

## The Vitals - HIV/AIDS R2 Transcript

00:00:00:01 - 00:00:23:00

**Dr. Michelle Cespedes**

HIV is not a death sentence or it's not what it kind of was perceived. And I think some people still have that feeling from the 80s. HIV is a chronic, manageable disease, right? Your life expectancy essentially is the same if you get diagnosed with HIV in your 20s, but you're in care and take your medicines. Your life expectancy is expected to be 73, 74.

00:00:23:00 - 00:00:30:45

**Dr. Michelle Cespedes**

You know, depending on what state and other things like that.

00:00:30:50 - 00:00:59:52

**Leslie Schlacter**

Hi. Welcome to the Vitals Mount Sinai Health System's groundbreaking new video podcast. I'm your host, Leslie Schachter, a neurosurgery physician assistant here at the Mount Sinai Hospital. Well, December 1st was world Aids day, and there's been a lot of updates over the last couple of decades. And more recently with prevention, treatment and management of HIV and Aids. We're lucky enough to have Doctor Michelle Thespis with us today, who's an infectious disease doctor in specializes in HIV.

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**Leslie Schlacter**

And we're going to talk everything HIV. So for those listening today in the audience, just for awareness, can you define HIV and Aids for us?

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**Dr. Michelle Cespedes**

So there's a difference. HIV is the actual virus. Aids is the condition or the illness or the severe form of the illness. HIV stands for human immunodeficiency virus. Aids stands for the condition where your immune system is essentially so low or so weak, you can actually be at risk of getting diseases from things that we commonly encounter. Breathe in all the time that a normal immune system would be strong enough to fight to prevent you from becoming ill.

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**Dr. Michelle Cespedes**

So Aids is a severe form of the condition you can get from the HIV virus.

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**Leslie Schlacter**

And so over the last 20 years or so, we see those like there we see less people suffering from Aids because we're managing HIV more appropriately.

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Dr. Michelle Cespedes

Right. And better more importantly, we are actually diagnosing people with HIV before they even have symptoms. So for the last 15 years, the recommendation from or, you know, just public health for everyone, everyone should have an HIV test starting from about age 13, 14, 15.

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Leslie Schlacter

Especially.

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Dr. Michelle Cespedes

As soon as you're, like, old enough to go to the doctor. Everyone should know their status.

00:02:21:21 - 00:02:21:37

Leslie Schlacter

Okay.

00:02:21:43 - 00:02:25:49

Dr. Michelle Cespedes

So I think when some of us who are a little older in the 80s and 90 went.

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Leslie Schlacter

Some of us are a little older.

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Dr. Michelle Cespedes

I mean, I know how old my skin is great, but, but we used to see people coming in to the doctor, to the emergency room. Already sick.

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Leslie Schlacter

Yeah.

00:02:36:21 - 00:03:07:36

Dr. Michelle Cespedes

Seen already. Probably have had the virus for several years. So it's taking its toll on your immune system. Now, we recommend that everyone has an HIV test. And essentially, if you're still at risk of getting HIV, get it again. Maybe after you start dating someone new or for any other reason. But everyone should know their status. And this way, you know, you kind of know if you have HIV or not years maybe before you would present with symptoms of having a

destroyed immune system.

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**Dr. Michelle Cespedes**

If someone twists their ankle and comes to the emergency room, you know, we take your bloods, we kind of find out all this other stuff, you get an x ray, but you're also offered an HIV test, like.

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**Leslie Schlacter**

Just on a regular e.R.

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**Dr. Michelle Cespedes**

On a regular e.R visit. I didn't, you know, when at the other institution I worked at, we kind of rolled out a pilot when the recommendations to test everyone, started. So then we realized we were getting such high rates of HIV positive tests more than expected. And it turns out the doctors were kind of preferentially choosing who they thought kind of this person looks like they might have HIV or all these other things.

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**Dr. Michelle Cespedes**

So they were kind of testing who they thought. So, you know, you're going to get a higher, response rate or positive test rate, but now if you test everyone and you make it part of routine, you know, care, right? Just like we when you go to the doctor's office, we do your blood pressure and we do your weight.

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**Leslie Schlacter**

Ask if you feel safe at home, right?

00:04:02:28 - 00:04:22:39

**Dr. Michelle Cespedes**

Right. Or are you sad screening questions because that prevents heart disease or you before you're you have a heart attack. We see if your blood pressure is high, we'll test your cholesterol. But all these routine things that we do are kind of prevention, kind of knowing where you are taking care of it if you're in the risk factor or inching towards that.

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**Leslie Schlacter**

That's a really great thing to know.

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**Dr. Michelle Cespedes**

Know your status before you're at risk. And if you're negative, how do we help you stay negative? And if you do have HIV, how do I get you on meds before your immune system puts you at risk of getting these bad?

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Leslie Schlacter

I'm so glad our viewers, our listeners are hearing that because, like, I could imagine somebody would come in, they're like, oh, I'm just here for an ankle sprain. Why are you. But yeah, it's just part of the process everywhere.

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Dr. Michelle Cespedes

And when you, routinized it, they're not judging me. Do they think I'm doing.

00:04:48:32 - 00:04:49:03

Leslie Schlacter

Yeah. I'm not.

00:04:49:13 - 00:05:08:13

Dr. Michelle Cespedes

Filing. I'm using drugs to do that. What does it. No, I everyone I that's awesome. Right. So I was mentioning to you earlier that, I lived in Chelsea for 20 years. One of the things I used to do is talk about misperceptions of risk. Right? People think, oh, I don't do that or I don't have this risk factor.

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Dr. Michelle Cespedes

I used drugs and I used to say, well, you know, I'm a doctor, I'm educated. I do a lot of work in other countries. But one of the things I always do is get an HIV test about once a year. And now, like, why you're married and I said, well, part of it is if I'm going somewhere that might have a higher kind of prevalence of HIV in that country, I need to know my status before I go somewhere.

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Dr. Michelle Cespedes

But even just the fact that I live in this part of New York City that has high HIV rates, I'm actually probably more at risk of getting HIV just because of where I live. Right? Not because of, drug use or other risk factors than, let's say, someone who's from a different part of the country that has very little HIV.

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Dr. Michelle Cespedes

Right? You know, someone who's using I.V. drugs in a part of, you know, Utah or Wyoming, there's very few humans in Wyoming, right. But that helps dispel what? Misperceptions of risk.

Right. Your zip code can be a bigger factor for your risk of getting HIV. More than some of the other things. So I think that takes the it takes the pressure off.

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Dr. Michelle Cespedes

Yeah. Right. Yeah. This is just health.

00:06:16:57 - 00:06:40:15

Leslie Schlacter

This is health. Can you walk us through the incidence prevalence. And then we'll talk about treatment of HIV over the years. Because you know I'm 46 years old. I mean I remember when Magic Johnson had, you know, everyone of our age remembers when he was like, right. Everyone got scared. And it's totally different now. So can you kind of walk us through the history of of incidence and prevalence?

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Dr. Michelle Cespedes

So incidence and prevalence really makes a difference. Kind of incidence means kind of how many new people are diagnosed or have the disease prevalence or how many people actually have it and are alive with it. Right. Prevalence is actually a little bit more because we're testing more people and picking them up like, you know, while they're alive.

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Leslie Schlacter

And keeping.

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Dr. Michelle Cespedes

We're keeping them alive longer. That's that's the trick. I want prevalence to go and I want incidence to be zero. I'd rather write no one, have newly diagnosed HIV, but over time, the the biggest advances are really kind of scrutinizing, making sure people get tested, know their status and do it routinely. If they're at ongoing risk. And the biggest kind of, new kid on the block over the past 13, 14 years or so is the ability to prevent HIV.

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Dr. Michelle Cespedes

If you're, you're in a group or, you know, you at ongoing risk. We've actually found instead of taking at least two medicines or two different classes of HIV medicines for treatment, if you actually have medicine inside your system already before you have that either risky sex act or.

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Leslie Schlacter

That's called prep, right?

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Dr. Michelle Cespedes

That's called Prep, right? Pre-exposure prophylaxis. We can actually prevent HIV more than like 97% for people are in the highest risk factors for the first decade or so. It was a tablet that you can take every day. Our French scientist counterparts, they said, look, what if I'm not at risk every day or. No, I'm just going here for this much information.

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Dr. Michelle Cespedes

Once it's here, there is an option called on Demand Prep. You can take it or within a day or so before the risky sex act, if you know when that's time is going to be. And then for a day or two after, so that's called on demand prep. But actually in the last three years, we've actually had the ability to actually give what's called long acting injectables.

