

## **Podcast Episode 76**

### **How Nurse Practitioners drive health equity through vital rural and frontier healthcare. With Wesley Davis and Cristina Gonzalez.**

Rural Wyoming is a beautiful place to live, but those wide-open spaces on the frontier create a number of health disparities, with the presence of Native American reservations, COVID-19, and hospital closures adding more complexity. A culture of self-reliance and independence has developed out of necessity in these areas, but that can result in care being delayed. Similarly, Native Americans may delay care for reasons related to trust and health literacy. Professor Wesley Davis, Nurse Practitioner, and Nurse Cristina Gonzalez join us today along with podcast host and Family Nurse Practitioner Mary Behrens. Together they discuss many of the challenges facing rural areas, the potential for telehealth, and how civic engagement with a focus on mitigating the social determinants of health can contribute to a better framework for more equitable healthcare. Visit the Rural Health Information Hub at: <https://www.ruralhealthinfo.org/>

Mary Behrens, NP: Hello, and welcome to this episode of the Health Disparities Podcast, in which we will discuss some of the health challenges facing our rural communities and explore some of the solutions we have developed. I'm Mary Behrens. I'm a family nurse practitioner in Casper, Wyoming, and the American Association of Nurse Practitioners representative on the Movement is Life Caucus. I'm also an AANP Fellow. I've been involved in public health and policy for many years. Eight years in elective office in

Wyoming and eight years on the board of directors of the American Nurses Association. So, today I'm joined by Dr. Wesley Davis and Cristina Gonzalez. Wesley is an emergency nurse practitioner and an assistant professor of Adult Health Nursing at the University of South Alabama, where he has developed and implemented an Emergency Nurse Practitioner Specialty Program. He prepares graduates for rural and frontier practice. He practices in rural Wyoming in a critical access hospital, and he was just inducted into Fellows of the Association of Nurse Practitioners. Cristina is a nurse and working on her baccalaureate in nursing at the University of Wyoming. She is a registered nurse on the Wind River Reservation and spends a lot of her time caring for both the Shoshone and Arapaho tribes. She is also a SANE nurse, a Sexual Assault Nurse Examiner, and planning to study for her nurse practitioner degree in the near future. So, I welcome both of you and thanks for joining us today.

Dr. Wesley Davies, NP: Thank you, Mary. Thank you for the invitation to be here.

Nurse Cristina Gonzalez: Thank you, Mary for having me.

Mary: Well, I look forward to our discussion. I just quickly want to share with our audience that Wyoming is the smallest populated State in the nation yet it's 10th in size. And so to give our listeners a perspective, if you were

going to drive from one corner of the state to another, you would have to get in your car in New York and then drive all the way to Columbus, Ohio. So, I hope that you can understand, we have a lot of wide-open spaces. So, let's get on with the discussion. Dr. Davis, would you please describe for our listeners, what it is like being a nurse practitioner in a critical access hospital in a very rural area?

Wesley: Well, Mary, the advantages of living in a rural area are plentiful. We have fresh clean air. We have wide-open spaces and no neighbors for miles sometimes. In my small community, I get to know my patients in the context of their community and their families. But practicing in rural medicine takes the best of the best. Rural medicine really encompasses a very large scope of skills and requires a much deeper knowledge base, I think. You have to be flexible and you have to be adaptable. In essence, rural medicine is kind of a melting pot of all the medical specialties. For example, when I'm on call, I'm the only nurse practitioner covering our emergency department. I don't have any specialists in the County. The closest specialist of any kind is about an hour away. This means that I have to be ready for any situation from a simple laceration to a serious emergency, like a complicated labor and delivery of a newborn. But it all boils down to one thing and that's the reason that I love rural medicine is that I can make a difference not only to individual patients but to the community as a whole.

Mary: Well, thank you, Wesley. I think you have to be like one might say a Jack of all trades. And so, that's pretty special. So, let's move on to Cristina. I would like you to share what it's like to be a nurse working with the Indian Health Service and working actually with two different tribes.

