Introduction and guest background

And I think on the more implicit side is creating a context in which the person can start to see a possibility of a different version of themselves. And where's the gap between where you see yourself now and this other possible version of yourself?

What could we do to close that gap? What are things that we can start to embody or things that we can start to think about that create the bridge between this version of yourself that you are suffering with now and another version of yourself that you can potentially envision?

This is Doctor Talks. Welcome to the Two Curious MDs podcast with your host, Dr. Alia Ahmed and Dr. Surya Rahman. Today we have Dr. Azay Alsop is an artist, neuroscientist, and psychiatrist who researches social cognition, music mindfulness, and psychedelics.

His artistic research and clinical work are guided by the belief that decoding these tools will provide a better understanding of how social groups function and offer insights into treating mental suffering and enhancing the evolution of society at large.

AZA studied biology, jazz, and philosophy at North Carolina Central University, who says you can't do all three. Kids, are you listening? I received his graduate training from the Harvard MIT MD PhD program and was an Emerson scholar at Berkeley College of Medicine.

I'm mouthful. He completed clinical training in psychiatry at Yale with a certification in psychedelic assisted therapy and research. He's currently an assistant professor at Yale and Howard University and director of the Center for Collective Healing.

He's also medical director of the Rest Crisis Center. Dr. AZA has co-founded several companies that combine arts, science, spirituality, and community building to drive social change and facilitate the healing process.

Welcome, Dr. AZA. We're so delighted to have you. Thank you for being here. You're welcome. Thanks for having me. Excited to have the conversation. Absolutely.

Get to know each other a little better. Just so our audience can get to know you a little bit, I'm just going to start right at the origins. You've been called a physician, scientist, and musician.

How do you introduce yourself when people ask? What do you do? Yeah, it sometimes varies depending on the context, but more and more I introduce myself as an artist and physician scientist, like in that order, because I think more and more I want to embody the values of an artist in how I approach my work as a physician scientist and how I approach my life, I think, in general.

And so that more and more is the way that I introduce myself across all contexts. But I think it's still, you know, it's still a process in terms of how these different parts integrate, you know, within I think the various kind of structures and confines that I have to navigate in these different systems, which I think reward and devalue different parts of our, you know, of myself.

And so I think that's, that's an ongoing, like an ongoing process. Absolutely. Absolutely. I feel like, you know, I want to ask the next question. Was there a moment early on that made you realize that medicine and music could be part of the same thing?

Yes. And so, I mean, I think these things have always been passions of mine from as early as I can remember. And I always had exposure to these different ideas.

I think in a very tangible way, I first found out or I had the idea that these things could fit together as a first year medical student. There was a conference on music and the brain.

It was run through the neurology department. There was a guy there called, um, gosh, rich log who did a couple, you know, of studies in music for rehabilitation of like stroke.

And there were some other people there just presenting on these different ideas.

Becoming an artist-physician scientist

And I was like, okay, that was the first time where the connection between like the biological implications and the potential health implications of music were made clear, but I didn't really.

have any training pathways that made it something that I felt like I could do or access in that time. And so I would say it wasn't a residency in psychiatry where I really started to integrate myself as an artist and myself as a physician scientist in the work that I was doing, both as a resident, but also as an artist.

And what was that like? Who were your partners in that? How did you find your way to that, Malia? I'll let you. Well, I'm curious. The word that you used was integration.

So how did you bring that integration into, you know, coalescence or, you know, integration is always to make something whole. And I'm curious about how that actually evolved.

So I think it certainly started and continues to be an internally driven process. And so like, the more that I can reconcile and integrate those parts of myself, I found that external pathways became more visible or accessible by which I could then integrate them in my career.

But it took me first stepping into that identity through my intentions and through my words and through my actions before there was very clear career pathways for that integration.

And so I think that internal process of saying, OK, I know these two things are inside of me. How do I like how do they fit inside of me first? And how do I find the courage to embrace especially I think embracing myself as an artist because it is a very vulnerable, I think, role.

And I think to embrace it in the context of being a physician scientist within an academic context, I think also requires stepping outside of the box to some extent.

Although there's so many doctors and scientists that are musicians and have had that training, it still somehow seems to be this thing that is not you know, more widely embraced.

It's like there's a corpus callosectomy. Like there's a split between the two sides. You go to work. It's like Severance. It's like you can't be a musician here.

You can't be a doctor here. Yeah. But it's like when you talk to so many doctors and scientists, it's like they are artists. Like they've played music as kids.

They love to play their music. Even if they don't feel like they can be as active in it because of their career choice, it's something that they have training in and something that they actually really enjoy.

And so yeah, I think that that internal integration really has created a pathway now where like my career can be supportive of that process in a way that it didn't feel that way, you know, in the beginning.