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Dr. Michelle Cespedes

So instead of having to take a pill every day, there are two options. There's one options to get an injection once every two months for HIV prevention. And just this summer, just a few months ago, there's actually another option that not a not an injection in the muscle, but under the skin, subcutaneous that last every six months. Wow.

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Dr. Michelle Cespedes

So isn't that that's incredible. I'm like, that's pretty great.

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Leslie Schlacter

Is that something that you get that in a doctor's office?

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Dr. Michelle Cespedes

You can get it to yourself. You can get it in a doctor's office. You know, because that's newly FDA approved, some of the clinics that are familiar with pre-exposure prophylaxis and maybe even this other injectable that's been around for a year and a year and a half or so, probably have faster access to it. But the fact that it's available and FDA approved and options.

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Dr. Michelle Cespedes

Right.

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Leslie Schlacter

A lot of people come knocking for that one. When it came out, people.

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**Dr. Michelle Cespedes**

Knew about it. I think now we're making sure that their insurance covers that. It's a new kid on the block.

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**Leslie Schlacter**

Yeah.

00:09:36:57 - 00:09:48:52

**Dr. Michelle Cespedes**

So scientists, we have been waiting for it. You know, Sinai, we enrolled people in this study that, you know, compared it to the the standard, tablet once a day tablet option for pre-exposure.

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**Leslie Schlacter**

What's your preference for patients, or is it like patient dependent?

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**Dr. Michelle Cespedes**

It's patient dependent. What works best for you. Right. Because pre-exposure prophylaxis means that you're likely still at ongoing risk for acquiring HIV. You know, it only prevents HIV, but there are other STDs, right? So people come in for testing, for syphilis, for chlamydia, for gonorrhea. We make sure the medicines are, you know, agreeing with their body, not giving them any side effects, every opportunity to see them talk about risk or ongoing risk.

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**Dr. Michelle Cespedes**

Right, right. You know, I'm with a dedicated partner. No, we're not seeing other people. We both know our status. I don't necessarily think I need it longer. So still points of contact. So we still see people every 2 to 3 months for the other STD testing. But some people prefer tablets. Some people say I already have to say some people are scared of needles.

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**Leslie Schlacter**

Just options of the patients that are good candidates for prep. No, doesn't matter the type. Okay. How many of them do you think are actually getting it? What percentage are actually participating appropriately?

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**Dr. Michelle Cespedes**

So part of it around the country where we are at an advantage in New York City, sometimes, you know, the states or what they will cover or our insurances. New York is it's been very proactive for the whole past decade, making sure people have access to Prep if they wanted

and meet criteria regardless of their kind of ability to pay.

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**Dr. Michelle Cespedes**

Or we think it's important enough to prevent HIV, that New York State has actually dedicated funds and resources, and partnered with some of the pharmaceutical companies to get discounted rates.

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**Leslie Schlacter**

Right, right.

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**Dr. Michelle Cespedes**

So people who need it get it. It's not that easy around the country. Right. And insurance differences and whether some states have opted in or out of kind of Medicaid or, or expansion states. So it makes a difference. So one of the organizations that I sit on the board of, I sit on the board of the HIV Medicine Association, and also I'm on the board of directors for the Infectious Disease Society of America.

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**Dr. Michelle Cespedes**

One of the things that we advocate for, especially in this changing climate of, competing priorities, I think in terms of health or what constitutes health and, science and information and kind of research, based, information. One of the things that we advocate for is education and access, right, right. Making sure our colleagues on, on Capitol Hill who sit on some of these committees that decide where funding goes or making sure they they know the burden of HIV and all the advances that we we have come or obtained over the years, and making sure they prioritize equal access to that or prep for all and access to treatment.

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**Dr. Michelle Cespedes**

The other thing that's interesting is that I think I take it for granted. I'm in New York. I have colleagues competing in different competing institutions. The two Black Sea or mile or two year, we take it for granted that most counties across the United States don't even have an ID physician or a doctor who's well trained or really familiar with this.

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**Leslie Schlacter**

That was a thing. I didn't take that for granted.

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**Dr. Michelle Cespedes**

I didn't realize that. So it turns out about 80% of counties don't even have one ID physician. So



one of the things that we try to network just.

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Leslie Schlacter

For those listening ID is infectious.

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Dr. Michelle Cespedes

And infectious disease. You know, if you want to stay healthy and stuff like that, things that you don't want to catch in the airport or, or your kids to bring home, people usually call or get to us some way or another. One of the things we try to do is make sure that we're accessible or able to network, either through telemedicine, teaching, advocacy, all these other things for people who might not necessarily see as many people living with or at risk of HIV as well, but making sure that they have access to the resources, the, the guidelines and, and things that have been a little bit harder to access over the last few

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Dr. Michelle Cespedes

months with some of the the change in administration or how they disseminate information.

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Leslie Schlacter

Yeah. No, I can imagine. Yeah. So there's the prevention, which was like Prep has done a really good job and then there's like the initial treatment and then hopefully kind of maintenance long term. So when something when somebody does present with new onset HIV okay. And I'm not talking about the people where it's kind of they came to the ER for the ankle sprain.

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Leslie Schlacter

It was picked up. If someone is actually newly diagnosed and they're ill, what does that look like to become sick with HIV.

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Dr. Michelle Cespedes

So it's different. It's different for different people. So the things that we're seeing now, hopefully if someone's in care has access to a doctor and everything else going well, if they're newly diagnosed on the outpatient side, we kind of make sure that their kidneys are okay. We're making sure there's no other infections. There are a couple of infections, actually, that we're very mindful of things that travel or that you can acquire the same way that you can acquire HIV.

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Dr. Michelle Cespedes

So we mentioned sexually transmitted diseases, but especially hepatitis B and hepatitis C kind of the same either social things and also sexually transmitted. But it turns out HIV medicines,

some of the HIV medicines also treat hepatitis B. So one of the things we're very mindful of is finding out someone's hepatitis B status.

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Leslie Schlacter

So there's probably like a new diagnosis order.

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Dr. Michelle Cespedes

There's a new diagnosis order set. We want to make sure that you're healthy. Otherwise we're going to check for the other STDs. We're going to check what's called a hepatitis panel. Hepatitis A, B and C hepatitis A is and sexually transmitted. But you know, food borne. And when you travel but there's a vaccine for it. Right. So let me find out if you need a vaccine I'll get one to you okay.

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Dr. Michelle Cespedes

Hepatitis B sexually transmitted. You can also get it through IV drug use or be born from it. Born with it if your mom has it. But because our some of our HIV medicines can also suppress or treat hepatitis B, I really want to know if you have that. That don't make me choose different medicines, but I can also vaccinate you against that as well.

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Dr. Michelle Cespedes

Right? So if you, the vaccine wasn't available when we were kids, but most of us, especially if you work in a hospital or maybe going through college, I think I got mine in med school. You can get a vaccine then as an adult. But for the most part, we try to vaccinate children so you'll never get it right, just in case your mom had it or got exposed during pregnancy.

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Dr. Michelle Cespedes

Vaccinate you now. But there are some people who just didn't get a vaccine as a kid, right? And then the third of the hepatitis panel, we also do hepatitis C, again, not a vaccine for it, but one of the few, one of the the only hepatitis virus that we can actually cure HIV and hepatitis B we suppress with medicines.

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Dr. Michelle Cespedes

So you need to be on medicines for a long time. For now, we're working on cure, but hepatitis C has a different kind of life cycle. And we can actually cure hepatitis C. So, finding out whether someone has hepatitis C at the same time they have HIV, we get them on treatment and cure it in a, in a couple of months.

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Leslie Schlacter

What else on that list?

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Dr. Michelle Cespedes

Other, STDs or other STDs.

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Leslie Schlacter

And then do you get like labs, X-rays, like what is kind of like your you don't.

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Dr. Michelle Cespedes

Necessarily go and get, chest x rays for everyone, but it depends on if they're in that age. Kind of like that bottom of the barrier really susceptible to a lot of infections they might not even feel yet. We kind of do a little bit more work if they have a normal immune system, like the HIV hasn't been around long enough to knock down their immune system.

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Dr. Michelle Cespedes

Again, we do like the basic labs. Are your kidneys okay? Is your liver okay getting the hepatitis land? The other things that we get is what's called a CD4 count. That's the one that measures the strength of the immune system. Right. Normally if your viral.

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Leslie Schlacter

Load for the HIV virus.

