Dr. Andrea Feinberg, Dr. Wendy Slusser

Dr. Andrea Feinberg 00:02
The patients would come in, they'd be, like, beaming at us, like, you know, everything had sort of gotten better in their life. And I think, to this day, I believe it's because we removed one of a great stress or from their life, they didn't have to wonder where they were gonna get their next meal from, which I have to say is such a beautiful thing. Well,

Dr. Wendy Slusser 00:24
Dr. Andrea Feinberg, what a gift it is for us to have you on this podcast. And for all our listeners, Dr. Feinberg, or Andrea has been in the medical world for decades, starting as a critical care practitioner in the ICU, that ultimately led her on a journey to address the determinants of health, developing one of the first fresh food pharmacies with Geisinger health. So let's start with your choice of working in critical care what brought you to that specialty?

Dr. Andrea Feinberg 00:56
Back in the days of medical school where we rotate around in the different arenas of pediatrics and internal medicine, surgery and so forth, I fell in love with the ability of medicine to step in when people are very ill. And with technology and the art and science of medicine, we could actually alter the path or trajectory of someone's life. And I found that amazingly interesting and wonderful to be able to help people in such a manner. I practiced Pulmonary and Critical Care Medicine for approximately 25 years. Over the years, it became increasingly clear to me that we were seeing more and more people succumbing to critical illnesses that suffered from chronic diseases. And when I speak of chronic diseases, I mean, heart disease, coronary artery disease, chronic lung diseases, diabetes, hypertension, those sorts of diseases are making it more likely for people to get sick, and then to develop severe illness. And it's starting to become increasingly clear that there were a few factors at play, one, that it wasn't really equally distributed, the incidence and prevalence of people being critically ill. So if you had
what we call poor social determinants of health, where you didn't have access to health care, you didn't have access to healthy food, that you didn't have access to transportation that you didn't have safe housing, that you were more likely to not be able to avail yourself of state of the art recommendations, because you were too worried about these other social determinants that were impacting your life on a day to day basis. So we of course, learn from our experiences, and increasingly provided we were able to, to these sorts of patients through our social work intervention through programming that might be available on our local community. In addition, we saw that people who had lifestyles that weren't considered healthful, also succumbed at a much greater rate to our chronic diseases. So we saw that lifestyle and social determinants of health became very, very powerful in predicting who would need our services.

Dr. Wendy Slusser 03:34

Explain to us then how you shifted from that very kind of high tech focused area of medicine to one where you were managing people's lives with a low tech intervention food.

Dr. Andrea Feinberg 03:51

Oh, so that's a long story. Yes, after about 10 or 15 years of practicing critical care in a state of the art wonderful setting, I made a transition more towards an outpatient setting because it became really a passion of mine to help people prevent chronic diseases and prevent the need for an ICU setting. And we know that in the United States, over 50% of Americans have chronic have at least one chronic disease, and about 1/3 of Americans have multiple chronic diseases. And I can tell you know what he wants to have that I think we can safely agree that people want to be healthy, and they want a new way to think about their health and to prevent their really succumbing to chronic diseases. So that was my transition from the ICU into primary and secondary prevention. I then transitioned in 2015 into a new setting. I had relocated from Los Angeles depends on Vanja. And in the midst of getting settled in my new community, I was volunteering at a local school. And it was there that I realized firsthand that some of the programming that we think is there to help children and help communities can actually be harmful. I was volunteering at a local school. And we were packing lunches for kids that were food insecure. And the food that we were packing into the lunches, were really snacks to tide them over from when they left school, to carry them till the next day or through the weekend. And when we were packing for them was high calorie, low quality food. And I turned to one of the other people there, and I said, you know, what we're packing here is food that I wouldn't even I would not give my children I snapped. So I can't, in good conscience do this. Because in medicine, we always say, above all, do no harm. And I felt like we were giving people who are hungry, food that was going to make them sick now wasn't going to make them sick today, it was definitely going to help them with their hunger. But I knew in the long term, if these children ate the snacks every day, and every weekend, they would absolutely be putting on weight and with time would be part of the majority of children in the country that become overweight, and later will battle with type two diabetes, and food insecurity leads to diabetes. And also food security leads to diabetes. So we have a rising incidence and prevalence of diabetes. And when we think about how much money is spent on health care, one in $4, is spent on diabetes currently in the United States. So what that means if we're spending $4 trillion, we spend 1 trillion on diabetes. So that means that we're not then spending that on cancer research. We're not spending it on Alzheimer's research. We're not spending on preventing strokes and heart disease, because we're spending it on putting out the fires. For
people who have diabetes, I suddenly started thinking, well, we can do better than this, we can do much, much better than this. And I spoke to a few people locally in the school and then went to our local food bank. And there the idea of the fresh food pharmacy was born because the director of the Food Bank said to me, Andrea, you know, if you can prove to me that providing healthy, safe, nutritious food to children and adults will improve the health outcomes, we will mandate that through our food back, I said, this is well recognized within the medical community, why do I have to reprove it to you? He said, Well, it's not really as accepted currently, in really the food insecurity world, what we really care about is ending food insecurity. And I said, I totally get that because nobody wants people to be hungry, out of that developed the fresh food pharmacy, the belief that we could one demonstrate that providing healthy, safe, nutritious food to people is of health benefit. And that was the scientific foundation of the fresh fruit bar to see. And to then to spread the message to people within the food banking industry. So on that side of the business, but also in the healthcare community, to insurers, to health systems to physicians, that this is something that we should be involved with, in addition to treating diseases that we have to think of really plan B solutions to problems because what we're doing in healthcare isn't really solving the problem. That's a long answer to your question. But I hope that that sort of gave you some background and how we got started.

