[00:00:00] **Dave:** You are listening to The Human Upgrade with Dave Asprey. Today is a special, I call them Upgrade Spotlight editions. And this is where I bring someone interesting who's done cool work in the world. They're making something, so a creator, something that saves you time, something that gives you more energy, improves how you show up in the world one way or another. So it's a very carefully curated list.

[00:00:25] So today we've got a renowned pharmacist, an author who specializes in glutathione, a core antioxidant in your body, has all kinds of functions, including in your skin. So this is a guy who holds the only patent on delivering glutathione through your skin called transdermal glutathione, and author of a book called The Glutathione Revolution. His name is Dr. Nayan Patel. Nayan, welcome to the show.

[00:00:54] Nayan: Glad to be here, Dave. Thank you for inviting me.

[00:00:58] **Dave:** I wanted to educate listeners about glutathione. It's something where if you go way back in time when I had heavy duty mold toxicity, I got some IV glutathione, some early really bad tasting liposomal, and it really helped me get my brain back. And when I travel, I'm all over this stuff. So what is important about glutathione? What do we know today we didn't know 20 years ago?

[00:01:23] **Nayan:** We knew 20 years ago that glutathione was important to us, but what we did not know is how can we deliver to a body effectively? We were injecting IVs, we were taking the liposomal form of glutathione, and it was actually improving levels but not the reason we think the way it was. We thought it was absorbing correctly because we were infusing into the blood. If you're taking by mouth, it was absorbing slowly, and we are seeing the results.

[00:01:52] But in actuality, it was not absorbing at all. It was breaking down the glutathione and the amino acids that were created were reabsorbing, and they were recreating those glutathione back into a system using those amino acids. So it was working, no doubt about it, but not the reason we thought it was for or by, by merely absorbing slowly.

[00:02:16] Now we know that it was not absorbing at all. It was actually breaking down and reconstructing again. But now we have a technology. We have a technology that can change that whole process and don't have to depend on body to absorb it. Keep in mind, the last 15 years ago, we were not doing gene testing. Now we are doing so much gene testing. We are finding out

people have all these mutations that their body is not able to reconstruct or deconstruct glutathione. Then what happens?

[00:02:48] **Dave:** Wow. Okay. So how many people in the population have a hard time either making or recycling glutathione?

[00:02:57] **Nayan:** Well, we have a very small database right now. For the last 15 years, what we have found out that people have those gene mutations, they're roughly about 20, 25%. It's actually a big number, but at the same time, on the flip side, 70, 75% of the people have no issues. They can take glutathione, whatever forms they want to take it and still get benefit out of it.

[00:03:19] **Dave:** Mm. I find that I have problems with sulfur metabolism because of my COMT genes. So even though I probably shouldn't have too much sulfur, I also could sometimes not have enough. And I've taken things like MSM, which is a thing that can help because it has extra sulfur in it. Even collagen is a high sulfur protein. And glutathione's high sulfur. Can you talk to me about sulfur versus glutathione and how would you know that you need more glutathione?

[00:03:48] **Nayan:** Oh boy. You are right. If somebody has a gene defect, what you'd expect with COMT, those patient populations will definitely benefit from some sort of glutathione formulations. But the simple test today is you can do a blood test and literally check your RBC levels of glutathione.

[00:04:10] If you measure whole blood, what we do know is the whole blood level of glutathione is actually, not good for us because what we are measuring is both plasma and the red blood cells. The plasma levels of glutathione has a very short life in your body, so it's about 14, 15 minutes.

[00:04:27] So it's not a true test of your true glutathione levels. We measure the RBC levels, I think you'll get true levels of glutathione in the RBCs. And we can do those testing. In fact, we are working on test kits right now where we'll be able to do at-home test kits for glutathione. It's not ready yet, but we are working on that right now because as you might know with the lab testing, it takes a long time to get FDA approval, but once we have that we'll be able to measure blood spot tests at home and check your levels of glutathione at home.

[00:04:58] **Dave:** Wow. So no one has that yet. Interesting. I've seen some glutathione. I've seen it measured in labs. So far it's not red blood cell though. What are they measuring? Plasma?

[00:05:09] **Nayan:** Whole blood. They're measuring whole blood, usually.