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Dr. Michelle Cespedes

The HIV viral load, I try to tell patients are kind of like the number of copies of virus in your blood. When I give you medicine, I want the medicine to get that to undetectable or, you know, so it's you still have the virus, but the medicine is putting pressure on it.

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Leslie Schlacter

And then we want the CD4.

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Dr. Michelle Cespedes

CD4 count is your soldiers your immune system. So I want that in the normal range. Right. And CD4 is are supposed to fluctuate like you and I, even if we don't have HIV. Like if I get a vaccine or if I get a splinter and get a little infection, my CD4 count goes down, it goes and fights that infection.

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Dr. Michelle Cespedes

It leaves my bloodstream, fights an infection, and then naturally goes up. I might not even feel that, but you want to have a certain number of soldiers that can take care of little things, so you don't even get sick or feel that, but when it's too low, that's when people have Aids or get infections from things that they shouldn't.

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Leslie Schlacter

So if the CD4 count is low because it's busy fighting the HIV virus, it can't send those soldiers to fight. You know, these other things.

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Dr. Michelle Cespedes

It's trying to it's got competing priorities. Remember?

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Leslie Schlacter

That's why you're.

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Dr. Michelle Cespedes

More that's right. Like more susceptible to other things. Okay. Because we we have things in our body. We get inundated, you know, we we eat parasites. We don't see dirt at the bottom. We put in dirt. And I'm sure you do. I saw you on that dusty cup that, you know, all jokes aside, but you really don't realize how well your body is protecting you, right?

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Dr. Michelle Cespedes

The whole time. Your skin's protecting you from from all this other stuff, right?

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Leslie Schlacter

What about when I was looking into you getting ready for today? I learned that one of your focuses is HPV. Correct? Human papillomavirus. So how does that relate to HIV or coincide like you were talking about with hepatitis.

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Dr. Michelle Cespedes

So similarly, there's some of these viruses that essentially ubiquitous we've come across this stuff, you know, we've been kissed or we've shook hands with something. We've we've gotten sick before. I'm not sure if you're old enough. I actually had chickenpox as a kid.

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Leslie Schlacter

Oh, yeah, I did.

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Dr. Michelle Cespedes

You know, there's a chicken pox vaccine, so our kids probably don't get.

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Leslie Schlacter

You know.

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Dr. Michelle Cespedes

They don't one through one. And I still have some scars and such there. Right. But there's some viruses that essentially live inside your body that your immune system keep in prison or keep in jail. Right. And there are other viruses that your body sees, but over time we'll get rid of it. Right? HPV is one of those viruses that most of us have been exposed to over time, especially once we start having sex.

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Dr. Michelle Cespedes

But our body can usually get rid of it in a year or so. Women with HIV actually tend to. That virus tends to stay around longer and cause more problems. So when we go for our Gyn and get a pap smear, this.

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Leslie Schlacter

Is us getting past this.

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Dr. Michelle Cespedes

This is if, you know, you know, right, with the young people say, if you know, you know, you know. Right. So when you get a pap smear, a pap smear is looking for evidence of, abnormal cells caused by HPV, the virus. Right? Right. For the most part, if you get some virus there, your body can take care.

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Dr. Michelle Cespedes

If it's there too long, you start to have some damage or some abnormal cells, then your.

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Leslie Schlacter

Kind of risk for cancer.

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Dr. Michelle Cespedes

Yeah. That's right, HPV. There are many, many different types of HPV. Two types. The main two types, can cause either warts. Not sexy. Going to make you sick now, but nobody wants warts if they can avoid it. Right. Preferably. And there are several types that actually are pre-cancerous or more likely to cause cancer. Now. So for the past, since we went down about, 18 years or so, there's actually an HPV vaccine, the.

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Leslie Schlacter

Gardasil.

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Dr. Michelle Cespedes

Vaccine, Gardasil vaccine. When it came out, it only helped your body make antibodies to about four types, two of them that cause warts, and another two that were the the biggest ones that caused cervical cancer and even anal cancer and penile cancer. So that was called Gardasil for four time. Now we have Gardasil nine. So still covering the two for warts.

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Dr. Michelle Cespedes

But then now the top seven that are actually kind of the most common that cause cervical cancer and the precancerous ones.

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Leslie Schlacter

So for people who have like I have teenagers. Yes. My daughter 17, my son is 19 and they had Gardasil years ago. Are they supposed to be getting the updated dose.

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Dr. Michelle Cespedes

No that's fine.

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Leslie Schlacter

Oh that's fine. What if they had five. I want them to have nine.

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Dr. Michelle Cespedes

That's okay. They've done enough right. So you know going to a routine care and then the biggest thing so it's not even just a benefit to them. The biggest thing that's more important is what's called the term herd immunity. The more people in the society who actually just given get the vaccine, the the your kids are.

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Leslie Schlacter

17, so.

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Dr. Michelle Cespedes

They only got theirs about 6 or 7 years ago. I think it's already up to the nine veil into one already. Okay. But more importantly, it's more important for everybody or as many people as possible to get vaccinated so that there's just less HPV floating around no matter what. And then, it'll cause more protection on a, like, a community scale.

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Dr. Michelle Cespedes

Okay.

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Leslie Schlacter

So what happens with HIV patients with HPV, they're more likely to have.

00:22:20:36 - 00:22:41:38

Dr. Michelle Cespedes

So they're more likely to have, the HPV stick around in their body longer. So we're more mindful of screening now. Okay. And then the other thing it's really we, you know, we were born that way, right? Time that our kids were born at the right time. Even more importantly than just the scraping and looking under the microscope, we can actually do DNA.

00:22:41:49 - 00:23:03:20

Dr. Michelle Cespedes

And it's kind of like looking quickly for some of these high risk types so it can determine, you know, you got some HPV. They're not the ones most likely. Maybe we just give you another pap smear instead of waiting three years, maybe six months or a year instead of waiting this one. So it can really help you determine next steps or how frequently or how often you should be screening.

00:23:03:25 - 00:23:27:45

Leslie Schlacter

I feel really lucky that I work in health care. I'm fully aware of the benefits that I have of being someone who knows how to use health care to the benefit of myself and my loved ones. What? How do you handle the populations of people that just don't have the health care knowledge to advocate for themselves, to get all this preventative health, but also to screen and treat appropriately in the right populations?

00:23:27:45 - 00:23:29:15

Leslie Schlacter

So how do you manage that in your work?

00:23:29:15 - 00:23:58:01

Dr. Michelle Cespedes

So one of the things I'm very mindful of is, when people talk of either about health literacy or access and I say, is it an access or literacy or is it messenger? How we're we're speaking about it. Right. Okay. So I think being mindful of how we message and maybe who the messages coming from, right. Should it be maybe a younger person for college kids, should it be me for, you know, older black ladies in New York City or postmenopausal ladies or, or things like that.

00:23:58:06 - 00:24:23:33

Dr. Michelle Cespedes

So I think working on misperceptions of risk, not just from the patient's side, but as I mentioned before, even from the health provider side. Right. I've seen older people in their 60s and 70s newly diagnosed with HIV, who have primary care doctors, who doctors never spoke to them about sex or risk or just assume that they're okay. Yeah, I'll never forget.

00:24:23:36 - 00:24:24:57

Leslie Schlacter

Oh, I'm guilty.

00:24:24:57 - 00:24:42:27

Dr. Michelle Cespedes

I've never forget, when I worked at another institution in the city, a woman in her 70s, 72. I remember her clearly. 72 years old. Was being followed by the primary care clinic, you know, had asthma and getting pneumonia once in a while, but just had a pneumonia that was really.

00:24:42:31 - 00:24:43:15

Leslie Schlacter

Just just.

00:24:43:26 - 00:24:52:57

Dr. Michelle Cespedes

Acting just not right. Or she was very sick. She had to get hospitalized. And it turns out that she had what's called PCP pneumonia or pneumocystis, you know, Carine or.

00:24:53:02 - 00:24:54:40

Leslie Schlacter

You know, not used to like Jerry Vicki, like.

00:24:54:43 - 00:25:09:16

Dr. Michelle Cespedes

When I was like, that's a new name. You know, we have the letters for it, but PCP in my eyes.



And they called an infectious disease council. What's happened? Why does she have this? This is, you know, this is so we get how we talk to her. You know, you know, I doctors, we think of HIV. We did a few of this.

00:25:09:16 - 00:25:25:44

Dr. Michelle Cespedes

It turns out she was in fact infected with HIV, even though she did not know had it. She did not know she had a primary care doctor. She was seeing a couple times a year, or who had asthma and stuff like that. And she goes, actually, my my husband had it or died of it or something like that.