When this occurred, when this idea of kind of integrating these two things, was there something going on in your life that triggered that effect? Or was it just the academic kind of exposure that you described?

Was this more of a personal, like, I need to do this because it's, you know, it's a personally driven cause? I think it's a coalesce, yeah. It's a coalescing of, I think, both processes in that, like, A lot of this process really came to, I think, a head or to like a change point in med school, to coming towards near the end of med school.

And so I think in my personal life, like going through different changes in my family, and I think really wanting to come to a better sense of who I was as a person and like my identity and what I wanted to do in the world.

coming towards the end of med school and being like, okay, I have to really like, this is going to be my career. What is it that I really want, you know, and how can I do this?

And, you know, do I have what it takes? I have the ability to be able to pursue, you know, both of these things that I have continued to pursue up until that point.

But I realized that for me to really continue to pursue it, it would require me to really kind of embody these things in a new way. And that was actually when I became AZA.

And that was me making a decision of like really embracing who I was as an artist, as a core part of my identity and something that I wasn't going to be willing to give up in order to be considered like a serious doctor or a serious scientist that was really going to have to like find a way to make these things fit in an explicit way.

And so I think those different parts of just my own self-development and that process of self-actualization and self-realization that I was on, and obviously there's a huge spiritual component to that as well.

But that pathway and how it converged with the change in going from my PhD back into medical school and realizing, all right, I'm almost done with this like really long process.

What am I really going to do, you know, with this? And then, like I said, I was going through like a divorce at that time. There were changes in my life, personal life also happening that I think all kind of like converged, you know, at that time.

So what is the story of your name? Does this come in at that time as well as you described? Yeah. And so, you know, it's like in that process of becoming an artist and figuring out like, what did I want my name to be?

I wanted it to be something new and the power of that, but I also wanted it to be kind of linked to who I had been before. And so my middle name, which was my parents were going to make it my first name, but then they felt like it might be too you know, something my kids might make fun of me for, or it might just be something that biases people against me.

So they gave me the nice Greek, you know, Anglo-Saxon name, I guess, Steven, right? But Azariah was my middle name and it means God has helped. And from that idea and concept, I was really thinking about this idea of life cycles and our ability to recreate ourselves.

And so it's like going from A, Z to A. And in some ways, as you recreate yourself, there are all these core parts of you that just come back around kind of to the surface, but maybe in a new form.

And so this was like my way of kind of symbolically trying to embody all those ideas and concepts as I figured out, you know, who I wanted to be as an artist.

Wow, that's just a beautiful narrative about yourself and again the integration of yourself as your identity and then the symbolic representation of that with the letters, right?

It makes so much beautiful sense. There's a lot of thought that you've put into that.

Naming, identity, and community support

naming of yourself and so when when you did was there kind of like a coming out moment was it kind of what was that like to kind of come out with that and then you know i'm thinking you were in the thick of medical training who was your community you know how did you reach for that because we can't do things like this you know these big internal changes that lead to external changes It's really interesting when we were both asking a similar question that there's an internal and a corresponding external aspect to it.

And you beautifully brought it together, how it starts internally and then it shows up externally. So we know that there's this active process happening.

And so there's a crucible. Who is your crucible? as you were going through this? Yeah, I think certainly my family, both my kind of family of origin, but then my extended family and the community in Boston that I had, both artists as well as like a few really great friends in the medical program and then the graduate you know, graduate programs that I was in there.

And then my, you know, my church community, you know, I played I've been a church musician, you know, pretty much my entire life. So I was music director at a church at that time, and co directing some youth choirs and things like that.

And that was also just a beautiful space to be able to kind of have that acceptance. And there wasn't just one moment, but it's like, you know, some of my very first close friends, I kind of showed them some of my original music when we were going through this process.

And, you know, they were just really, really encouraging and validating of like, yeah, you've been doing music your whole life. You've always loved music.

it only makes sense for you to be an artist in this way. And I'd already been a professional musician at the time, just hadn't put out any real original music or go in that sense.

And then I think the decision moment was like, what am I going to do in the hospital? And to what extent would I go by this name in the hospital setting as a medical student?

And so I feel like that was the testing ground. And I do remember like being in like my first rotation after I started going by this name and had started working on like my mixtape and what would be my first album, which came out the end of that 30 year medical school choices.

And the first day of that rotation, everyone was kind of going around saying their name. And it was like my turn. And I said, like, AZA. And it was OK.

Like, there wasn't this huge… Like, in my mind, I had built it up to this thing where it's like, I'm going to have to have this, like, long conversation about it, or I'm going to have to, like, defend it in some way.