Cristina: I would say that the biggest thing for me is fulfillment in being able to serve a community that has for a long time struggled with access to care, to quality care. And it's also been very enlightening as far as developing skills like Dr. Davis, you kind of have to be a Jack of all trades of knowing how to assist a family with changing a PICC line to inserting pediatric and G-tubes to working with lacerations and dog bites. So, it's very fulfilling as far as the skills standpoint. But it's also sometimes very sad because you see the disparities of families living, you know, 13 deep in one home without electricity or water, without access to food. And so, for those things, it drives me to be an advocate for change and to advocate for my patients to take advantage of some of the social resources that our community has in place. Working for two different tribes has also been very enlightening in understanding the cultural perspective of how these tribes came to be on the same land and have a deep respect for the struggles that they have endured and for being an advocate for people on that tribe to learn about compassion, learn about their health and learn about how to rise above the disparities that they were born into.

Mary: And that's very moving, Cristina. I think the Native American population in the United States is often seen as invisible, and unfortunately, they make up a small percentage of our population too. So now I think it's important to understand what are some of the special challenges you face in rural care. Cristina, I think you touched on it a little bit, but you must see obviously a number of healthcare disparities across the tribes you work with, but also in comparison to non-native populations. So what are the most striking disparities and challenges for you in Rural Wyoming?

Cristina: One of the biggest is getting follow-up care with specialists or with your own primary provider. There are a deep culture and the tribe's kind of like a shifting sand analogy where providers come in and then they leave. Folks are very transient and where they stay and how long they stay there. And so, if you have a chronic disorder and you're needing chronic medications, having to establish care with somebody is hard to do if your lifestyle is constantly in flux. Also, like Dr. Davis, hit on this is a beautiful place to live in, but it's also a very rough climate to adapt to. You're without the amenities, like the closest Target to me is three hours away. And that's not always ideal for practitioners to come from big cities to our area. So, they come here to the harsh environment, to the lack of resources, and are runoff by those things. So, disparities, as far as access and consistent care is one of the most prominent as well as transportation.

A huge percentage of our tribe lives under the poverty level and do not have consistent access to transportation to get to and from our primary clinic. And even more so when they have to go out of County or out of State to get specialist care.

Mary: And Wes, can you tell me what you see as the most pressing disparities and challenges that you are seeing?

Wesley: In rural areas, we know that health and equity and disparities are mainly systematic. And I think they revolve around obstacles related to access and payment sources such as insurance. But one of the largest disparities in the area that I am working is the workforce shortage. Like I mentioned earlier, specialty and subspecialty healthcare services are not available in the County where I live and practice. Compounding that problem is our brutal climate with long winters. So, therefore, traveling a significant distance for these specialty services is almost impossible and is a barrier to healthcare for our community. As an example, it's not uncommon for an 80-year-old to drive 50 or 100 miles for a cardiology appointment. Therefore, many of them choose not to go to these appointments. And in rural areas such as where I live, missing these appointments leads to a higher mortality rate from poorly managed chronic diseases as compared to more urban and suburban areas where specialists are more easily accessed.

Additionally, we know that much of the younger population that is born in rural areas eventually move to urban areas. This leaves the aging population, the parents, without family assistance for travel to get medical care. And in our County, we do not have public transportation for those who cannot drive. I think that the lack of access to specialty medical care is one of the reasons that life expectancy in rural areas is generally lower than in urban areas. And another disparity is socioeconomic status. And I think we all know from the big report from Kaiser, the 2014 Kaiser Commission on Medicaid and the Uninsured, rural populations have much lower incomes and are less likely to have health insurance coverage. Bringing this home to my County is the fact that a majority of our rural population works on family ranches. So, unless they work another job, it is very unlikely that they have employer-sponsored health insurance coverage. In urban areas, uninsured individuals are more likely to use emergency departments for their healthcare needs. And unfortunately, you know, in rural areas, we don't have that robust safety-net of emergency departments for them to fall back on.