[00:05:11] **Dave:** What's the difference between red blood cells versus whole blood glutathione?

[00:05:15] **Nayan:** So the whole blood is plasma and the red blood cells. The plasma half-life is very short. So when we want to measure glutathione, we spin the blood, take the plasma out, and just measure the red blood cells. If we just measure, that part has a little bit longer life in your body, so it gives you a little bit better marker as to what your body levels are.

[00:05:39] **Dave:** Okay. What are the times of day that someone would want to use glutathione?

[00:05:43] **Nayan:** So the glutathione is actually used-- from external sources, the life is very short. The best product that we have in our market that we have right now, it stays in a body anywhere from four to six hours, eight hours. If we've repeated use, make it to 12 hours. So if you're using it, twice a day would be ideal. Most of the people will use it twice a day, morning and evening.

[00:06:09] **Dave:** Okay. Morning, evening. What is the best way to use it? And this is something that if people saw the last podcast that they might have picked up on. But this is groundbreaking stuff. So I'm going to give a little bit of history before you answer that. We talked earlier about stinky, bad breath, rotten eggs, liposomal. We talked about IV and just precursors and taking vitamin C.

[00:06:37] There's all kinds of different ways that I've tried like that, and almost any of them I notice if I'm flying, I have less jet lag, or if I have a toxic thing, I have less dark circles and things like that, or less acne or something because of the toxin effect. But I don't know how to stack rank, which ones work better, which ones get glutathione into my cells, or my brain, or my liver. So what is the best way that you have found for people to get their levels in a way that works systemically?

[00:07:10] **Nayan:** So Dave, I'm biased because I have a product now, so it is the best. But again, I've made liposome technology products in the past. I used to make the IV glutathione for 20 years plus, and I stopped making all those products when I discovered the topical version of the

glutathione 15 years ago. It took me 12 years before I launched the product to the open public because I had to make sure that it was not just better than the other products out there, it is far more superior than anything that's out in the market today. So after my research, today we do know that topical absorption of glutathione is there. It is proven. We have done human trials on that to back it up, and it is by far the best technology that we have today to deliver glutathione completely intact without getting denatured, and your body has to reconstruct them again. So yeah, topical absorption, skin absorption is probably the best we have today.

[00:08:15] **Dave:** Got it. In the autism community where I've given talks, and a lot of people maybe missed that part of my story, but I had Asperger's syndrome when I was younger until I was about, actually, 30. I really started getting in, and I got rid of the toxins and all that. So I understand some of the felt sense of it as well as the biological pathways trying to fix my own brain.

[00:08:42] And in the autism community, people have been talking about transdermal glutathione for a long time with the problem being it was really greasy. They need a lot of it, and the last thing you want is a 4-year-old kid, whether they're on the spectrum or not, covered in greasy stuff, rubbing against your couch.

[00:09:01] So it was a pretty extreme use case when they would do it. And what you've done now is very different. Explain what Auro does that doesn't exist in the glutathione world. And then I want to zoom in on specifically skin and the longevity benefits there.

[00:09:19] **Nayan:** Got you. So what we have done, first of all, the technology is where we have taken the glutathione molecule, we put a chemical cap on the cysteine, which the odor of the sulfur comes in from cysteine molecule. We put a chemical cap on it where you can still smell the sulfur, you can see the sulfur, but it's not available to the air to get it oxidized.

[00:09:47] So it's like we put the first chemical cap and then we basically use polysaccharide molecules to actually stabilize the glutathione in such a way that it can deliver through your skin. It is very fast acting. You literally spray it on your body. You just put it on your body and rub it in for about a minute or two minutes, and it completely dries up.

[00:10:11] It gets sticky a little bit initially. It completely dries up, so there's no messy residue. There's nothing. There's no odor left. There's nothing left. Your skin becomes bone dry. Again,

one more time in about two minutes or so. And so that's the technology. So you don't have to worry about a 4-year-old kid. You're trying to use this product and have to worry about, is it going to be messy and smelly, and is it going to ring on for the rest of the day?

[00:10:35] **Dave:** So there's no sulfur smell at all once it absorbs.

[00:10:38] **Nayan:** Once it absorbs, there should not be any sulfur smell. So that's the best part. So you know that it's already inside your system. It's already inside your skin.