And it was just like, AZA. I was like, oh, OK. Like, how is that spelled? AZA. Like, oh, OK. All right, AZA, nice to meet you. And it just kept going.

And it was like, that was it, right? And then like, there would be people who might ask me like, oh, like, is that your, you know, how did you come up with that name?

Or, you know, ask for the background of it. And I'll say, you know, I can tell them about my music and things like that. And even how I described it, I think in the beginning, there was a bit of self-consciousness and like, there's so much that went into the process.

of me becoming AZA that it can sometimes in a very superficial interaction, like an introduction, it can be difficult to really summarize, like, this is why this is my name, right?

So I've always struggled with like, okay, what's an easy way to say why I'm called this, but give the depth to it, but

not have to go into the complexity and nuance that is also underlying that.

So those are some of the moments I felt like after a while I just became normative. So basically by the time I was in residency, everyone knew me as AZA.

And today, I mean, only people that really call me Steven are like my… really like family who've known me for like a really long time. My wife who's known me from since I was 12, you know, she'll, you know, reference me in that way and close friends.

But most people don't even know that as my, you know, know my original name in that sense. such a beautiful story into identity that I think we can see that and patients get better, right?

There's a sense of new identity and I'm curious to know how do you apply what you've embodied and what you've experienced through this integration with patients and also music and building that in terms of a modality for treatment, is that something you do or imply into the care that you provide?

Yeah, I think, and there are ways that it can be implied in a very implicit subtle way and there are ways that can be made very explicit. I mean, you both mentioned, you know, the theme of narrative medicine and the power of storytelling in how we make sense of our identity, how we shift our identities.

And I think as an artist, you are at the core of that is telling a story, telling your story, telling other story, telling your community story. And so on the more explicit end, I think having Having people engage in creative songwriting and that sort of work is a tool for identity development, identity modification and change and how they write their theory of change.

And I think on the more implicit side is creating a context in which the person can start to see a possibility of a different version of themselves. And where's the gap between where you see yourself now and this other possible version of yourself?

What could we do to close that gap? What are things that we can start to embody or things that we can start to think about that create the bridge between this version of yourself that you are suffering with now and another version of yourself that you can potentially envision?

Now, when did you come into psychedelics? Like you were finishing Psychiatry Residency, like, and how does that all kind of, you know, add to the mix here of what we've just discussed?

Yeah, so definitely doing Psychiatry Residency was really where I started to kind of be more exposed to psychedelics from a therapeutic and ceremonial context.

And so I think for me, the potential was really immediately recognizable from a therapeutic context and from a more even community-based societal evolution, sort of spiritual development context.

And yeah, I wanted to know more and so pursued training and pursued opportunities where I could begin to facilitate and understand just how to work with people in those states of consciousness and how they can be leveraged.

you know, therapeutically. And I think that, yeah, it's been a really exciting time to, again, think about this surely from a clinical context, but also from a more societal, you know, societal and spiritual, like ceremonial context.

which is the term music mindfulness in psychedelic treatments. Tell us more about what that means so our audience can kind of get an idea of this as a diagnostic tool or as a treatment tool.

What would music mindfulness mean to a patient? Yeah, so music mindfulness can mean a few different things, but it's an umbrella term that describes activities, interventions, in which we are combining elements of music listening or music participation or music creation with various kinds of mindfulness activities.

And there are a number of different ways that one can do that.

Using music and narrative in therapy

In my lab, we've sort of pioneered a very specific version of this that focuses on focused attention and motivation and scripts and music to support both of those processes.

And I think The idea and what we're seeing is that you can tap into unique networks and physiological states when you combine music with mindfulness than when you do music by itself or mindfulness by itself.

Now, we already have evidence that both of those things by themselves can have like positive therapeutic impact. And there's this unique sort of potential synergy that one gets when you combine these two things in the same modality.

I think when it comes to psychedelics, it almost sort of super ignites that process in that now you have an intersection of I think three mutually interacting variables in a sense, right?

Like the music we know influences the way that one will experience a psychedelic journey and can be a very important therapeutic component of that. We know that mindfulness activities and the degree of mindfulness someone brings to an experience also will modulate and modify how they will experience that psychedelic.

And psychedelics will influence the ways in which one can engage in mindfulness in the same way psychedelics modify the way that we perceive music even from a sensory component.

And so I think the interaction of those things and the way they show up within a psychedelic process, the more that we can understand it, I think the more we can leverage it in a really powerful way.

I love this line. I'm going to read this from the paper that was just published in February of 2025 because in the findings and the results of discussion, it said, both live and virtual music mindfulness sessions also acutely reduce stress and altered participants' state of consciousness.

However, only live sessions foster social connection. I love that. However, only life sessions fostered social connection, you know, just to remember that life music matters.