Mary: I think you both brought up the issue of lack of specialty care of that being a challenge of providing really comprehensive care to your patients. But at the same time too, that puts many challenges before both of you. I'd like to move on because we've obviously been living in the life of COVID this last

year and certainly has its challenges. And I know Cristina, I've seen you on the cover of the Casper Star-Tribune more than once dressed in your personal protective gear. By the way, the Casper Star is the largest newspaper in the State. So, she's gotten a fair amount of coverage, but I know you've been working hard on testing, including drive-through testing and tracing too. I also know that the Reservation was hit early on. I'd like you to share kind of some of the things you've been dealing with.

Cristina: So, as you said, the Reservation was hit early on with our first positive case reported at Showboat Retirement Center and a family had visited that resident, went home. Then a transient member of our Riverton Community because it was still a pretty cold time of year went and visited and stayed with that family. So, from that one person that at the time was not known to be positive for COVID, it spread to a family of about five. When the transient family members or a homeless family member came and stayed with them to shelter from the cold, he became infected from his siblings and parents, and then, went back into his circle of other homeless friends. And of that group right there alone was about 15 members of a pretty well-known transient native population. So, when that happened in early April, our Clinic Director, our Chief Medical Officer, one of our epidemiologists trained employees and the Tribal Council gathered together to round up all of the transient members of the native population that reside primarily in Riverton and brought them over to one of our

facilities on the Reservation, had them tested, and then quarantined and isolated all of them. Moving ahead or, you know, fast-forwarding a few months later, we now have this camp set up that everyone calls COVID Camp, and it's where members of the enrolled tribes that don't have the means to stay with family or are homeless, if they've tested positive or have been a contact of a positive patient or positive individual, then they now can reside at this location. It's trailers and there's some running water, some electricity. It's a home that they've never had before. So, this was like the first big movement of identifying, testing, and isolating these individuals. And from that, we've just had to develop our clinic to adjust to the bloom that we're seeing now. Such as hiring nurses to do contact tracing, beefing up our time of testing, and also just doing a lot of campaigning and marketing with education and informing the community of what's going on. Sending out memos to enrolled tribal members. I mean, we're just putting information out there every single day of what to be looking out for and how to move forward.

Mary: You were sort of an example in the sense of early on kind of helping people to isolate that were not isolated and living in more multi-generational homes, but I think the CDC, didn't some important officials come to look at the program and how it was working?

Cristina: They did. Last week, we were visited by some task force individuals who met with our Clinical Director, our Chief Medical Officer, and some of the tribal council members and the surgeon general. So, I mean, we had some pretty big names come to our area, which was kind of cool because it felt like all of the work that we were doing was being recognized and setting an example. I think it's encouraging to see the work is being recognized as well as hopefully setting that example for other locations.

Mary: So, Wes, I know too, that you have had your COVID challenges with the Critical Access Hospital. I'd like you to share that. I would also like you to discuss a little bit about, we've had a high level of rural hospitals and critical access hospitals close around the country and that has put a strain already you know, on caring in rural areas, but kind of share what you know about that. And then, how are we doing in Wyoming in that regard?

Wesley: So, I think, you know, we're all aware of the plight of rural hospitals. The most recent data shows that about 172 rural hospitals have closed since 2005. And 2019 was a record year and I think about 19 hospitals, rural hospitals went under in 2019. But you have to understand the reason behind this and it has implications for pandemics and COVID as well, but rural hospitals have a very limited operating margin. Additionally, they do not have the multiple service lines that our larger urban medical centers have. So, these larger centers have service lines such as surgery,

outpatient services, and they can rely on these other service lines when the revenue of one declines, but when a pandemic hits an already struggling rural community hospital, most of the time, the only option is permanently closing the doors. But when you consider the additional strain of rural hospital finances, you have to talk about supplies. Taking care of COVID patients requires supplies and equipment that rural facilities keep a minimal amount of in stock. And due to the limited financial resources, most of these rural hospitals are not able to cover the cost of additional stock and to meet the demands of increased patient volume. And for example, you know, the facility that I practice at we average about one or two inpatients on a given day. During the COVID pandemic, we've seen that go up to 11 or 12 patients per day, realizing that the reimbursement for these patients won't come until many months later. So, when you're operating with this limited financial margin, it's hard to order that extra material to take care of this extra patient volume, and that has implications and hospital closures. So, it'd be interesting to see how this pans out when the pandemic is said and done, and how many rural hospitals we lose because of COVID.