Dr. Wendy Slusser 08:51

Yeah, very much so. And I didn't realize that it was actually a firsthand observation on your end that brought you to the fresh food pharmacy idea. And that's a very, I think, really important for our listeners to know that our own experiences can really impact our future next steps in terms of addressing some of the challenges of our times. You know, you you discussed earlier in your description about your recognition that the determinants of health were what were impacting many of your patients. And sometimes people have control over those determinants and other times not. And you've just landed on an area where food is a lever where you can make a difference potentially, from an external force to improve someone's outcomes. Some of the food insecure questions are not just about Are you hungry, but also do you eat the kinds of foods that you like or that are culturally acceptable to your upbringing and so forth? With that, I'd like to know one if If you could just explain to the listeners, what are, what you describe is the determinants of health that you've recognized that have impacted your patients, and then ultimately, how you landed on the food piece.

Dr. Andrea Feinberg 10:13

Sure. So social determinants of health are something that I think we've become more knowledgeable about over the last decades, let's say so sort of in my medical school experience, and then even in residency and training, we didn't have the language to speak about this social determinants of health are when I think about are the non medical factors that influence people's health outcomes. And when I think about that, these are the factors that conditions that influence us when we're born, where we live, where we grow up, where we go to school where we work. So when you think about a person's experience, just imagine in your mind to different people, okay, born in the same year, so if someone's born today, their life expectancy can vary by 25 years, depending on where they are on the I stop in Chicago, okay, we know this studies have been done to prove it. And these are people who may very well have access to the very same health system, but one person may have been born into poverty, okay,
may have needed to move from, you know, rental property to rental property, May, the parents may have been in and out of work that may have been a single parent home that may have been no regular food at home. All of this formulated, how this person grew up, and what kind of access they had to then themselves, girl could become a functional person in society, where they graduate from a high school, potentially go on to higher education obtain a well paying job, versus a person who's born into a much more stable situation, where they have stable housing, stable food, stable education, and so forth. And these two people well born, and should have been equal, with all their rights as a person to live within our society, but absolutely have not been given the same ability to survive and grow and flourish. Irregardless of where you sit on the political spectrum. We all recognize scientifically because this has been proven that people can have a great discrepancy in their life expectancy, in their health, fullness, and in their health outcomes. And we now accept that about 40% of health outcomes are related to social determinants of health, if not more, we need to consider how how providing improved social determinants of health for some groups of people, then becomes very important, not because of a social need, but actually born out of a fiscal need, that we want to be effective in how we spend our health care dollars. And if that means that we give a medicine for diabetes, by all means, we should do that. But if it also means that we should give food as medicine, then we need to do that as well.

Dr. Wendy Slusser 13:19

That brings us to your food pharmacy, which it really is what you're describing as a way to address the social determinants of health. And I want to alert all the listeners to your Harvard Business Review article that describes the step by step of how you actually put it together, which I think is tremendous. As a resource. It was published in 2017. And we'll have it on our website for anyone who would like to read it. If you could explain to us how did you like you describe the wind to us, but how did you present that idea to Geisinger Health.