It's not just the listening. And I love how you parse that out. That's huge. I think that really speaks to why kids need music in school, like stop cutting music programs, right?

Like, I think it really supports some of the interventions that we're trying to do on the ground level. You know, in this experiment, we have the live session and then we're live streaming the live session.

So the people on the virtual end are getting it in real time and they know that it's happening in real time with the other people in the live group. And then we have a live chat where they can interact.

And so I think it's a pretty good control, right? I think obviously more experiments and things like that need to be done, but it does seem that there is this unique sort of social benefit to the live experience that you don't get from a virtual experience, even when the virtual experience does have some therapeutic value in terms of stress reduction and enhancing mindfulness.

We talked about this in one of our workshops, which was this concept of entrainment and the entrainment of the different types of entrainment. And when you have a collective kind of entrainment, use music to kind of help with that rhythmic harmonic kind of connection, you know, when you play in an orchestra or if you play different instruments and it's collectively heard and then there's a physical connection to that experience.

I mean, there's so many different layers to entrainment, right? And that social entrainment is also a big factor to what seems like what you're describing, which is very interesting to hear how that can be applicable in

psychedelics.

And one of the questions that I have with patients is, and I ask them, what is your relationship to music? Because music is important. And sometimes when they do their sessions, knowing that they have a certain relationship to music, is what can be a guide to assess how are they going to interpret the sound in that altered state of consciousness.

What would be your thoughts on that concept of preparing a patient for a session, say, and trying to assess their relationship to music and how it would be applicable or beneficial or not to the treatment?

I think the scientific data is still out on that, so I'll speak more from anecdotal and experiential context and my experience in the field. I think that understanding a person's musical preferences and musical triggers is a good way of ensuring that you maximize the potential therapeutic benefit of you know, a playlist or whatever the musical experience will be.

I don't think that all musical triggers need to be avoided. And I do think that there are ways in which certain emotions that might arise due to certain musical stimuli are actually a good part of the process for them to work with.

And so I think it really is based on the therapeutic relationship and like when you make those kinds of decisions. I do think in general that the ideas that we don't have a lot of familiar music in the psychedelic playlist.

If you do have familiar music, it's sort of after the peak of the experience. And so I think those are some of the guiding points. And I think sort of understanding the person's own musical experience.

And I think for musicians or people who have a certain way of listening to music, how that shows up in a psychedelic session may be different than someone who maybe doesn't listen to music with as much of awareness or doesn't have as much of a conceptual framework about what's happening in different kinds of music.

So I think I like to have a playlist that is pretty broad in terms of genres and composer and world representations. And I do bring in certain aspects of a person's musical preferences And we'll even have some familiar songs like later on near the end of the, you know, end of the journey.

Yeah, you're absolutely right. And I tell patients if you notice something in the session that you're feeling with sound or that's, you know, just lean into that because sometimes that's an important place.

If there's some resistance or sense of resistance or like, what is that? I don't really want that. Or just trusting that there's a reason why you're having this kind of resistance or antagonism with that sound that there must be something there and to just kind of trust that and lean into that.

And it opens up another door sometimes to something that brought back that feeling. I have a clinical question, actually. So this is an interesting, you know, when you talk about this complicated structure of music and then you'd talk about a complicated structure of our cognitive apparatus.

And some of the ways in which we've combined psychedelics like ketamine with sound has been through sound bowls or doing a particular sound healing. And one case that really stands out for me was a person with what looked to be CRPS, chronic regional pain syndrome in their foot post-surgery at a nerve bundle.

which was such debilitating pain that it was disabling. We were able to actually combine the two and something happened at that interface of the nerve endings with the music and the ketamine.

What's your understanding of what's happening at that kind of microscopic juncture? What can we surmise from what we know?

Psychedelics, music mindfulness, and entrainment

Yeah, so there was a really interesting study recently that showed if you align, now I don't remember all the details, so I don't want to get it wrong, but essentially if you align TMS pulses to the beat of a certain music stimulus that someone's listening to, you basically can enhance the efficacy of the TMS.

And so it does show that there's this temporal kind of entrainment, you mentioned the word entrainment, this temporal entrainment that happens that allows certain neural circuits to maybe communicate better or integrate information in a more precise way.

And I think a leading sort of mechanistic framework for the action of psychedelics is this idea of plasticity. And so I think with certain kinds of music, you're basically exciting and activating particular circuits that then sort of set the energetic landscape for where plasticity is going to happen most rigorously.

And that is going to set the biological framework for what kind of psychological improvements a person can make. In our lab, we're working on a theory called pattern entrainment, which basically says there are cells in the brain that does do pattern encoding.

And so they recognize certain patterns in acoustic stimuli, and they're trying to keep track of those. And then there are cells that can be entrained at specific frequencies.