[00:10:47] **Dave:** Because it goes away. So I've used Auro glutathione for a while now because it actually does work. You can feel a difference. And I also use a variety of high-end stuff on my skin because I'm working on living to at least 180. Having a functioning barrier to the environment is a good idea.

[00:11:09] And collagen loss. If you look at the percentage of collagen loss over time, every year use 1% after age 40, if memory serves. So I'm like, if I'm going to live to 180, I'll have 17% of collagen on my skin left. So I would be like one of those African frogs where you can see their organs.

[00:11:26] I don't want to be like that when I age. So I put a bunch of stuff on, and I'll say, when I use Auro, I get the detox benefits, but there can be some sulfur leftover. I think my skin is saturated. So what I started doing is I'll just use a bit of rubbing alcohol on my thigh. I'll just rub my thigh with rubbing alcohol, then I put the Auro glutathione on, then it absorbs really easily because the skin's prepared for it. Is there a better way to prepare the skin to absorb glutathione even more?

[00:11:56] Nayan: So again, for me, I just apply different parts of the body.

[00:12:01] **Dave:** Okay, but you don't put lotion on your whole body.

[00:12:03] **Nayan:** I don't put lotion in the whole body, but I do put different parts of the body. But if you're looking for the skin benefits, for the facial benefits, we have a protocol that we use, which is the glutathione and a moisturizer in the evening, and a vitamin C serum and a moisturizer in the morning.

[00:12:22] And it's a four-product system that we develop for your whole skin benefits. If you're looking for collagen-- because the thing about it, the number of products sold for serums for your

face is vitamin C. And vitamin C, they claim as an antioxidant, but in reality, vitamin C is a prooxidant.

[00:12:44] How is it possible that at low dose vitamin C is an antioxidant and a high dose, which we use in IV treatments all the time, becomes a prooxidant? It doesn't have a dual chemical properties. It's not that smart of a molecule to have dual chemical properties. And the reason is because at low doses it activates oxidative glutathione in your skin and regenerates the glutathione.

[00:13:11] So the antioxidant benefits are actually coming from the glutathione, even though we are using vitamin C as a product on your face. So we have developed a whole different product for vitamin C at a higher concentration at 25% vitamin C because I want to get away from the antioxidant benefits of vitamin C into stimulating the collagen production under your skin. That can only happen if the concentration is much, much higher.

[00:13:45] **Dave:** So if you had to get a very high concentration in.

[00:13:47] Nayan: Yes.

[00:13:48] **Dave:** What would happen if I washed my face? So I'm a guy, and what guys typically do is we just take the same bar of soap that we washed our butt with. We assume that the soap forgot where it was, so we won't be embarrassed, and then we just wash our face with it. And then we look young and beautiful. And then our women companions have 17,000 bottles of various things that they do, and all this stuff, and it's like, don't they know the soap forgets? But regardless, I have learned from lots of friends in the industry that maybe soap is a bad idea for your face. So I use a cleanser because it's probably better.

[00:14:27] After the cleanser, can I take the Auro glutathione and just spritz my face with it and then put whatever moisturizer I have on, or is there a synergy between the stuff that you guys are making? Because I'm facing this problem that no guy usually has, where I have 10 bottles of stuff that people sent me to try and I'm like, how many things can I put on my face before I have a layer of moisturizer I could peel off my face and it would be weird? So help me out here. Can I spray Auro on if I'm lazy?

[00:14:56] **Nayan:** So you just said right now, first it's a cleansing part. You got to remove all the left oils and the dust particles, whatever. So you cleanse your face up first. It depends if it's day or night. If you are using at nighttime, we always recommend using the glutathione product, which I'll show you a picture of the bottle.

[00:15:16] It's the glutathione, the G serum. And this serum, actually, it's just glutathione by itself. During the daytime, your bodies are exposed to a lot of oxygen stress. So all we want to do is nullify all the Auro pieces in your skin. And once it's done that, we use the glutathione to do that part.

[00:15:39] And after that, we have this moisturizer made up, which is called Auro Skincare Rest and Repair. And what this has is the two main ingredients, is resveratrol and cycloastragenol. And as we know, cycloastragenol is a DNA repair to help telomeres and all those things.