Dr. Andrea Feinberg 14:00

So at first, this was more of a passion program that I wanted to demonstrate to the food bank that this is something that made sense to provide healthy, safe, nutritious food to the kids. Then I brought it back to guys and I said, I don't know that we can do this necessarily in a short term basis. But let's try to demonstrate to the food banking industry that if we take a food responsive condition, and provide them with social support and free food that we can actually improve the patient's outcome. And we did that we screened we found the patients we we actually selectively chose patients that were very sick because this wasn't a blinded approach. I wanted folks that were very sick in essence so disease out of control with a hemoglobin a wincy demonstrating that and M Within one week of providing these patients with some dietary support some food and recipes, and then the healthy food, and now for themselves in their household, two meals a day, five days a week, within one week, and I, to this day, I can't even believe it, it sort of takes my breath away. Within one week, people's blood sugar started falling. And they started for falling even into dangerous ranges because their body was used to seeing very unhealthy foods on a regular basis. And when they were switched to healthy good food, we saw blood sugar's drop into low ranges, so blood sugar's below 60, which would indicate that that was too low for them, we needed to immediately manage the medical therapy, and monitor them on a much more rigorous basis, we had no idea that this was gonna happen in such a dramatic way. Within three months, we demonstrated significant
improvements in their blood sugar control, their mood, their weight, their whole outlook on life, that mental health, the patients would come in, they'd be, like, beaming at us, like, you know, everything has sort of gotten better in their life. And I think, to this day, I believe it's because we removed one of a great stress or from their life, they didn't have to wonder where they were gonna get their next meal from, which I have to say, is such a beautiful thing. And that was the goal was to help people. But what we found medically was that it was life altering, it was better than giving Metformin or insulin, it was really what I call a Plan B solution. When we started having these dramatic responses, we started thinking, wow, this is great. This is really working, we should expand the program and the nurse and the dietician and the program, people were like, wow, this is amazing. Let's go find some more patients. And so then we had to think about funding. So that's when I went back to Geisinger and I met with the chief financial officer for the health plan. So guys under is a health system that has both an insurance product, it has physicians and nurses that work for the health system. And they also have structures, so they have hospitals and clinics everywhere. And then they have patients that come in with a fee for service or under Managed Care. And so the chief financial officer said, Andrea, if you save us one penny per patient, it makes sense for us. So it wasn't as though they will like you have to save us tons and tons of money. But they said if you can improve patient outcomes, and save us money, we're behind this. And so that's when I transition really from being a primary care critical care doctor into a public health sort of person focused on population health. So guys, who became a friend very early on, and very supportive. And through their leadership, we garnered national attention. And through the outcomes, I believe, it became very clear to leadership that this is something that they could get behind. And so the freshmen pharmacy, which started really, in one nurse manager's office, grew to one fresh fruit pharmacy and Shamokin. And then two more to follow. We are in Pennsylvania, in Lewistown and in Scranton serving very different communities, by the way.

Dr. Wendy Slusser 18:34
So powerful. And, you know, as you mentioned earlier that there was a win, but it sounds like so many wins, win win for the health plan, a win for the family, a win for the individual win for the physician. I'm just curious, do you have any specific color story of a family or a patient through qualitative research that you'd like to share?