00:25:25:48 - 00:25:31:33

Dr. Michelle Cespedes

No one ever asked me. I thought maybe I was you guys are testing me or something like that too, but just thought I didn't have it.

00:25:31:33 - 00:25:32:01

Leslie Schlacter

Fortunate.

00:25:32:07 - 00:25:50:15

Dr. Michelle Cespedes

I just thought I didn't have it, but just no one thought about it or I think people are not necessarily comfortable talking about some of the risk factors of HIV. So sexual health, taking a deep sexual history, drug, drug use history, even I can say I was guilty of it when I was dating. Did you really ask them whether you were dating?

00:25:50:15 - 00:25:52:06

Dr. Michelle Cespedes

Have you ever used I.V. drugs? Right?

00:25:52:06 - 00:25:52:40

Leslie Schlacter

Yeah.

00:25:52:55 - 00:25:57:14

Dr. Michelle Cespedes

Did you get an HIV test before you and I become intimate? Not easy stuff.

00:25:57:14 - 00:25:58:37

Leslie Schlacter

No, not easy, you know?

00:25:58:37 - 00:26:15:09

Dr. Michelle Cespedes

But, it wasn't easy then. It's not easy now. But, once I'm comfortable talking to everyone about that, I ask everyone. I usually start off if I'm meeting a new patient, saying, I'm going to ask you some personal questions. And they say, how much do you smoke? And that kind of like, oh, that's not that person. Yeah.

00:26:15:10 - 00:26:16:23

Dr. Michelle Cespedes

Or how I'm really.

00:26:16:28 - 00:26:17:18

Leslie Schlacter

Getting started that.

00:26:17:18 - 00:26:35:04

Dr. Michelle Cespedes

Just getting started. Right. But they realize I'm kind of asking everyone the same questions. Do you have sex with men? Women are both all right. What are your preferred pronouns? Right. Is there anything else that you do right. Even, women who have only have sex with women, we talk about, you know, risk factors. What are your other partner doing?

00:26:35:09 - 00:26:46:19

Dr. Michelle Cespedes

Shared toys, open relationships. And they're like, oh, this is something that you do every day. It's not that you're making a judgment about me. I was like, no, I don't like, you know. Yeah, I could probably add more years to your life if I get you to stop smoking.

00:26:46:19 - 00:26:46:56

Leslie Schlacter

Right, right, right.

00:26:46:57 - 00:26:55:19

Dr. Michelle Cespedes

Eating fast food and just going things like that, too. But HIV is just a part of the care. And I do this for everyone. It's not about you, it's about health.

00:26:55:24 - 00:27:01:08

Leslie Schlacter

The I mean, that's I'm sure that's that you. That story comes up all the time about this. The 72 year old.

00:27:01:10 - 00:27:02:20

Dr. Michelle Cespedes

Forget it. I do mention it.

00:27:02:34 - 00:27:23:25

Leslie Schlacter

But people you don't need to like go through a divorce or move into an assisted like this could happen any time you could be in a committed marriage. And. Right. You never know. So it is something that like you can't just be done with. Once you get married, you have to continue doing it because you just never know.

00:27:23:25 - 00:27:46:31

Dr. Michelle Cespedes

So I think having open conversations and feeling kind of, trusting your medical provider enough to be open like that, right? It's I always find it interesting when we have patients in clinic who come to us just for their HIV care or their HIV prevention, but have another doctor somewhere. They're like, that doctor doesn't know about what I do or other stuff, or they're not as good with it or they've never asked me.

00:27:46:46 - 00:27:48:19

Dr. Michelle Cespedes

I said, oh, okay, you know what?

00:27:48:19 - 00:28:04:54

Leslie Schlacter

I just thought of you. You were saying that like when somebody comes into the E.R., it's just part of the questions to ask. What if, like LabCorp, quest bio reference, all these labs, like, I send my patients for labs all the time? What if you were able to say, like, when you're sitting in the room, there was a sign that said, would you like an add on?

00:28:04:58 - 00:28:08:24

Leslie Schlacter

Like, can I do that? Or it has to be ordered by a provider, though that.

00:28:08:24 - 00:28:16:48

Dr. Michelle Cespedes

Has to be ordered by a provider. But we've actually made it easier. I don't know if you remember when you were in training, there used to be all this counseling and, you know, HIV.

00:28:16:53 - 00:28:19:07

Leslie Schlacter

You have to sign a for this policy.

00:28:19:12 - 00:28:33:01

Dr. Michelle Cespedes

Now, we've made it easier as part of health care. Do you agree or do you say yes? You can't just HIV test someone without their knowledge, but it doesn't have to be kind of like this. Make

sure they're not going to jump out of a window. Are they going to attack me or what? Is it? No, bring it down.

00:28:33:02 - 00:28:56:22

**Dr. Michelle Cespedes**

Right. HIV is not a death sentence or it's not what it kind of was perceived. And I think some people still have that feeling from the 80s. HIV is a chronic, manageable disease, right? Your life expectancy essentially is the same if you get diagnosed with HIV in your 20s, but you're in care and take your medicines, your life expectancy is expected to be 73, 74.

00:28:56:22 - 00:29:07:13

**Dr. Michelle Cespedes**

You know, depending on what state and other things like that. So I was serious when I kind of jokingly said, I can add more years to your life, not just by knowing your HIV status. If I get you to stop smoking.

00:29:07:13 - 00:29:08:18

**Leslie Schlacter**

Yeah, that's right. That's the.

00:29:08:28 - 00:29:16:58

**Dr. Michelle Cespedes**

Convincing. My patients to get your colonoscopy. It's not your HIV that's going to take you out. It's you not following through with your colonoscopy or other things that I can help prevent.

00:29:16:58 - 00:29:26:06

**Leslie Schlacter**

Yeah, I would imagine that's changed over the years. Like 40, 50 years ago, people were dying of Aids. Now people are dying with it, not from it.

00:29:26:06 - 00:29:53:34

**Dr. Michelle Cespedes**

Correct. So, Sinai is one of the few places remaining even in the city, but even around the country that still has a dedicated, inpatient HIV service. You know, we don't call it that, that, for laypeople on the internet, but essentially, a medicine service that's dedicated to taking care of the, the people living with HIV who would kind of also benefit from an HIV doctor's knowledge, like, you know, if you're here for your heart attack or your knee replacement, then you have HIV.

00:29:53:34 - 00:30:23:58

**Dr. Michelle Cespedes**

You don't necessarily need that specialty service, but people ask or when residents are interviewing or they want to come here or join the program, they're like, why? Or what's different about Sinai? Or why are Sinai's patients no such thing? I'm like, no, no, no, it's why you're Sinai's patients doing so well and living so long. Right? An interesting thing about Sinai is that

as an institution, we are the institution that has the largest number of people living with HIV who have received organ transplants.

00:30:24:07 - 00:30:54:30

Dr. Michelle Cespedes

Right? Yep. So you think about that. It used to be a contraindication. We were one of the few sites around the country who were part of the studies that, actually allowed people living with HIV to accept, transplants from other people, you know, living with HIV. Now, we actually even expanded that. But people are living so long and so well that their immunosuppression or the medicines we give them to keep their immune system down is because we don't want them to reject DNA from somebody else's kidney, right?

00:30:54:30 - 00:30:59:51

Dr. Michelle Cespedes

Their transplant, but they still kind of need the expertise of someone who deals with infections and people.

00:30:59:56 - 00:31:03:10

Leslie Schlacter

It's not like, you know, because they're dosage adjustments for that, because of all of that.

00:31:03:12 - 00:31:31:27

Dr. Michelle Cespedes

They need different, immunosuppressive. But if they have a normal CD4 count number. So like a normal immune recovery immune system, they get kind of normal, dosages of the immunosuppressive medicines so they don't reject the transplanted organ. But if they're coming into the hospital, let's say they have a pneumonia or a urinary urinary tract infection. Your immune system is a good thing to help you get rid of infections and stuff like that.

00:31:31:31 - 00:31:44:24

Dr. Michelle Cespedes

So we will adjust their immuno, their transplant, immunosuppressive maybe for a week or so so they can help get rid of this infection, but probably not long enough that they're going to put that transplant at risk and then bring it up and stuff like that.

00:31:44:24 - 00:31:57:37

Leslie Schlacter

So patients because now patients are living longer and better with HIV and they're not getting into the Aids category. Those patients are going to get cancer. They're going to have it like so what happens with HIV patients who need to go on chemo or immunotherapies.