[00:16:01] **Dave:** Let's talk about that for a minute. Guys, you know that I've been a longevity guy for 25 years. Wrote a big book about it, called Superhuman. And if you're new to the show, you should read Superhuman because it's got a lot of stuff in there about living a very long time. And it's actually the structure of how most longevity books are written now, is based on this. There's four things that'll kill you, and then seven or eight things that'll make you old.

[00:16:26] So let's address them in that order. And I write about cycloastragenol. I can never say it right, which is an extract of astragalus. But it takes about 45 pounds of astragalus to make this precious compound. You might know it as TA 65, where it used to cost \$7,000 a month to take the amount that will lengthen telomere.

[00:16:47] So if you're an aggressive longevity guy 15 years ago and you had seven grand a month, you would take the stuff, and maybe some people still do. They probably get results. I did take a very high dose of that for about two years. It was not TA 65. It was an extract from a generic manufacturer.

[00:17:04] I took very high doses, but it's about how do you get it into the body? And it turns out getting stuff in through the skin is oftentimes more effective than getting things in orally. So if you want to save money, smear your vitamins on your face. Maybe not the turmeric because you'll look funny. So there's an argument I would say for putting that very high-end ingredient in. What results do you see when they're using resveratrol plus cyclo-- I can never say it right.

[00:17:32] Nayan: Cycloastragenol.

[00:17:35] **Dave:** Cycloastragenol. And your glutathione molecule where you've modified the saccharides, that combination, what does it do? Do have clinical studies?

[00:17:43] **Nayan:** Yes, we do. Let me just go back one step behind to the Nobel Prize winner on telomeres activation or telomeres lengthening, and things like that. And now we have a compound that we have shown in studies that it can actually increase telomeres lengthening. But if you look at all the clinical trials, everyone shows one thing in common, that in order for the cycloastragenol to work, it has to combine with an antioxidant.

[00:18:13] And so the most powerful antioxidant, our body produces glutathione. When you combine them with the cycloastragenol together, this basically becomes cycloastragenol on steroids, or the benefits are exponential. You don't need a fancy camera. You can see the naked eye the results in less than one week. Some of the patients are seeing results in two weeks to four weeks. But I kid you not, we had patients that they had some spots on the face because of sun damage and you know that's oxidation under your skin. Those spots are literally gone in seven days.

[00:18:56] **Dave:** Wow.

[00:18:57] **Nayan:** So that's a very, very powerful way to do it. And the reason why it works, because the key is, yes, we can make all the products we want. Why and how does it work? Because if your skin is this thick of a layer, you have 7, 8 layers of a skin, we can put on the top of the skin the product, but if it goes all the way down to the bottom, now it works from the bottom and the top. So you're literally squeezing the response out double times. It's like burning the can both ends. Results are that much faster. And so we have done that with this combination at the nighttime routine. Of course, we have a separate daytime routine, but the nighttime, all you need is two products. We have the technology to combine a lot of these ingredients at a full concentration into one product. Now, you don't have to put on five different products on your face to get the same benefits.

[00:19:58] **Dave:** I'm pretty interested. And just full disclosure, I think you're a legit scientist. I enjoy chatting with you about nerdy stuff. And glutathione, it was one of the first supplements I introduced in the world of biohacking. It was like, charcoal and glutathione are the two that no

one talks about, followed by MCT oil and collagen, and things like that. So this is just important stuff.

[00:20:21] I can say I haven't tried that specific formula you're talking about. I'm hoping that you guys will send me some. So what I'm most interested in for listeners is just understanding transdermal delivery is likely more effective than IVs. And a glutathione IV these days is 200 to 600 bucks, depending on where you go.

[00:20:46] And maybe it's a little bit less as an add-on to some other drip, but it's a lot of money. And if you get a bottle of Auro, not just the face stuff, but if you get just the body spray, the other thing you can put anywhere, it's way less expensive, and it'll raise your levels as much as many IVs. So this blows IVs out of the water. Not to mention you don't need a nurse and blood and all that.

[00:21:12] After that, we're like, okay, there's a whole bunch of cool stuff that you can put on your skin. And you've got an interesting combination here that I think is really cool. So I will try the combination on the skin because some people are going to say, well, it's this one ingredient that matters.