Mary: And Wes, I think one of the interesting things too about COVID is as a critical access hospital, once you get a patient stabilized and then if they need specialty care, obviously you tend more to transfer them out if you

can to a larger medical center. And during this COVID, I think you actually got patients from larger medical centers asking for your help.

Wesley: Yes, we have. And we've noticed recently this reverse transfer process, and you're correct, typically, the majority of our patients are transferred to a higher level of care to another medical center. But here lately, we have noticed just the opposite. We're receiving COVID patients from the larger medical centers in our urban areas that don't have beds and can't accommodate these patients.

Mary: Okay. So, we've talked a little bit about COVID, but I think I'd like to kind of move on into another area. Would you agree there is something of a cowboy mentality or a rugged individualism or self-sufficiency in Wyoming and other rural areas? And how might that contribute to some of the health issues and disparities? And Wesley, I'm going to ask you that question first.

Wesley: So, I think of the rugged individualism as you call it is more of just simple self-reliance and independence that has developed over time. And it's likely due to the great distances people in rural and frontier areas live in. You have to think of our County, sometimes your nearest neighbors are 20 or 30 miles away. So, this self-reliance and independence is a survival mechanism. And I would surmise that the majority of the population in our

County is at least 30 minutes from medical care. And a large portion of those are probably an hour or more away. So, without some degree of self-reliance and independence, survival would be impossible.

But even so, this self-reliance is a large contributor to the health inequity in our County. From my personal experience, I think a lot of the people in our rural areas wait until the proverbial last minute to seek healthcare. And as I mentioned earlier, due to the long-distance travel that is required, many of them do not have preventative care whether they can afford it or not. So, then this combination of self-reliance, independence, and lack of transportation leads to many patients seeking care only when their undiagnosed chronic diseases in stage. So at that point, you know, the focus of care shifts from prevention and cure to end of life comfort.

Mary: So, that has to be very challenging, Wesley. I know I've had patients that I've seen like that the first time you see them, and it is very disheartening to know that if these patients had only come in sooner, we might've been able to provide a better or help them with a better outcome. So, Cristina, I think working on the Reservation, you see different challenges than what I'd call the rugged individualism that I talked about with Wesley. I think there are different challenges with the Native Americans and especially with their history. And I think you could do a good job of kind of helping to explain that.

Cristina: I think some of the challenges faced with like a delay in care that we see sometimes primarily goes back to a lack of transportation, being able to get there. But once that bridge has been crossed, you know, they come in a little delayed. And I think part of that is because there's a lack of trust between some of the patients and the clinic. And some of that trust can go back to the generational trauma that is so deeply ingrained in our community and our Reservation community. And, also, I think some of it can be in part to a lack of education about one's own health. And those two things are tied together, the generational trauma and the lack of education in one's health, because part of that generational trauma and not to disregard the deep understanding and respect that I've learned about it. But in short generational trauma goes back to families being ripped apart. Children being put into boarding schools and not having that parental guidance and learning how to care for themselves and treat problems with the family and with the provider and instead, they were thrown into these homes where their health was disregarded, their culture was disregarded. And then once they came out of those boarding schools and were starting their own families, there was no example of how to live healthily. How to engage in a healthy lifestyle. And when they started to have children, that same example was set into their children and then it just compounds and continues. And by the time that, you know, the patients that I'm seeing now, there are generations of people that haven't learned how to care for themselves in a holistic fashion. So, the

generational trauma of not knowing how to care for oneself compounded with the distrust between providers, native and non-native, it just compounds. There's a foot wound that's been going on for six weeks and it's a callus that, you know, needs to be operated on, or there's a toe that needs to be removed. It's unfortunate, but those are definitely things as a nurse that I tried to bridge that gap and that cultural chasm and being an advocate and doing the follow-up care and providing education at every turn and compassion.