00:31:57:37 - 00:32:29:51

Dr. Michelle Cespedes

Get their chemo. We adjust or choose HIV medicines that won't interact with their chemo often.

But there's some infections that can lead to cancer. And we talk about HPV. Yeah. Right. So HPV I think most people think of it as cervical cancer. Right. Or cervical cancer only. It's associated also with anal cancer. Right. So there are other infectious etiologies that lead to cancers that we used to see more in people with HIV in the 80s and 90s before we had good medicines, before we tested people early.

00:32:29:56 - 00:32:35:22

Leslie Schlacter

When I was in college, I was in urology for ten years. We saw, a lot of the patients with penile cancer carry.

00:32:35:27 - 00:32:48:14

Dr. Michelle Cespedes

Which so HPV. Right. But, you know, I think even for all of women or most of America, we were getting pap smears. We were always taking care of the cervix. You know, people weren't getting routinely anal pap smears. Right.

00:32:48:19 - 00:32:49:07

Leslie Schlacter

Well, now they do now.

00:32:49:13 - 00:32:49:42

Dr. Michelle Cespedes

Well now, you.

00:32:49:42 - 00:32:50:56

Leslie Schlacter

Know for.

00:32:50:56 - 00:33:13:12

Dr. Michelle Cespedes

HIV patients if you're in these categories. So what we've seen is all of the other cancers that were associated with Aids in the 80s and 90s, almost down to zero. Yeah. Except anal cancer. Right. So people used to ask, why didn't we see this in the 80s and 90s? I said, you know, it. People were dying of PCP pneumonia in two weeks, right before they.

00:33:13:17 - 00:33:13:48

Leslie Schlacter

Lived long enough.

00:33:13:49 - 00:33:35:51

Dr. Michelle Cespedes

They didn't live long enough to even have the luxury of getting cancer diagnoses or things like that, too. So now we're kind of learning from what we've done with cervical cancer, proper

screening, getting the right people, treating it, keeping people's immune system high long enough, that we're more mindful and we do a lot more HPV anal cancer screening for both women and men.

00:33:35:51 - 00:33:43:40

**Dr. Michelle Cespedes**

And again, not just men who have sex with men or even if you've never had, anal receptive intercourse, you might still be at risk.

00:33:43:40 - 00:33:53:36

**Leslie Schlacter**

So that's a perfect transition. I wanted to ask you. You kept you kept saying risky behavior. Our at risk population. Can you rank risky behavior? Okay.

00:33:53:49 - 00:34:18:51

**Dr. Michelle Cespedes**

So sometimes again, remember similar like I said, sometimes your zip code is, it's kind of who you're having sex with. Depending on if there's a high, prevalence of HIV in a particular group. Okay. So in terms of there's risky sex acts, right. And of course, I.V. drug use, if you're using, needles that somebody else has been using and unclean needles, we've seen that.

00:34:18:55 - 00:34:44:07

**Dr. Michelle Cespedes**

But again, sometimes it's really more about the population that you're having sex with. So in terms of that, I think highest risks, in terms of acts or things that you can do, sharing needles for IV drugs. No bueno. All right. So what's interesting, over the last decade or so, I think we kind of think of HIV hotspots as the hotspots in the 80s and 90s Miami, San Francisco, New.

00:34:44:07 - 00:34:45:05

**Leslie Schlacter**

York, major cities.

00:34:45:07 - 00:35:04:54

**Dr. Michelle Cespedes**

Major cities, places that are known LGBTQ friendly or or hotspots or where people find community or, and where some of these communities might be more marginalized or, have sex in exchange for shelter or money or food and things like that, but also, other risky behaviors.

00:35:04:58 - 00:35:08:06

**Leslie Schlacter**

Like blood on needle getting put into.

00:35:08:11 - 00:35:31:37

**Dr. Michelle Cespedes**

But what we're seeing is HIV pop up outbreaks in interesting places. About ten years ago, a small section of Indiana had an HIV outbreak, West Virginia. And then, like, what's going on? Those aren't, you know, big LGBTQ havens, right. And this is literally sequelae of the opioid crisis. So essentially, pain medicines where people are taking pills and tablets.

00:35:31:48 - 00:35:32:22

Leslie Schlacter

Escalated.

00:35:32:22 - 00:35:54:12

Dr. Michelle Cespedes

Money runs out. Heroin or I.V. heroin uses, often kind of like the next step in, in that paradigm or in that continuum and places that maybe didn't have ID docs or weren't used to seeing hepatitis B or, you know, infections that you get with needles and needle exchanges maybe didn't have, you know, New York City.

00:35:54:12 - 00:35:57:43

Dr. Michelle Cespedes

We've been offering people clean needles, you know, as part of harm.

00:35:57:43 - 00:35:59:22

Leslie Schlacter

Like if you're going to do it, here's.

00:35:59:27 - 00:36:07:53

Dr. Michelle Cespedes

You know, not ideal, right. But I didn't know in some parts of the country, actually, if they find clean needles on you, it's actually an offense that you can get arrested for.

00:36:07:53 - 00:36:08:45

Leslie Schlacter

I don't know that either.

00:36:08:56 - 00:36:27:12

Dr. Michelle Cespedes

Another friend of mine who works, in the Midwest, he goes, Michelle, you take it for granted that you guys are in New York City. You guys have trains or commutes, stuff like that. He goes, if you're using drugs, are really desperate for money, what would you do for money? I, he's like, I think, you know, it'd rob or steal or something like that.

00:36:27:12 - 00:36:40:04

Dr. Michelle Cespedes

Right? He goes, well, if you have something that you could sell, what would you like? What are you selling it? He goes, most people, the thing that they could sell to get money quickly is your



car. That's like car. New York most of us don't have.

00:36:40:08 - 00:36:40:36

Leslie Schlacter

Yeah.

00:36:40:41 - 00:36:55:22

Dr. Michelle Cespedes

They're like, no, you get because. But what happens when you sell your car because you can't get too far? You get you around your friends in a bike, right? So now all of a sudden you're kind of using and exchanging drugs and having sex with people right in your community who are also maybe caught up in the opioid crisis.

00:36:55:37 - 00:37:09:07

Dr. Michelle Cespedes

And then you'll see outbreak. All it takes is one person coming in with hepatitis C or HIV and that whole community. It was really fascinating to get all the details about that Indiana outbreak about ten years ago.

00:37:09:07 - 00:37:11:02

Leslie Schlacter

So I've drug abuse. Number one.

00:37:11:02 - 00:37:22:06

Dr. Michelle Cespedes

Is risky unprotected sex, especially if you don't know your partner's HIV status or from certain populations where HIV is particularly high in New York.

00:37:22:08 - 00:37:28:06

Leslie Schlacter

In the unprotected sex, does it matter what the viral load is in that person? Of course. Okay, of.

00:37:28:06 - 00:37:43:52

Dr. Michelle Cespedes

Course. So if the person who has the HIV, if one person is positive and one person is negative, the person who has HIV is actually on medicines and undetectable, actually probably unlikely to transmit no matter what if they're there, especially for.

00:37:43:52 - 00:37:44:49

Leslie Schlacter

Another person's on prep.

00:37:44:51 - 00:38:07:18

Dr. Michelle Cespedes

Correct? Okay, so there's, a campaign we did a couple of years ago. It's still around, but you'll see the term U equals U undetectable if you're HIV living with HIV and undetectable U equals UN transmittable. Okay. So that's for sex. You know, we don't have the data for like breastfeeding and yeah you that but really that was a the campaign.

00:38:07:22 - 00:38:28:14

**Dr. Michelle Cespedes**

If one of the partners has HIV the most important thing the partner living with HIV can do to protect their partner is to stay on their medicines and be undetectable. Okay. On top of that, if you want to be extra careful, the HIV, the person who doesn't have HIV can actually take Prep for, you know, even extra protection.

00:38:28:19 - 00:38:39:16

**Dr. Michelle Cespedes**

Sometimes we have what's called discordant couples who are married and want to have a baby, making sure that the the partner without HIV is on Prep, even if the other one's undetectable or they're married.

00:38:39:16 - 00:38:39:32

**Leslie Schlacter**

Right.

00:38:39:41 - 00:38:41:42

**Dr. Michelle Cespedes**

Like that. Right. Being extra safe.

00:38:41:51 - 00:38:46:21

**Leslie Schlacter**

What about the difference between male male partner female male female female?

00:38:46:21 - 00:39:10:16

**Dr. Michelle Cespedes**

So sometimes it's kind of anatomy. The person who is at higher risk is always the receptive partner just because of, like, friction and tears and things that you don't see. Right. Many even, men who have sex with men sometimes, both partners can be the receptive partner. But it can depend on, you know, presence of tears, presence of other STDs.