And the integration of this information in the cortex is what might allow us to really then access particular subcortical networks or particular cognitive networks that can lead to sort of the wide range of cognitive and emotional effects music can have.

which also brings me like the case of, I have cases of patients often with tinnitus, right? And I've had patients who have benefited with treatments with tinnitus, with ketamine treatment and music, and they feel like there's something that happens, I guess, where they disengage from that disturbance of that sound or that, you know, the constant dysregulated signaling, and they, that harmonics kind of improve.

And this is just a theory, there's no science or backing to this, but it's just kind of what we observed. I had another patient who had a cochlear rupture because she held her sneeze and her cochlea was completely ruptured.

And so she had sound treatment. We actually did actual ketamine treatment with sound therapy. And again, she reported that frustration that she had with movement because of the association to the cochlear and the instability that she felt was much improved.

And again, this is just subjectively assessed. What would be your thoughts on that and using this in other forms of hearing disorders or conditions that occur with psychedelics and ketamine or other substances that help in this aspect of treatment.

So I don't have a very clear model. One of the things that I'm thinking about though is this idea of, which you brought up, which is being able to sort of have a new orientation towards whatever the challenges, right?

So if it's tinnitus or if it's the vestibular cochlear instability, there's something that's happening within the framework of the dosing experience that shifts their relationship to that stimulus or to that challenge.

And I think sometimes within the dosing session, the experience of what that reorientation feels like, what it feels like to not have the sound of the tinnitus be like the only thing that I can think about or hear, but to experience a different thing creates like a window of opportunity.

I think that then allows them even after the experience to like, it's like once you've been to a place you can, it's easier to find it again and revisit versus trying to get to a place you've never been yet or haven't experienced.

I think that's something that can happen. I think in a lot, even just anecdotally you hear when people talk about their psychedelic experiences or experiences, you know, with ketamine where they say like, you know, I didn't know I could feel that anymore, or I didn't remember what that felt like.

And then they feel it again. It's like, oh yes, I'm capable. I am capable of feeling this, or this is something that is accessible for me. And I think that creates a new opportunity that they can work with, you know, after the original, you know, the original experience with integration.

I love this conversation because we can go micro and we can go kind of macro as well. And as you're speaking about all the different ways that different people have found healing and all the different ways that healing can show up through psychedelics and also through community and collective healing, can you speak a little bit about what's happening here when we talk about the individual versus the collective?

How do you hold those both? And yeah, where are you putting your attention and what perspective are you looking at that from? I really look now more and more at the collective as the core unit.

I think most of our medicine framework is definitely built around the individual as the core subject or the individual as the core unit. I think in some ways that makes sense.

I think in other ways it has led to like a malalignment of resources. And it certainly has not helped solve the mental health crisis, certainly hasn't helped solve any of the chronic conditions.

I think we do a good job of creating medications that can manage a number of different symptoms and medications that can work very well for certain acute things.

But many of the, I think, more chronic lifestyle, psychological sort of things, we haven't really made a lot of end road on. I think part of that is because we're looking at the wrong fundamental unit of change in a sense.

And so more and more, I'm interested in the idea of the collective unit, the group-based forms of treatment, community-based protocols. Because I think, one, the problem won't be solved in a one-to-one way.

And just from an infrastructure standpoint, we can't have enough psychiatrists or therapists, LCSWs, to deal with each person one-on-one, even for something like psychedelics, where it's two-on-one ratio.

in like the clinical trials, right? That's just not, there's not a feasible, tangible way to actually create an accessible public health level intervention.

And so I think looking at the collective, what are the emergent properties that happen when you bring a number of people together with shared intention to build community?

The idea that healing is a part of that motivation. you know, is what I'm most excited with. And these studies are coming out of the lab. We're really in community-based spaces and in group settings and really trying to understand mechanistically what's happening, physiologically, psychometrically.

And then, like, how can we leverage the group as the therapeutic modality, which is not a new idea in psychiatry. Obviously there was a time when group work was kind of like the in vogue, cooler thing to do.

And then it fell out of fashion. And so I think there are challenges there, obviously, but I do think there was something right about that approach. And now we just want to add more of a neurobiological framework and understanding to it and then again at the same time ask how can things like music which have you know been traditionally relegated to art with a pejorative you know how can things like that be like re-elevated as a part of the mechanism of how you actually deal with the collective, right?

How do you actually synchronize people? How do you actually coordinate and get them together? Things like music evolved, we think, because of its fundamental role in being able to do that.

So how can we bring that wisdom back into the infrastructures that we have? Definitely clinically, but even in my mind, more importantly, on the community side of implementation.

What would that look like in practically, you know, when we're thinking about social change, music and science driving social change in the community, what would that look like?