Mary: I also think out here in the mountains, we tend to see people who are sicker. And I think that's been brought up, they delay coming in, who tend to see providers infrequently and often have limited access. Now, I would like to see some comments on how we see these problems and disparities being on the one hand, different from urban and suburban disparities, but in some ways are similar and what we can learn from these issues. And so Wesley, I'm going to ask you, I think that even though sometimes we see so many things in rural as unique, they may not be quite that unique, but more common.

Wesley: Although there are significant differences in geographic characteristics and the social determinants of health between urban and rural areas, I think there are also many commonalities. So, I agree. In some ways, if we look at the rapid urbanization that occurred in the 20th century, it places

some of the same stressors on urban areas that we have seen occurring in the rural areas. For example, regardless of whether you live in a rural area or urban area, I think your socioeconomic status, or your minority status is likely to affect your healthcare to some degree. And when looking at Medicaid beneficiaries in particular, the research shows that there are a few differences in healthcare disparities among those who live in rural areas and those who live in urban areas. So, we know that there are a lot of similarities. We know that adults that have Medicaid, regardless of whether they live in a rural area or an urban area, have more difficulty getting things such as eyeglasses and prescription drugs. So, I think overall there's a lot of commonalities and hopefully, you know, those commonalities can bring us together. And some of the things that we see bringing healthcare to the city streets can also bring healthcare to the County dirt roads.

Mary: So, Christina, do you have some thoughts on this?

Cristina: Dr. Davis, thank you for bringing up the determinants of health, because I see a lot of those in play in our community, as far as genes, wealth or the lack of wealth, education. Homeownership is huge around here, as in it hardly exists and access to food. And I think that that makes our area, our rural area more similar to an urban area than possibly outsiders might give credit to. Some of the things that I've been seeing that are helping to

overcome those determinants though, like just yesterday at one of our locations, our community locations, they were passing out 10-pound sacks of potatoes. It was all day long. They were just passing out these 10-pound bags of potatoes to anybody who wanted to come by and grab them, not just enrolled members because access to food isn't just on the Reservation, it's in both communities. And there's also been a huge movement to make sure people affected by COVID and being quarantined because of COVID are having food delivered to their home or can come to one of these local community locations and pick up a week's worth of food.

Mary: That's really good to hear Cristina, and I appreciate that. Let's talk about solutions. Can we both give us some examples of initiatives and policies that are helping reduce disparities in our rural communities?

Wesley: You know I'm going to bring up the infamous telehealth. You know, that seems to be the topic of the day. So, telehealth certainly is a key initiative and promises to provide healthcare services across the vast distances of rural areas. But not all communities are able to participate equally. So, many of the areas in my County are without cellular service. They don't have broadband internet service. So for those who live in a rural area that is fortunate enough to have broadband, the family may not be able to afford it. So, there are multiple factors at play. So, I've recently heard

stories of clinics in my area that have temporarily closed due to COVID and they're shifting to telehealth visits only. So, some of the patients that I see are telling me that they can go to the clinic because the visit is covered by Medicare, Medicaid, or another insurance. However, they cannot access telehealth because they cannot afford a cell phone, or they cannot afford broadband internet service. So, with the temporary clinic closures, they have lost all access to healthcare because it shifted to telehealth. And this is an example of telehealth actually worsening our rural health disparities.

Mary: That's a super important issue. And I think that probably something that our legislature, I know there's a committee that has looked at that, but we definitely need to increase that broadband access in many of our rural areas in Wyoming. And if any of you have been on the road and I know you have, cell services can be quite sketchy when you're on the road. Cristina, do you have some thoughts on this in terms of policy that might help us in Rural Wyoming?