00:39:10:21 - 00:39:24:17

**Dr. Michelle Cespedes**

That's why it's important not to have any open lesions, not to have any syphilis or anything else that brings inflammation or infection anywhere near or around there. Makes it easier to get HIV. Even if you don't see any breaks and skin or things like that too.

00:39:24:19 - 00:39:25:19

Leslie Schlacter

What about oral sex?

00:39:25:28 - 00:39:32:13

Dr. Michelle Cespedes

So oral sex is a risk, but definitely not as much of a risk as vaginal or anal sex, right?

00:39:32:18 - 00:39:34:30

Leslie Schlacter

Because of like friction and tear against friction.

00:39:34:30 - 00:39:53:56

Dr. Michelle Cespedes

But you know, this is a different orifice, different musculature. And again, open lesions or presence of blood or tears, right? If you have poor teeth or bad teeth or things and stuff like that, gingivitis, anything else that can make it, but definitely a lot lower. I wouldn't say no. Nothing's ever zero.

00:39:54:00 - 00:39:54:21

Leslie Schlacter

Right.

00:39:54:21 - 00:39:58:15

Dr. Michelle Cespedes

But, much lower risk or very few reported cases from oral sex alone.

00:39:58:15 - 00:40:00:03

Leslie Schlacter

What other leads? I.V. drug abuse.

00:40:00:18 - 00:40:26:28

Dr. Michelle Cespedes

Drug abuse, sex acts. Right. Being born to a positive mom. Okay, so one of the things that we do all over the country is every pregnant woman, if she's in care, during her pregnancy, gets tested for HIV at least once and, preferably at least once, and then maybe right in the third trimester, just in case if there's risk or ongoing risk or for not sure about the partner status or anything of this sort.

00:40:26:33 - 00:40:46:07

Dr. Michelle Cespedes

I don't see it often, but every once in a while, we'll come into contact with the mom who declines testing. It's called opt out testing. So we offer this test to everybody, but we let moms know. Even if you say no, all babies who are born or tested for a couple of diseases, you know, making sure their nutrition is ready to handle handling.

00:40:46:13 - 00:40:54:15

Dr. Michelle Cespedes

But HIV is one of those as well. So we'll know the status because all babies are born with their mom's antibodies. Right.

00:40:54:19 - 00:41:14:54

Leslie Schlacter

I would imagine a mom would want to know, like, think. So what if a mom, let's say a mom, is diagnosed at the time she's pregnant? Okay, is it possible, even if that mom has a high viral load, low seed account, that the baby with the mom getting treatment and then getting treated at the time of delivery, that they could not be born with HIV?

00:41:14:54 - 00:41:40:00

Dr. Michelle Cespedes

Most babies are not born with HIV. Okay, so even before treatment was available, the rate of transmission of a pregnant mom living with HIV to the baby, you know, all things being is about 11 to 15% okay, not zero, but right. Great. If we get the mom treated and now we get her undetectable, or at least a viral load below a thousand, that's low to us, right?

00:41:40:04 - 00:41:47:29

Dr. Michelle Cespedes

The baby is not likely to be born with HIV. We give all babies born to moms with HIV. Some medicines anyway, just in case.

00:41:47:29 - 00:41:48:11

Leslie Schlacter

Yeah.

00:41:48:16 - 00:42:11:01

Dr. Michelle Cespedes

And the real risk of transmission to from mom to baby is really, at the time the baby's being born. You know, when the placenta is ripping away from the uterus and there's all that, mixing of blood, there isn't that much mixing of blood before the babies are born. Right? But we can really get that down to essentially less than a fraction of a percent if we get the mom on treatment and undetectable before the baby's born.

00:42:11:06 - 00:42:31:19

Leslie Schlacter

And what about health care workers? So as someone who works in health care in a surgical PA, I had a needle stick many years ago. And you go to the ER, you go to employee health. They you have to ask the patient permission to screen them, and then they ask you if you want to go. How has the incidence of that been going been fantastic.

00:42:31:19 - 00:42:41:00

**Dr. Michelle Cespedes**

So that member we spoke earlier about Prep pre-exposure prophylaxis. Yeah. If you get stuck by a needle and it's a high risk right. We got it. What kind of needle or wait a minute gets it to exactly.

00:42:41:00 - 00:42:42:13

**Leslie Schlacter**

Where are you sure it was.

00:42:42:18 - 00:42:58:59

**Dr. Michelle Cespedes**

Okay? Right. We were in clothes like that to, That's called post-exposure prophylaxis, right? And it can depend on if there's a needle that had blood. Or were you in the patient? Were you sucking out blood from. Right. We're doing all this stuff. But usually most people say, you know what? This is too much for me. Just give me the medicines or I'll figure.

00:42:59:00 - 00:43:16:32

**Dr. Michelle Cespedes**

Right, right. So again, if we know that the patient you got stuck from, whether they have HIV or not, we test them to find out in 15 minutes if they do have HIV, are you undetectable or are you not? When medicines are you talking about? Even if you're undetectable like is you're undetectable. We took that test last week again detectable now.

00:43:16:37 - 00:43:29:43

**Dr. Michelle Cespedes**

So it's all these things that go into your head. But the most important thing if the if the person who gets stuck, you know, drops on or is recommended to start post-exposure prophylaxis is getting that medicine in your mouth immediately.

00:43:29:54 - 00:43:30:50

**Leslie Schlacter**

Like what's immediately.

00:43:30:50 - 00:43:54:09

**Dr. Michelle Cespedes**

So within the first two hours is best right? Within the first 36 hours. Not great, but better than nothing. Yeah. Once you hit kind of after 36, after 72 hours, it's too late, right? Post-exposure is not just for needle six, but also kind of sexual assaults or anything of this sort like that. And then everybody comes in within two hours if they can.

00:43:54:14 - 00:43:55:30

**Dr. Michelle Cespedes**

And other things like you.

00:43:55:30 - 00:44:01:37

Leslie Schlacter

To have had needle sticks in there, like I'm really busy right now. I have discharges, I go at the end of my shift and I'm like, no, you.

00:44:01:42 - 00:44:04:00

Dr. Michelle Cespedes

Go now, go now. No, no that's better. Right?

00:44:04:04 - 00:44:05:11

Leslie Schlacter

Yeah. So within two hours.

00:44:05:11 - 00:44:14:46

Dr. Michelle Cespedes

Within two hours is ideal. Right. You know, if was it occupational health is open. You can go right there. But the e.R. Is always open. Yep. They always have access to one of the.

00:44:14:47 - 00:44:16:03

Leslie Schlacter

They take care of employees. Really?

00:44:16:04 - 00:44:27:50

Dr. Michelle Cespedes

They take immediately. We have all the medicines that you need. We can get you in the clinic. Well, we want to know your HIV status right there. Then just in case, you know, you had HIV for three years and you didn't even know it yet.

00:44:27:50 - 00:44:29:38

Leslie Schlacter

Before you go, blame it on that. Right.

00:44:29:38 - 00:44:43:03

Dr. Michelle Cespedes

And we just don't want to start the wrong medicine. We want to get you all the remember all the other tests and all the other things that we want to do. Right? But we want to make sure that you're HIV negative now that you're okay for women of childbearing potential, you want to know if you're pregnant or not.

00:44:43:08 - 00:45:09:27

Dr. Michelle Cespedes

The medicines are really quite safe. We actually use the same medicines in pregnancy, but we want to have everyone is as informed as possible. We test all women for their pregnancy status,

at the time we start meds, no matter what. But those are some of the things we would do. But it's important. And I've seen sometimes, people in training, surgeons in training, or they didn't want the other surgeon to know that they stuck themselves, like, at the table and just don't want to make a big deal out of it.

00:45:09:32 - 00:45:19:24

**Dr. Michelle Cespedes**

Sometimes pedes in the NICU, those little fat legs can kick, right? You're trying to get stuff. So sometimes it's, you know, not necessarily poor technique. It's just, it happens.

00:45:19:24 - 00:45:21:16

**Leslie Schlacter**

It happens often. Right? Right.

00:45:21:16 - 00:45:39:19

**Dr. Michelle Cespedes**

So again, demystifying it. It's not shame. Like you're doing everything right. I've had some people, they're like, oh, some urine splash in my arm I want. And I'm like, no. Right. Yeah. That's that's not it. Not appropriate. You try to talk them down and really educate. I try to use the radio voice and talk them down. And you know, taking medicines for.