Give us a picture of, I mean, we can talk about this in terms of having music in a concert hall or in a band or in a, you know, how can this can be implemented in the most effective, most healing way?

So I think that's part of the challenge, part of what we're trying to work with, which is how do you come up with a protocol that is evidence-based and generalizable yet modifiable, you know, with the same level of effectiveness?

I think that's the question, right? So I think, for instance, with the music mindfulness study, right, we're showing, okay, you can leverage professional musicians with no prior therapeutic experience and place them within this community context.

And you can have, you know, potentially meaningful clinically significant therapeutic benefits for something like anxiety and depression. And there's a biological mechanism that we can posit, you know, might be mediating these effects in terms of autonomic, you know, activity and changes in heart rate variability and things like that.

Okay. So that model for treatment, let's say we're in the process of saying, okay, what is an eight week version? If you do this for eight weeks, can we see any, you know, effective or meaningful, you know, clinical change in anxiety or depression?

Let's say we say yes, like that actually is the case in our cohort of people in, you know, Washington, D. C. and in New Haven. then I think the question becomes, that's something that can scale because there are orchestras in all the major cities.

We do this in collaboration with New Haven Symphony Orchestra. There are professional musicians in all these major places. But what is the right community setting?

In New Haven, we did this in Bloom Community Center, which has a reputation in the community for being a very inclusive and welcoming space, aesthetically very beautiful.

Will we get the same result if we do it at the local Boys and Girls Club? Or is there something about this particular aesthetic that is important as a part of the effect?

So we might generalize the model, but maybe part of the model has to be a particular kind of setting. So really understanding those aspects will help us to know these are the things that are generalizable.

The music has to have these parameters. As long as it has these parameters, it can actually be any genre or from any culture, as long as you're meeting these parameters.

And those are the kinds of things that we're trying to now hone on. I think another thing that kind of helps us to better understand this is that in the study that you were referencing, we did a bilingual intervention.

So it was in English and Spanish, and that was successful. So again, that shows, OK, there's a way for us to be culturally adaptive. in the way that we think about these kinds of protocols.

And so that's just another frame that we're also taking.

Collective healing and scalable community models

I would imagine nature plays into this aspect of universal kind of understanding of music and the effect it has. I mean, you know, landscape music or, you know, music that has to do with, that's rhythmically balanced, right?

That's in nature. What would be your thoughts around that, bringing that component of sound into So for me, I think sound is actually one of the most powerful sensory modalities.

It's kind of like one of the first ones that comes online in Euro, where we're really first starting to try to make sense of the sensory system. Sound is one of the first things that we're getting inputs about.

And it's a very temporally precise and physically precise signal. Things are vibrating at a specific frequency, at a specific place in time, right? In a way that olfaction and some of the other senses are not as much so.

Sight obviously is another big one. But again, that comes in later after sound has already been working for, you know, a good number of weeks. And so I think there's already that sort of just innate connectivity between the entire physiological system and sound as an input.

That's one thing. Then I think in nature, we see over and over again pattern sound, right? So whether we're looking at animals, whether we're looking at water, trees, the movement of things in nature has a cyclical pattern kind of, you know, quality to it.

And at its essence, sound is just movement and vibration of physical things through space. And so when you listen to nature at many different scales, you will find cycles and patterns.

And music is, at its core, a collection of cycles and patterns at different scales. So you're telling me nature is music if we listen closely enough? beautifully said.

I'm just translating what you said. I'm just trying to capture this. That's it. That's it. It's so interesting how it all comes together and it's so naturally there, present.

It's so evident and yet sometimes we were going back to the basics is kind of what it sounds like. You know, when you're really talking about healing, we're really going back to the basics of existence.

I was going to say one of my mentors and good friends, Victor Wooten, talks a lot about this connection between music and nature and even has a camp that's like a music and nature camp where he specifically brings people into an awareness of that overlap and intersection.

And the other thing that happens in trauma is the disconnection to sound, right? Because I've seen patients who've had a trauma response, I mean, you probably all have, where, you know, where they disassociate because if they've been exposed to so much trauma, yelling, sound related, they tend to tune things out.

And then when they get better, they start to see, they start, there's an appreciation to more sound that that's much more nuanced than they It's almost like I'm hearing a new environment.

There's a new surrounding I'm in. Yeah, yeah. No, this really goes back to, I think we're all, you know, I love how these questions and these answers are just flowing because, Aliyah, you almost read my mind, because I'm kind of getting back to what you said about it's the first sensory apparatus that comes online.

And then there's an evolutionary piece of it where we're embedded within sound, right? We're creatures that are here within sound. And then we have all of this technology that we developed, our ancestors did, where drumming and sound and rhythm and harmony was a way of bringing us together, of making us resonate together and feel that kinship, that oneness.