Cristina: The first thing that comes to mind for me is our department, our Case Management Department, that works as contract health services. So, when a patient needs to have a mammogram or needs to go see an orthopedist or have surgery or a procedure for something, if they don't have health insurance, but are an enrolled member, then they will

sometimes qualify for contract health services, which entitles them to have a referral sent by their provider, the ordering provider, to a committee for them to review how much or if they will pay for it. And oftentimes many of the surgeries and specialist visits that are referred by the ordering provider are approved because it's a continuation of care. It's a medical necessity.

Some of the smaller things that contract health services cover for uninsured or under-insured patients are hearing aids, home health services, oxygen equipment anything that is needed to improve the quality of life and health for the patient. If they are uninsured or under-insured, it goes through our contract health services. And this has been very beneficial to a lot of patients who otherwise wouldn't be able to be seen at a clinic or seen at a special specialty office.

Mary: Okay. And I was going to say, I think there have been some Native Americans that have run for public office too in Wyoming.

Cristina: Yes.

Mary: Now, all the outcomes were not positive, but for me it was exciting. I think there were at least four Native Americans running for different offices.

Cristina: Yeah, it was. I take great pride in having collaborated with Ms. Andi Clifford for the Lander Women's March in January of 2020. She was a very influential person just to be around and hear her speak about native pride, women of color. And also engaging young people in understanding social issues going around them, not just politics, but racial issues, health issues. I mean, she was just a very inspiring woman to be around.

Mary: That's great. And it's really exciting and of course, they were all women that were running, too. The final area of discussion is what are calls to action? What can we do more at the grassroots level, but what must we work towards in terms of the policy, do you think in rural healthcare Wesley?

Wesley: Well, Mary I'd like to point out that, you know, there's already a ton of statistics and data derived from research that clearly illustrates the problems that rural populations are facing. And you can see this on tons of websites, but one that I really like is the Rural Health Information Hub. But getting back to your question of what we can do this data shows the causes of rural health disparities in our health inequities. I think the problem is rooted in the translation of this research into action. So, my ask is that we shift the focus from performing duplicative and repetitive research to translation science. We need funding to translate this research into practice at the local level. And finally, I would like to note

that approximately 40% of the rural hospitals that have closed were for-profit. So, when you're asking what we can do, my point here is to work closely with your rural health organizations, your County council members, and your hospital board members to maintain local ownership of your rural hospital. So, according to statistics, when your rural health center or your rural hospital sells out to a large for-profit corporation, that is based in an urban area you're automatically at risk for closure. So, my ask is that you know, maintain hospital ownership at the rural level, at the community level, and let's translate some of the research that we have into practice.

Mary: Thank you, Wesley. I think you brought up some important points. So, Cristina, do you have some thoughts here?

Cristina: From a nursing perspective as something that I could see as a beneficial change to our community would be to establish an EHR system, an Electronic Health Record system that is accessible across our communities because we do have such a shifting population that it's hard to keep track of what interventions are done at our clinic versus a clinic done, you know, 20 miles away in the next community versus even what's been done at the hospital. A lot of times we have patients that are coming in for follow-up visits from the hospital, and there's a delay in getting their medical records from there. So, if we could have a community based EHR system in which we were all on the same network, sharing the same

information, I think that would streamline a lot of our appointments as well as coordinating plan of care and discharge care for our patients much better.

Mary: I think we could go on talking about these issues for much, much longer but I feel like we're sadly out of time. I do feel this has been a great discussion. I want to thank you both for joining the Health Disparities Podcast. We hope you will both join us again in the near future.

Wesley: Thank you, Mary. It's been a pleasure.

Cristina: Bye. Thank you for having me.

Mary: I also want to thank our listeners and subscribers for joining us once again, and I want all of you to take care and be well. So, I'm going to say goodbye for now.

(End of recording)