00:45:39:24 - 00:45:41:51

**Leslie Schlacter**

Was migraine bright red. All right.

00:45:41:51 - 00:45:46:03

**Dr. Michelle Cespedes**

To get your eye started right again on your shoe in America.

00:45:46:03 - 00:45:47:00

**Leslie Schlacter**

Yeah okay.

00:45:47:07 - 00:45:55:54

**Dr. Michelle Cespedes**

But I think that's some of the like the trauma or the PTSD about, you know, HIV or 90s or I'm going to die or can't. No one will love me and and I can't have kids. You can have.

00:45:55:55 - 00:45:57:16

**Leslie Schlacter**

Kids. Totally different.

00:45:57:21 - 00:46:13:40

**Dr. Michelle Cespedes**

Totally different now. But it's we we're working on doing a better job of getting the information out right. People, you can have a baby, you can have a family. You don't. You're not necessarily infecting your partner. You're not doing all this other stuff, and you can have a full life or they're they're celebrities, right? Who? Some more open than that?

00:46:13:53 - 00:46:34:03

**Dr. Michelle Cespedes**

Yeah. I was I did an interview with, Charlie Sheen when he, originally announced or disclose that he was living with HIV. We talked a little bit about kind of protecting his partner and the importance of staying on medicines and being undetectable and things like that, too. So even people with access can get it wrong sometimes, too.

00:46:34:03 - 00:46:40:36

**Dr. Michelle Cespedes**

Right. But I think there's something to be said that I have this. I'm living, I'm doing well. We mentioned Magic Johnson earlier. Right.

00:46:40:40 - 00:46:42:40

**Leslie Schlacter**

So he still I think is like the poster is.

00:46:42:41 - 00:46:51:54

**Dr. Michelle Cespedes**

Fantastic and happy and philanthropy and, and traveling on his yacht to Croatia and yeah, that's great food. So, I think that's a good way to see you.

00:46:52:08 - 00:47:06:48

**Leslie Schlacter**

As an expert in your field. And obviously you spend you see patients and research. How do you make sure that the next generation of ID doctors who specialize in HIV get the appropriate training and keep this and that moving in the right direction?

00:47:06:48 - 00:47:31:18

**Dr. Michelle Cespedes**

I think that's a fantastic question. To some extent, HIV isn't necessarily one of the sexiest specialties or idea in general. All of it. But I think kind of making sure they know what a career and ID and what HIV looks like now, I think, you know, I'm on on service with the medicine residents now. So we're seeing sicker patients in the hospital or people not doing well or our transplant patients.

00:47:31:22 - 00:47:53:29

**Dr. Michelle Cespedes**

And I really have to remind them that 90 to 95% of HIV care is outpatient, right? Yeah. We're down to seeing people maybe twice a year, right? Two times Q six months. I just send your labs



their injectables, right? I joke with some of my, medicine colleagues that I trained with, but you have rather than have HIV or diabetes, I'm like, oh, it was every day.

00:47:53:29 - 00:47:57:52

Dr. Michelle Cespedes

Oh, but now they have those injections now, stuff like that, I think. I know, but I.

00:47:57:52 - 00:47:58:59

Leslie Schlacter

Feel like those.

00:47:59:04 - 00:48:05:58

Dr. Michelle Cespedes

Type one and type two blind dialysis. Yeah. Right. Is sexual organs not working well versus an and.

00:48:06:03 - 00:48:14:53

Leslie Schlacter

It's so funny. It's very professional. It would actually be like a layperson. Yeah. Like oh yeah. Yeah, yeah, I don't know.

00:48:14:58 - 00:48:36:53

Dr. Michelle Cespedes

I'm. You see that lady over there? That black two? I don't know about that. Right. So it's joking but not really. Right. Yeah. But I think making sure people understand what HIV looks like, what a career in ID looks like. It can be policy. It could be public health. You can run a department of Health. You can be an advocate for international studies or USAID or the.

00:48:36:59 - 00:49:03:56

Dr. Michelle Cespedes

Well, not USAID, unfortunately, but the importance of vaccines. One of my friends, I was at a meeting recently, and I think the, the discourse over vaccines, yes or no, it's been different even since Covid or childhood vaccines or what does harm look like? Or do we really need it? And I said, someone who's experienced it, it's not great to have measles or Jaurus or a kid who's deaf because of something that was preventable.

00:49:04:01 - 00:49:25:26

Dr. Michelle Cespedes

And but I he had a hat on that says, you know, there's still some people still debate whether vaccines are, the etiology of autism make things worse. Yeah. You know, I do not believe so. And the data that I'm exposed to, it's a dispute that. But he had a hat on that said vaccines cause adults. And I said I love that.

00:49:25:26 - 00:49:26:11

Leslie Schlacter

Yeah, I love that.

00:49:26:18 - 00:49:49:35

Dr. Michelle Cespedes

But, it's kind of learning to think of not just the patient here. We talked a little bit about herd immunity. Immunity, the importance of taking care of the whole community as much as possible. Right. And kind of education and being prepared for outbreaks, bio preparedness, emergencies. They're things that, you know, we couldn't fight or see that we can get a vaccine.

00:49:49:35 - 00:49:52:21

Dr. Michelle Cespedes

We saw for Covid in a year, year and a half. Yeah.

00:49:52:22 - 00:49:54:46

Leslie Schlacter

Which is I didn't even believe outstanding.

00:49:54:46 - 00:49:58:42

Dr. Michelle Cespedes

I didn't even believe it. People like, can we get a vaccine? And I was like, absolutely not, but good luck.

00:49:58:42 - 00:49:59:28

Leslie Schlacter

Yeah.

00:49:59:33 - 00:50:02:07

Dr. Michelle Cespedes

We did right. We we changed. We changed things.

00:50:02:20 - 00:50:12:37

Leslie Schlacter

I feel pretty lucky working in health care that there's not a stigma around HIV anymore. But I know that there is there still is a stigma there. Absolutely. Why is there and how do we get rid of it?

00:50:12:48 - 00:50:46:46

Dr. Michelle Cespedes

I think again, education and I think people because it has to do with either sex or behaviors. People kind of have that thing that you could have prevented this, or it's because you're doing this or you chose this or you deserve this. And again, some leftover either kind of religious or familial things like that. So one of the things we work about, again, is demystifying it, decoupling it from what you do or what sex organ goes in which orifice to more about health, right.

00:50:46:46 - 00:51:10:30

Dr. Michelle Cespedes

Just like when I go to the doctor, unfortunately they weigh me right and and know my blood pressure and that's really because at my age, at my sex and my community, these are the things that put me at risk for not being well, all right. I'm also in that age bracket where HIV is still in kind of the players is the top ten things that can make me sick or kill me.

00:51:10:37 - 00:51:23:40

Dr. Michelle Cespedes

So I should know my HIV status. So everyone should. So I think doctors and health care professionals talking about HIV testing or knowing your status as just part of routine, same conversation.

00:51:23:40 - 00:51:24:37

Leslie Schlacter

Right? Blood pressure. Right?

00:51:24:37 - 00:51:57:18

Dr. Michelle Cespedes

Exactly right. A 30 year old. Are you really going to have a heart attack? Oh, you know, not right now, but it's good to know, right? You're probably more likely to be at risk of having new sex partners dating unprotected sex, know your HIV status and things like that. Yeah. So stigma and again, marginalized communities or or populations that have higher risk of acquiring HIV, unfortunately in this country tends to be, not just men who have sex with men, but men who have sex with men of color, transgender, but transgender of color especially.

00:51:57:23 - 00:52:22:03

Dr. Michelle Cespedes

And we're doing a better job, women of color, in terms of new HIV infections, but still outpacing their white counterparts in terms of, you know, black women only make up about 12, 13% of the population, but almost about 4,050% of all the women new women diagnosed. And similar for for men who have sex with men, especially of color.

00:52:22:03 - 00:52:28:01

Dr. Michelle Cespedes

So if everything was equal, would be we'd be 14% of the population, would be 14% of the new diagnosed.

00:52:28:01 - 00:52:35:06

Leslie Schlacter

And that's where the demystifying and stigma needs to focus, right? What about cure? How far away we from a different right.

00:52:35:06 - 00:52:58:44

**Dr. Michelle Cespedes**

So remember I spoke a little bit about we can cure hepatitis C, HIV and hepatitis B two things that we suppress right now. Right. Right. Because HIV is clever when it's making copies of itself and it's making new babies or new viruses for the viral load. Part of that life cycle is the genetic information from the HIV virus sticks itself into your DNA.