[00:21:34] I believe that most of the world of biology, it's not one ingredient. You want to grow corn? Well, give it water. It needs dirt too, and sunlight. What did you know? It needs wind. It turns out if there's no motion of the air, most plants won't grow, or at least they won't grow effectively.

[00:21:54] So there's all these things that are important. So I think stacking the right things up to put them on your face or the rest of your body's cool. If I put it on my butt, will it tighten up loose skin? Because I've lost 100 pounds of fat and I've got rid of a lot of my loose skin, and I have great abs and stuff, but wondering, can you tighten things up for me there, doc?

[00:22:15] **Nayan:** Depends. If it's fine wrinkles-- I wish that was true, but yeah. Fine wrinkles are easier than coarse, if you've lost a hundred pounds, which I can't even imagine you 100 pounds heavier than what you are right now, but yeah, if we have 100 pounds, that skin, if it's elastic, is stretched out, that's very hard to bring it back to completely baby skin. But the fine wrinkles, crow's feet, things like that, those are relatively easier compared to something on your back or your rear that is like that. So sorry.

[00:22:55] Dave: Oh man. How about cellulite?

[00:22:58] **Nayan:** So cellulite, absolutely. I always say if you can somehow detox your liver, the cellulites will start getting lower and lower. It takes a little bit of time. And so I always say detoxing the liver will help your cellulite more than anything else. And glutathione absolutely is a powerful agent that can help you detoxify the liver. So we have seen cellulite reduction in a lot of our patients by applying to the thigh, to the belly area, things like that. So it just takes a little bit longer time than normal, but we have seen great results with that.

[00:23:40] **Dave:** So a potential, we'll call it fix for cellulite. The nature of cellulite too is that if you lose weight, you'll lose cellulite because there's fat in it. But if you increase collagen thickness under the skin and on the top of the skin, basically the skin is more tops, so you're not going to see the dimpling, right?

[00:24:02] Nayan: That's right. Yeah.

[00:24:00] **Dave:** And I don't actually have any cellulite anymore. I used to have a little bit on my butt, but I have about seven pounds of fat in my entire body, including my organs right now, which is probably too low. I'm adding more butter and more carbs, but I'm shockingly lean. It's unimaginable, to be perfectly honest.

[00:24:25] And a lot of this is recent shifts in nutrition that I'll chat about someday, where I've been testing some beliefs in the longevity community versus others. I'll release all that when I feel confident on it. The other one is I did do gene therapy. Guys, dave.com/genetherapy if you want to hear the episode about that.

[00:24:46] And I think that that probably resulted in 1% of the body fat loss. So I could say I don't have cellulite, but cellulite was a concern before. I never had a lot of it. And I have lots of women friends middle-aged who are always worried about it. Which of the Auro wellness products is the one that is most likely to reduce cellulite?

[00:25:09] **Nayan:** It's still the glutathione.

[00:25:11] **Dave:** Just a straight up glutathione?

[00:25:12] **Nayan:** Just a straight up glutathione.

[00:25:13] **Dave:** How many sprays on areas with glutathione? Do you saturate it? Just tell me how to use it.

[00:25:18] **Nayan:** So the G is a facial product that we have for the skincare. Two pumps of these ones is more than sufficient for the full face, and two pumps of the cream as a moisturizer for the full face. That should be more than sufficient, two pumps of each. When people buy the whole kit, the kit also has a vitamin C and the moisturizer.

[00:25:42] That plus the serum of the glutathione, the four-pack system is a full system for day and night, and it has anywhere from 7 to 8 ingredients at full concentration using your technology to deliver every single thing. I'm a guy. I don't if you noticed that, but I don't like to put too much creams on my face. What you said earlier, to peel the thing off, I can just imagine myself-- I have no hair, so I have no shampoo, no conditioner.

[00:26:13] So I put creams my full head, and my face, and my neck, and every single thing. It takes a lot of cream, and I don't like to put too much things. So I want to make it simple, from a guy's perspective. I want to make it simple. And I really later found out that my wife goes, hey, I don't want to put too much creams on my face either.