Dr. Andrea Feinberg 18:58
Yes, so I just heard from a patient who I met, he was one of our first patients in the pilot. So back in 2015. So this is eight years ago. He's gone public, he now works for the program and is a speaker for us. So I can say his name Tom Schick, which if you're listening, say hello. This gentleman was one of our first patients. And as I say to everyone, you know, people can talk about the strains at the freshmen pharmacy. It was his strain. It got him where he is today, because he worked the program and is still working it every day of his life. So he was a gentleman who worked for a supermarket part time, but couldn't afford to buy healthy food. And so we would buy big man pizzas as his breakfast, lunch and dinners because they were affordable and provided him with large quantity of food, but of course was not helpful for him. And he found himself challenged in many, many settings where his diabetes was causing really wreaking havoc on his life and making him very, very sick and so he was one of our first people to embrace the Diabetes Prevention Program that we instilled as the education arm of our program. And that was developed by Stanford. And it's been validated. And it's a great program
to teach people about diabetes and how they can manage themselves. And he later then study it to become a teacher in the program. So it's, it was like, Give a man a fish, he eats for a day. Teach a man to fish he eats for a lifetime. So Tom, that works for the fresh food pharmacy. And he serves as an inspiration into what you can do to improve your situation when you give it a hand. And he has improved his diabetes control. He's lost a ton of weight, he looks phenomenal. He's working, he's happy. And he's, you know, by every measure, huge success. But my God, there are so many that I could add to the list. One of my favorites is, you know, we enrolled adult patients in our program, but we fed the whole household. So very often, we saw multigenerational household members come in and pick up their food every week. And we were serving an area called Shamokin, which is a coal mining town. It's very depressed economically, and really suffered from the loss of major industry. It's really an area that needs a lot of you know, needs love and attention. So just imagine we would have these families and they would come in to us and they really like a spa, you know, sunshine in the day that the kids one time I remember a young child running in and, and looking at the list of foods that were available. And we always liked people to be able to pick their foods and the young child run up to the cat ran up to the counter and said, Oh, do you have blueberries, your blueberries? I just love the smoothies that we make at home now. And we need blueberries and strawberries, do you have any of those because that's what I love. And you know, it doesn't get better than that. Here's the net, this wasn't the next generation. This is a second generation, right? The grandchildren that now knew how to eat healthfully were excited about it there was socialized in it. And it was part of their life.

Dr. Wendy Slusser 22:16

It's really profound that also you looked beyond the one patient that you had in your system and really worked with the entire family. So many habits are formed during childhood and, you know, wearing my pediatric hat and thinking about integrating salad bars in the Los Angeles Unified School District that proved sort of in a similar fashion as yours that, yeah, if you give fresh fruits and vegetables that look delicious, and tastes delicious, that children will eat them and then embrace it. And that, of course, will last a lifetime. You know, I know you're you're modest that others of course, we're part of this movement of fresh food, pharmacies, and food as medicine, you really are one of the ground breakers in terms of showing outcome data, quantitative and now this kind of qualitative storytelling. The Aspen Institute has also embraced this concept food as medicine. And in their report they talked about if equity is not a central principle that guides the concept and execution of research, research risks, irrelevance, at best, and at worst can do real harm by further embedding the systemic racism and inequality, access that has long run throughout both the food and health systems. And so if you were to put on your academic hat, and you wanted to educate the next generation of physicians, what would your advice be to help further this kind of work on in a meaningful way?

Dr. Andrea Feinberg 23:51

I think know your patients, the same way you to ask if someone smokes or drinks or if they sleep along those same lines, we need to be aware, can you afford your medicines? Can you get to your appointments to have a safe place to be to live? But know your patients just like you want to know what medicines are on and what they're allergic to. We need to know what's stressing our patients and how can we best help them?
Dr. Wendy Slusser 24:21
That's really wise advice to give future physicians. There was one research project I did in LA Unified School District around wearing glasses. In first grade of course, we we screened all the children before they go to school. And then if they don't pass that particular screening, they get referred well children and medical or Medicaid. It takes on average 15 months for them to get glasses once you refer them and imagine all through first grade. They don't have the ability to see the board necessarily. And so it's not just that you screen and identify and refer For it's also that kind of follow up, at least give the information to the parent that this is critical for the learning piece or something along those lines. Which gets me to the other question I've been wondering about with your incredible work with the fresh food pharmacy. How do the families who might not have the skills to know how to cook or prepare foods maybe that they're not as familiar with? How do you manage that step?

Dr. Andrea Feinberg 25:26
As an ICU doctor, you're in charge of everything for that patient, right? Because they're lying in your bed, and you have to keep them safe. So you have to think of them as a whole, very holistically, it's the same thing here, we felt very responsible that if these people were going to be successful in managing urges, and kind of selfish, like, we knew that we had to help them in areas just like you're saying that a person may not be familiar with proper methods of food care, preparation, storage, etc. The what we've learned, and we learned a lot, well, some people didn't have electricity, some people will unhoused, some people didn't have a hot plate, a working oven, a microwave, a stovetop stuffing, Medicaid and health insurers are prevented from giving too much stuff to to patients you can't give, at least in the time we were doing this, you can't give over $75 of goods to patients, because it could be seen as incentivizing them to sign up for your program. So we had to be very careful what we did. But we would find ways to get a hot plate into the house. So if they needed silverware and pots and pans, we help them if they needed a microwave, people absolutely are not all interested or knowledgeable about cooking, we had cooking classes, we partnered with local cooking schools, we found places to do demonstrations, education was a big part of what we did. So they had to be able to actually do the cooking and the food prep, they had to know what to do. So we gave them menus and recipes that our dietitian was very involved with that. And then we of course, provided them the raw ingredients, fresh fruits, fresh vegetables, whole grains, and lean proteins. We gave milks, non dairy milk, we gave yogurt sorts of foods, eggs, so we had a lot of variety. And we have recipes for everything.