00:52:58:44 - 00:53:23:21

**Dr. Michelle Cespedes**

Right? So we want that right to kind of take over the protein making factory of your your CD4 cells to make more copies, right? The way I explain it to residents or people in training. Imagine if you think of your CD4 cells as your soldiers. If your soldier sees something that's going to kill them, right? If there's poison gas or bullets out there, they're going to go into a foxhole or go into hiding.

00:53:23:25 - 00:53:36:09

**Dr. Michelle Cespedes**

Your CD4 is do the same. They kind of go into a resting state. We call it, or the reservoir cells that will hold on to that HIV, information inside the cell, that HIV DNA stuff.

00:53:36:10 - 00:53:38:31

**Leslie Schlacter**

So a cure would have to be a genetic treatment.

00:53:38:31 - 00:54:07:48

**Dr. Michelle Cespedes**

A genetic treatment, or we'd have to kill all the hidden cells in a way. Right. So, interestingly enough, there have been a handful of people who we have cured of HIV, but it was a very sickening process. Just by coincidence, they had lymphoma, leukemia, those things that we get bone marrow transplants from. Right. So for our listeners, for some of the cancers that are kind of affected by the cells, affect the cells that make your new red and white blood cells, right.

00:54:07:53 - 00:54:22:21

**Dr. Michelle Cespedes**

If we can do trans, we can't. The chemo doesn't work. We will actually take someone else's DNA. Right? We'll try to essentially kill all of your cells and give you new bone marrow. That'll make new cells that aren't essentially your genes. Right. But I'm making.

00:54:22:21 - 00:54:25:33

**Leslie Schlacter**

New, really aggressive to do for someone who's undetectable and doing fine.

00:54:25:33 - 00:54:33:41

**Dr. Michelle Cespedes**

But if what if they have that, like HIV wasn't killing them, but he needed, a bone marrow transplant to keep them alive because it's came here. So what's interesting?

00:54:33:41 - 00:54:34:42

Leslie Schlacter

People got cured.

00:54:34:42 - 00:54:48:55

Dr. Michelle Cespedes

Psychos. But the other thing is, you know, you need to have, like, a genetic match. You got to find a donor who's a match. There's actually a mutation that some humans have that makes it particularly hard for them to get HIV, even through sex and things like that.

00:54:48:55 - 00:54:51:37

Leslie Schlacter

So those are the people's the researchers write.

00:54:51:37 - 00:54:54:19

Dr. Michelle Cespedes

These researchers who are doing the original one, this.

00:54:54:19 - 00:54:55:53

Leslie Schlacter

Is going to blow people's mind when they hear.

00:54:55:53 - 00:55:12:59

Dr. Michelle Cespedes

That. But I mean, if you think about it like, that's fantastic, I'm going to give you someone else's cell. So that will help you make cells that don't have the leukemia in it. But I'm also going to try to find one, not just a match or those other matches that we can that also have this genetic mutation that makes it hard to get HIV, even though you're undetectable now.

00:55:13:01 - 00:55:18:25

Dr. Michelle Cespedes

Right. I'm going to try to kill all of those HIV hidden information cells in your lymph nodes.

00:55:18:25 - 00:55:19:31

Leslie Schlacter

And yeah, they're getting greedy and.

00:55:19:39 - 00:55:21:14

Dr. Michelle Cespedes

They're getting raped. We're going to melt you.

00:55:21:18 - 00:55:23:00

Leslie Schlacter

Yeah, but we're going to kill them. I'm going to give you they're going.

00:55:23:00 - 00:55:39:00

Dr. Michelle Cespedes

To give you someone else's DNA. Right? You going to need some support. But we're also going to give you cells from a person who genetically would already be hard to get HIV going to give you HIV medicines for a few months. And we're going to check. Then we're going to stop everything and see if HIV crops back up.

00:55:39:05 - 00:56:03:39

Dr. Michelle Cespedes

And today there have been a handful less than ten. But again, you can't give everyone HIV a bone marrow transplant irradiate, something like that. But they're trying to use some of that science behind it. The gene editing, the. Yep. Behind, there's some techniques called a kick and kill. We're going to wake up all those resting, hiding soldiers, get them out in the bloodstream, kill them all, and then see if we can eliminate the reservoir.

00:56:03:39 - 00:56:10:03

Dr. Michelle Cespedes

Amazing. We're going to try to do gene therapies so that your new cells can detect. So we're not.

00:56:10:03 - 00:56:17:37

Leslie Schlacter

So how far if you were to put a time frame on it, if you if when do you think there'd be a cure even though technically you just had there is.

00:56:17:42 - 00:56:18:21

Dr. Michelle Cespedes

For some.

00:56:18:21 - 00:56:18:55

Leslie Schlacter

People, for some.

00:56:18:55 - 00:56:38:06

Dr. Michelle Cespedes

People it's not for prime time or right. Right, right. For the masses, I'd say maybe 15, 20 years, as I'm not sure my I hope I try to hang on for a little bit longer, but things are moving exponentially fast. Ever since the human genome, the human genome was not even. Yeah, 20 years, right? Yeah. CSI, DNA or some other stuff.

00:56:38:20 - 00:56:48:14

**Dr. Michelle Cespedes**

That's that's new stuff, right? HIV to go from treatments to once every once a year possible. Things are moving so incredibly fast. Yeah. All right.

00:56:48:14 - 00:56:58:40

**Leslie Schlacter**

That a lot of a lot of the things I've had a lot of guests on this podcast and we were talking about autism and it's the same thing. It's it's targeting specific genes. Right? That's what it comes down to.

00:56:58:41 - 00:57:18:00

**Dr. Michelle Cespedes**

I mean, and I think now, even with the advent of AI and computer modeling and large language modeling and the fact that Sinai has an AI department and what these last 12 or 18 months and we're a huge system with a huge database, right. And people giving their blood, giving a little set, saving the bio repositories. Right. I think all things are possible.

00:57:18:00 - 00:57:30:12

**Dr. Michelle Cespedes**

The fact that, you know, we can find mistakes and look around and pick all these things like that, I think it's closer than we think. But again, your kids were born at the right. We were born at the right time. But we did good work and our kids were born at the right time.

00:57:30:14 - 00:57:40:10

**Leslie Schlacter**

Thank you again. Well, as we come to a close, if I if you had to give a public service announcement to say something on television to the community, what would that look like?

00:57:40:15 - 00:58:01:03

**Dr. Michelle Cespedes**

HIV is not the same as it was in the 80s and 90s, and the best things that you can do for yourself is to know your HIV status. Go get a test if you are negative. We have ways to keep you, negative. If you are living with HIV, we have ways to actually prevent you from transmitting it to anyone else.

00:58:01:13 - 00:58:19:46

**Dr. Michelle Cespedes**

Preserve as many years of healthy life as possible and to live a full, complete life. The most important thing that you can do is know your status and protect your your fellow man, your your loved ones, and your own health. I love that you deserve to live a healthy life and you were born at the right time because we have access.

00:58:19:46 - 00:58:40:13

**Dr. Michelle Cespedes**

We have both hindsight, but more importantly, foresight. We're working on an injectable prep. Remember I said how exciting it was? For every Q six months, there's a formulation of that medicine. It's called lens cap of a year. We're opening a clinical trial. Actually, we just had our first patient enrolled, two days ago for that same one.

00:58:40:13 - 00:58:54:18

**Dr. Michelle Cespedes**

That's every six month, a new formulation, an injectable. So in the muscle. But once a year, imagine getting an injectable medicine for HIV, prevention once a year. It's like I go to my dentist twice a year.

00:58:54:18 - 00:58:55:21

**Leslie Schlacter**

We've come a long way.

00:58:55:21 - 00:58:56:34

**Dr. Michelle Cespedes**

We have come a long way.

00:58:56:36 - 00:58:58:42

**Leslie Schlacter**

Thank you so much for being here today. You're welcome.

00:58:58:42 - 00:59:01:35

**Dr. Michelle Cespedes**

Thank you for the invite and keep doing what you're doing.

00:59:01:35 - 00:59:27:37

**Leslie Schlacter**

Thanks again. That's all for this episode of The Vitals, I'm your host, Lesley Schlatter. Subscribe to the Vitals and the Mount Sinai Health Systems other video podcast programing on YouTube, Apple Podcasts, Spotify, or wherever you get your podcasts. To learn more about Mount Sinai Health Systems, work in HIV Aids treatment and prevention, or to book an appointment with Mount Sinai Expert, scan a QR code below on your screen or click the link in the description below.