And then we talk about how now art and music are relegated. You know, they're put aside. They're in this culture. They're defunded, underappreciated. Oh, you know, math and science are needed and we don't need music.

And I feel like what we've described here is that, you know, just like stem cells need a infrastructure to grow on. Right? You're talking about sound as an infrastructure upon which these changes, these biochemical changes have like, you know, I loved how you said it was a field upon which these kind of neuroplasticity changes are occurring.

I mean, we're talking about the ability to send in signals, right? That's why so much of now medicine has changed to ultrasound, right? There's so much now we're doing it, not just diagnostics, but therapeutics, right?

Sound is, we know this is now even the left brain can agree sound is important, you know, not just the heart, right? It's like, they're coming around to it.

So what do you see? What's your, you know, vision here? You know, what's your kind of like big picture vision for this work that you're, you're doing collectively and what you're bringing online, you know, as you're seeing the different things kind of emerge, there's always a, almost kind of like an organic way that things come together.

The people you need find you, you find your directions, like what's, yeah, what's growing in your garden, Dr. AZA. Yeah, I mean, I think, you know, I'm very grateful that there are many things growing.

I think the more that you plant, then when it comes to harvest, there's a lot of work to do, you know, and I'm grateful for the work. Well said, well said.

But if the soil is good, the weeds don't grow, right? If you tend to the soil, the soil is where I feel everything is. The weeds don't grow as much, right?

You're right. So I'll share, I won't share everything, but I'll share, I guess, like two things. And one is on the research side, really coming to a place where we can start to create the sort of interventions that have evidence behind it, that there are things that like insurance can reimburse for, right?

Or there are things that like people can get a prescription for that's taken seriously within the medical context. Like, hey, There's this eight week program.

You go for an hour each week. They're going to play this special music and teach you these skills and your anxiety is going to be able to be managed as an outpatient.

So that will avoid you having to go to a crisis center or emergency room or be hospitalized because like your anxiety is starting to pick up or your depression is going down.

We're going to enroll you in this, you know, eight week program that is evidence-based to return your depression back to levels where you can stay out in the community and we can continue to manage you instead of you having to go, you know, and insurance is going to reimburse for that, right?

Like that to me would be like a huge win. And related to that is having a very scientifically grounded model for the design of music therapeutics. So why do you create, why do you use certain notes?

in relation to other notes. Why do you use certain timbres? Why certain tempos? How do you construct them in a way that with high probability can modify certain neural circuits to get a specific clinical outcome?

You know, so those are types of things that I'm really excited about. from that aspect. And then obviously, like, how do we leverage that within the psychedelic, you know, assisted psychotherapy framework.

And again, all of this I'm thinking about in group based community based, you know, settings. And then the other thing that I'll talk about is my music for the collective project.

which is an artistic project that really seeks to translate what I've learned in the past five or so years about music therapeutics into an accessible and fun collective healing experience that happens in the community.

And we debuted the first kind of iteration of it at the Kennedy Center this year. Um, and it was like a sold out thing, really just amazing time. And since then we've done it at, you know, the Schwarzman Center at the National Academy of Sciences.

And it's just something where I'm seeing more and more that this intersection of art and science is something that's being embraced at larger and larger scale.

And it's, it's coming back to be something that people are seeing as important. I think even as the field of psychedelic assisted psychotherapy grows, you know, it becomes more and more apparent, like how art.

is such a valuable part to that process, both, I think, in terms of preparation, in terms of dosing, and in terms of integration. And so, but I think in this context, being able to step into my role as an artist, but still, I think, bring in the fact that I actually am a doctor, I actually am a scientist.

I think in the early phase, I wanted to be respected as an artist so much that I tended to not really bring that part into what I was doing as an artist and really keep it separate.

So if you support me as an artist, it's through the art and it's through the music. And I didn't want to be like, oh yeah, he's a good musician for a doctor or something like that.

But I think as I matured more in my career, that also is doing myself a disservice. to not bring in the fact that I did spend a lot of time learning how to think a certain way and developing these skills that actually, if I bring them into what I'm doing as an artist, it creates so much more power and so much more opportunity for healing.

So why not bring that in? And so I'm really excited about this project because it's my first artistic project where I'm really explicitly bringing in the fact that, yeah, this can actually heal and we can actually come together and curate an experience that will be healing and being able to kind of stand in that and to get the responses that I've gotten from people in the audience has been really gratifying and that's something that's really picking up momentum.

Yeah, beautiful. Oh my gosh, what a journey. And as you're saying this, when we experience healing as a collective, we confirm it for each other. I think healing in isolation, right?