Dr. Wendy Slusser 27:29
You know, in your Harvard Business Review article, you you mentioned a number of barriers. Maybe we could address those right now, before we wrap up, the way you describe it. Of course, all these things always seem so simple when it's happened already. But I'm sure you met with a lot of resistance in certain places. And it'd be great for people to be aware of those.

Dr. Andrea Feinberg 27:52
So I think one of the barriers, I would say, and we don't talk about it so much in the program was that we and I think people who work in public health, understand this and who do
was that we and I think people who work in public health, understand this and who do community work, understand this very well. You can't go into any community and think you're going to fix the community. It doesn't work that way. You have to understand, and actually, I think love the community and figure out with the people of the community, how you can help them. And you have to build trust and camaraderie. And so that, to me was one of our barriers in the beginning. But it took us a while to get people on board and to learn about the program. I think another barrier to the programming is you have to find funding, because this is expensive, right? And it's it's a passion project. So you need leadership, but you need leadership at many different levels to support and be able to say, Okay, we'll try to do this with you. And then I'd say another barrier was that how quickly things can change. So we realize that people responded very quickly to the provision of healthy, safe, nutritious food. And so we had to be very flexible and fluid and, and very quickly change how we did things so that we wouldn't hurt anyone, right? That was the most important thing. The best thing we probably ever did was partnering with our food bank partners at the Central Food Bank of Pennsylvania, because when you pick your partners well things go well and they were extremely supportive and helpful and taught us so much about food procurement. I can't say enough good things about really feeding American and the food banking industry because they are really, really saving lives and 10% of American households are food insecure. That in many of our communities in Pennsylvania, one in four, one and five, one in six children were food insecure, which was unbelievable to me that in our country that is so wealthy, and, and so powerful that within our borders, we have people that are really challenged. And why this is important is that if you're food insecure, if you don't have access and the ability to obtain food, because you don't have money or to live in a food desert, your ability to stay healthy, is much harder, your chances of developing diabetes are two to three times happier because of it, we spend over $4 trillion a year on health care, I can't say that my stats are 100%, perfect. But in 2021, something like 85% of our health care spend was on chronic diseases and diabetes is one of those diseases, we actually spent more, keeping people healthy, keeping them fed, keeping them educated on how to be helpful, we would have a fighting chance at instead of diabetes rising, maybe we can bend the curve and prevent diabetes.

Dr. Wendy Slusser  31:06
That's a really good summary of where focusing on the determinants of health focusing on the food piece could really make a huge difference. I mean, your story of going from, you know, the ICU to this population health trajectory is so powerful, and shows not only your observation of what is going on in your own immediate practice, but also, you've been able to sort of summarize what it could mean for the entire country. I'd love to end this on a personal note, or maybe it's a global note. What does it mean for you to live? Well,

Dr. Andrea Feinberg  31:47
I would say it's something I share with our kids that you have to make the world a better place. Whatever you do, whatever road you travel, you have to have a positive, long lasting effect on the world to make it better. So and we all can do that in so many different ways. But I think you have to have your eyes open and see what's right in front of you, and then take some action in whatever way you can.

Dr. Wendy Slusser  32:17
Dr. Wendy Slusser 32:17
That's a great way to end this. I think that you summarize what you have been doing your own self over your lifetime in you practice what you preach to your children, which is the best model to be for a mother. So thank you, thank you for this interview. And even most of all, thank you for creating a model that is really inspirational. You're so kind.

Dr. Andrea Feinberg 32:40
Thank you. It's my pleasure. And that big call out to the guys in your team that supported and helped develop the program and are currently passing the baton and the food as we speak to literally provide millions of meals a year. So kudos to them, and we couldn't have done it without.

Dr. Wendy Slusser 33:01
Thank you so much again, Dr. Feinberg. Thank you