[00:26:32] Can you make something for me that is only one cream has all the ingredients inside? And I thought she enjoyed putting all these three or four different things on her face every single day. And she goes, no, I hate it. I hate it, but no other choice.

[00:26:48] **Dave:** So it's the one cream to rule them all.

[00:26:51] **Nayan:** The thing is we have the technology now. We didn't have the technology before. Now we have it. It's a proven technology that works with all these ingredients. And we talk about cellulite or the collagen production. We've known that vitamin C can help you with that one.

[00:27:07] The issue is every product that's in the market today, because the peach is so low, you cannot put high concentration vitamin C in any serum because otherwise it'll burn your skin off. Now that we have the technology that can disperse into your skin immediately, we can make 25, 50% of vitamin C very easily that gets into your skin, doesn't burn the skin at all, and still

stimulate collagen production under your skin. So now you can have a more even tone. And the fine wrinkles we saw literally gone in four weeks.

[00:27:44] **Dave:** Wow. That's insane. Okay. So this is what we're playing around with. Does it matter? Let's say you're 70 versus you're 30. What results do you see in very old skin versus young skin?

[00:28:00] **Nayan:** Young skin's a little bit harder because they have a lot more things going on. The results that we are on the older skin more than the younger skin. So 40, 50 and above, we are getting better results on those skin than we are getting results on a 30-year-old skin. The 30-year-old skin may need little bit more things or less things, but the 50-year-old skin is so much deprived of all these nutrients. They're just going to soak it up and just going to get the benefits much, much better for, visible benefits.

[00:28:32] **Dave:** I love it. This sounds really good to me. I have talked about other things on the show too. There's things with specific peptides in them that can have a beneficial effect. They're just beneficial by different pathways. Yeah, there's a whole bunch of stuff that probably is helpful.

[00:28:51] And so for people saying, well, which is the one you recommend, Dave, I'm just going to tell you straight up, I recommend the one that works for your skin. And will not say Auro is the only one you should use. I can say that it's very well designed by someone who clearly knows glutathione in and out and has really good clinical results.

[00:29:15] So this looks like one that meets the cut. So give it a shot, see how you look. It usually takes 60 days to really see a meaningful difference on any of these things. You said, though, people are seeing a difference in a week or two.

[00:29:29] **Nayan:** So we have seen results in one week. We have seen results in four weeks. All my clinical data is on one to four weeks.

[00:29:35] **Dave:** Wow. Okay. That's a pretty aggressive if you're seeing differences like that. So there you go. Try it for a month or two. And if you're like, wow, I look great, here's what you could do. You could keep doing it. Or you could say, I want to try something else, and then you

alternate. Because you know this one works, then you do this one in the morning and something else at night.

[00:29:52] And I'm sure Dr. Patel here doesn't like me saying that, but it's okay to do what your body wants you to do. And you may find this one works so well. You don't need to ever think about it again. And you do not want to be like me. I literally have six bottles of stuff on the counter sometimes.

[00:30:14] And when I was dating around, people come over and be like, dude, you use more product than I do? I'm like, no, I don't use it. I'm just trying it to see what I can talk about on the show because some of it smells bad, some of it doesn't work that well, and at all of it has to have science.

[00:30:27] And it's as hard as taking supplements to try and figure it out. You're like, oh, I'll put this on this arm and this on this arm. So because I'm testing stuff out. So I'll just say this. The spray that you have is very, very usable, and I'm really excited about the skincare stuff specifically.

[00:30:44] I was using the spray for systemic use because I think it beats IVs. And now you've got some other stuff, which is just interesting and cool. So I thank you for continuing just to I'll say, put your money where your mouth is in terms of invention. There are so many people out there who just make stuff because people will buy it, and you're like, let's make stuff because it's going to work really well.

[00:31:11] **Nayan:** Thing is for me, as a pharmacist, I get to discover things, make things every single day, and I don't want to make a product that is already out there or copy somebody else's formula. I want to create something that is a major paradigm shift in the industry. And it's about time to take the cosmetic industry by the horns because clients have been duped for so many decades, if not centuries, with products that actually is just a great marketing plot.

