afrouz Demeri

Yeah, I just want to mention We Need has a free masterclass on fertility that's phenomenal. So they can go to natal.com/masterclass to that for that I'm just doctor to maricon just Google my name. I am on Instagram most of the time. I have a course called trimester zero and hopefully a book coming out soon on how to optimize your trimester zero.

01:03:26:21 - 01:03:47:00

Dr. Jaclyn Smeaton

Wonderful and thank you all for listening today to the DUTCH podcast. If you liked what you heard here and you want to learn more, you can also follow us on every social at DUTCH Test, or we encourage you to follow us and subscribe to our podcast. Anywhere that you stream our podcast. We release one every Tuesday and with that, we'll see you next Tuesday.

01:03:47:03 - 01:03:56:20

Dr. Jaclyn Smeaton

Thanks everyone! If you're wanting to learn and really expand your expertise in hormones, you're not going to want to miss our podcast. So make sure you tune in each and every week for our new content.