Yeah, you get there, but it's not everything. And it's this connection to this greater web of life that we're really disconnected from. And so as you're kind of winding down on our beautiful, wide-ranging podcast conversation, I have a question for you.

Nature, sound, and future directions

What's a question you wish more people asked you? or people ask you more often. And then a second thing, what are you most curious about? What's the question you would, you know, I'm preempting, preempting Dr.

Alia here. We're two curious MDs and we always want to end with curiosity. We start with curiosity, end with curiosity. Yeah, it's a whole different podcast.

We're just putting a pin on the next one. tend to wear a lot of myself in a more external way. And again, through being an artist, I feel like a lot of my personal life is exposed and vulnerable in a sense, so people do ask me a lot of different questions.

But I think, yeah, talking more about my kids, my life in that sense, in some settings I would like to do more of. And talking, I guess, more about my spiritual journey, is something that even when I talk about music and science, I allude to it, but it tends to not typically be a more explicit part of a lot of the conversations that I have.

And what am I most curious about? Right now, I'm really curious about women's health. My wife is a midwife and almost done training for midwife, has been a labor and delivery nurse for over a decade.

And so as she's been in that process, is just reignited this idea of like, not just the different ways that we're embodied, but the way that affects our mental health, the way it affects the way we navigate the world.

And again, you know, we see that there are these differences that we even pick up physiologically in how people, you know, define their section gender.

And so I'm really curious about just those dynamics and how they influence how we think about treatment and how

we can leverage that in thinking about the collective, thinking about the role of a mother in the family unit and how that translates to the community, the role of a grandmother in the community dynamics.

How can we better leverage I think, an understanding of these dynamics towards this goal of collective healing and collective action. Absolutely. That just took my breath away.

It really took my breath away because I think it's the wisdom of aging, right? And how we look at aging in terms of, oh, it's dementia. you know, your cognitive decline.

But yet, if we bring back that social context to aging in a very matriarchal, you know, the wisdom, like the wisdom that that experience has, think of the potential of that healing has in a cohort of family or in socially larger.

That's just brought tears to my eyes with my personal story has to do with my mother right that her disengagement from her identity has affected us as well and then as she comes back from her you know changes in her cognition when she comes back from that state it's like oh we're all connected we're all there you know with her and when she disengages it's like oh what happened where did she go she's right here but she's not there so and i think that's a lot of story and a lot of people have that experience i'm hearing this word of reclaiming like you know we have had a culture of grandmothers we have had a culture of the village we've had this knowledge This is why we're here.

We're all here because somewhere along our line there was a village, there was a collective of grandmothers who passed on healing stories and healing actual healing herbs and methodologies and technologies.

We were kept alive and lullabies and song and that is locked in us, right? That's why we're here. And so this whole conversation has been such a reclamation.

of what is our ancestral right. And I thank you so deeply for this beautiful conversation, Dr. Azié, and for reclaiming your name and making it your own.

Even that has a rhythmic tone to it. Dr. Azié, I got just thinking. Wait a second. There's some notes in here. And Dr. Aliyah, I forgot that your middle name is also Z.

So I can call you Dr. AZA if you'd like. I know. I wanted to name one of my websites AZA.com because of that thing. There you go. That's why I called you Dr.

AZA earlier. I was like, no, no, no, it's not. It's AZA. But I saw AZA and I was like, oh. Beautiful. How would somebody find you, you know, if somebody had to look you up or check out the work, the research that you're doing, or I know you're all over in Google, but what would be, you know, for patients and for, again, that healing that you want Google for you to recognize you through?

Yeah, so azalab.org is where we talk, we host a lot of the science and is a point of contact. AZA for the Culture is like my artist page where you can find out about just free access to the music and find out about shows and things like that.

And then, you know, on social media, on LinkedIn, AZA Alsop, on Instagram, AZA The Messenger. And I post a lot of things. Well, not a lot of things, but I post updates on kind of what's going on, shows, different events when I'm speaking and things like that.

Thank you. Thank you. That's beautiful. The lab and the culture are both interconnected. Thank you so, so much. Thank you, Dr. Azai. This was just a beautiful conversation, and I hope it really gives our patients, our audience, even our collaborators, colleagues, and people who are doing the integrative work such another way of looking at healing.

This is why we have these conversations. I want medical students to, you know, cause that's one of the biggest tensions of medical school. When you first go in, it's like, I'm a musician.

I'm a dancer. I'm, you know, and I have to give it up. It's like, no, you don't. No, you don't. And this is such a beautiful way of combining them and, and finding the riches of the intersection.

So yeah, inspiring. Thank you all for hosting this great conversation. Thank you for tuning in to Doctor Talks. We hope today's episode has enlightened and inspired you on your path to optimal health.

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