[00:31:45] And so for me, as a pharmacist, I want to make products that are actually delivering ingredients that we have known are beneficial to your skin. And so that's what we are here for. If somebody asks me, said, do you make all the other products cleansers and toner? I said, no, you can buy those anywhere else. They make a great product outside. Somebody else makes it. But

what I do is I make unique products that are actually a benefit your skin and for skin health. So that's what we're here for.

[00:32:13] **Dave:** Beautiful. I'm a big fan, and I love it when you have real science behind stuff. And just to be super clear, this isn't going to be the only thing I ever use on my face because of the nature of what I do for a living, but it's already something that I use. I actually don't put the spray on my face usually, but I can now that I know, and I'm going to try your cream as well.

[00:32:40] And I'll be rotating it around my body because I am a biohacker. And I am going to put it in my permanent set of things that I use because there's so much evidence for it. And if I, two years, decide, hey, something's changed, I'll tell you guys. But right now this is a breakthrough. And to not get IVs saves you so much money. Okay, here's 's a question for you. If you use Auro just on your face, do you get a systemic benefit?

[00:33:14] **Nayan:** Depends on which products you're using. If using the spray, for sure. By all means, yes. If using a cosmetic product-- so with the technology that we have, we can decide how far you want to go inside your body.

[00:33:30] **Dave:** Oh wow.

[00:33:31] **Nayan:** Yeah. So we can keep it localized benefits for your skin because why distribute through throughout the whole body when your help is right on your face? So we have designed the skincare product to actually benefit all your skin conditions. So you can get dual effects, by the way. So what you are using, the gluteal spray, those are going deeper.

[00:34:00] **Dave:** Okay. I like it. So probably if you're hardcore glutathione user like me, can you spray your face first and then put creams on?

[00:34:09] Nayan: Yeah, absolutely. You'll get a set to try it on, for sure.

[00:34:14] **Dave:** Here's what I want you to make for everyone listening. I want you to make a cream that I can just smear on my face and on my neck and maybe chest, although guys don't have to worry about our chest because we have different skin on our chest than women. Women basically have the thinnest skin on their chest, so they're always worried about that.

[00:34:30] But I just want to smear on, and I want to get youthful skin and a whole body dose of glutathione that's like equal to an IV, so then I just don't have to worry about it. Can you do that for me?

[00:34:44] **Nayan:** Done.

[00:34:45] **Dave:** All right.

[00:34:47] **Nayan:** Done.

[00:34:47] **Dave:** Excellent. Now, here's the next one. This is going to be a tough one. You mentioned that you don't have any hair.

[00:34:53] **Nayan:** No.

[00:34:53] **Dave:** Are you like Bryan Johnson who removes all of your body hair with a laser just to look cool?

[00:35:00] **Nayan:** Kind of. Just my upper body. Just my upper body. Because I applied glutathione every single day and I had to look for a non-hairy area. And so I have my arms and my belly completely shaved off.

[00:35:13] **Dave:** You know what? I'm totally with you there. I interviewed him, and we talked about it. We're both longevity guys. He's had laser removal of all the hair on his body except for his eyebrows and head. That would be a little unusual, but I use electrodes on my body a lot, and I use creams.

[00:35:35] And if you have hair everywhere, it's just not a good thing. Women are like, what are you talking about? It's not a problem. No, it's a problem. If you have oil or cream and it's-- I have the caveman gene for very little body hair anyway, but even then I have enough, then it's like, ugh. So yeah.

[00:35:51] A little bit of hair removal there, good idea if you're going to use transdermal delivery systems. But that wasn't where I was going with it. I was actually going to ask about hair growth and glutathione because one of the reasons that we lose our hair is certainly there's a DHT testosterone effect.

[00:36:12] Glutathione probably won't affect that very much. But the other one is mitochondrial dysfunction. In fact, it's the largest one. And glutathione is at the core of mitochondria. If I were to take Auro and put it in on my scalp, what's going to happen?

[00:36:26] **Nayan:** So again, it doesn't have to be applied on the scalp itself. If it's going to benefit the mitochondria, you can apply on the arms, on your belly, or someplace else. It'll do the similar effects. But yes, it can help with hormone metabolites. Glutathione has shown to improve exclusion of hormone metabolites, especially estrogens and testosterone metabolites, which are toxic to the liver.

[00:36:53] But it does not remove the DHT part, which is the culprit of this whole thing. Because there's a different metabolic pathway to excrete out of the liver. So that's the only thing. Mitochondrial functions can be improved, and so that can help, but again, it can help on a younger patients that first started losing their hair because that's when they have the issues. But typically, people that come to us already have thin hair to begin with. Can you revive them again? And that's the most difficult portion because it's not the magical functions. It also requires a lot of nutrients on top of that to build the hair again.

[00:37:30] **Dave:** Well, it may just be that you want to have some Danger Coffee, which is full of massive amounts of trace minerals because you need those to grow hair and even to have hair that doesn't turn gray. So there's a whole dance there. I do think glutathione can help, especially with fitting hair.

[00:37:49] And we didn't talk about it much, but so many skincare products have hormonal disruptors in them, and you don't want to be using those. In fact, it's one of the reasons testosterone is going everywhere, artificial fragrances, and things like that. When you're using a glutathione product, it increases your body's ability to get rid of the toxins that are disrupting your endocrine system.

[00:38:14] Like you said, it's probably not going to help with DHT, but it will help with testosterone that turns to estrogen, things like that. So that's cool. So a side benefit of glutathione, we'll put it that way. And I'm very interested in restoring hair color, which could be a glutathione pathway and certainly keeping hair thickness. And I think glutathione's a part of all that, but not the only thing to do.

[00:38:34] **Nayan:** True. And you just said there are a lot of cosmetic products that have hormone disruptors in there. Astral-like products, not Astral itself, but Astral-like products in the skincare line because we have known that Astral seems to have be better with the female skins. And most of the skincare users are female.

[00:38:53] Guys are getting into this bandwagon now because we want to look good too at this point. And so having those cosmetic products free of all hormone disruptors is key for us. And so clean beauty, plant-based, if possible, a technology-based product that takes only known ingredients inside it is very important for me.

[00:39:17] **Dave:** Would you eat a tablespoon of your formula?

[00:39:20] Nayan: I will do it in a heartbeat.

[00:39:22] **Dave:** Okay. Can we see it? I'm kidding. It tastes bad. The rule that I have here is if you put it on your skin, you really ought to have ingredients you'd be willing to put inside your body because it does enter your body. So I think you've embodied that in your creation process. So those are all the questions I had for you.

[00:39:45] Guys, go to aurowellness, A-U-R-O, wellness.com. Use code DAVE10, and you get 10% off. And this glutathione thing, it's a big deal, even if you're like, I don't care about my face. I'm already married. I already had kids. I don't care about my face whatsoever. By the way, not most people are married with kids.

[00:40:03] But if you're one of those, it doesn't matter. You want it for your liver and your brain. And so if you're doing stuff for that, you might as well make your face look good while you're at it, because who knows, you might live way longer than you think you're going to.

[00:40:14] Might as well look and feel as good as you can as you move along wherever you're in life. And I know glutathione is important because I've been using it for almost 20 years now, and it brought me back from the brink when I had toxic mold. That's how I learned. And now look where we are. Spread it on your skin instead of getting an IV. It's awesome. Again, aurowellness.com, code DAVE10. It could be life-changing. It could just be face-changing, which is cool anyway.

[00:40:42] And just understand there are hundreds of companies making glutathione products, and I like to think that over the last 10 years I've had an influence on the demand for glutathione. There's a lot of really bad-tasting, not that well-designed liposomal products that are out there. Some aren't even liposomal.

[00:41:03] They just put it in stuff and you spread in your tongue and you think you got it and you didn't. There's some that get digested and don't work. And there are some that are precursors. There's a bunch of different approaches. I think transdermal is pretty interesting because it just works so well. And it's actually more cost effective than IVs and a lot of the Auro formulas and you can smear it on your kids' back.

[00:41:25] You're not going to get them to drink the sulfur stuff. And if you're going to make out with someone after you spray it on yourself, it's okay. Try taking a spoonful of liposomal glutathione and then kissing someone and just watch what happens. It's an interesting experiment to see how much they like you. Auro won't do that. So it's a cool product. So thank you for inventing cool stuff that works. World of biohacking is getting better every day.

[00:41:50] Nayan: Oh, thank you, Dave. Thanks for allowing me to be here today.