Welcome to Conversations About Care: A Podcast for Pediatric Clinical Providers

Hi! This is Sandy Hassink and I'm the Medical Director for the Institute for Healthy Childhood Weight at the American Academy of Pediatrics. I'm excited to share today's conversation with you as I recently sat down with my colleague, Dr. Mike Dedekian, a pediatric endocrinologist. We were able to take a deeper look at the increased prevalence of children with obesity developing prediabetes and diabetes, especially as a result of the pandemic. We also talk about the importance of building a multidisciplinary care team for obesity care. Stay tuned to hear our conversation.

Dr. Hassink: I'd like to welcome everyone to our podcast today and introduce you to our guest Dr. Mike Dedekian who is the vice chair of pediatrics of Barbara Bush Children's Hospital, and the Medical Director of Pediatric Specialties at Barbara Bush Children's Hospital. And importantly to us, Mike has dedicated a large portion of his time to helping deal with the endocrinologic issues faced by children with obesity and is closely associated with the Let's Go program in Maine. And before I let Mike introduce himself a little bit, I wanted to let you know we'll be talking about the clinical aspects of prediabetes and diabetes in a little bit. But first, I wanted to ask Mike two questions. One is how he developed a particular focus on children with obesity, and two, how has he seen his relationship with primary care clinicians evolve over the course of the obesity epidemic and particularly during this time of COVID when we know that obesity and diabetes have been increasing.

So with that Mike, I'd like to welcome you and ask you to tell us a little bit about yourself and how you got interested in helping our children with obesity.

Dr. Dedekian: Thank you Dr. Hassink. It's privileged to be with you. Thanks for the invitation. That's a great question how we first got interested in helping children with obesity and I think fundamentally it speaks to the reason a lot of us do pediatrics, which is we love preventing disease; we love preventative medicine. I mean, pediatrics is so much about keeping kids healthy, preventing disease so that kids don't need to go to the doctor a lot, and as adults they are on a healthy start that they don't need a lot of medical care moving forward. And there's probably no better example of that or no bigger example of that in terms of prevalence through society than helping kids get off to a healthy start with lifestyle and their weight.

I remember being a pediatric resident and we saw this coming at us in the late 1990's early 2000's and I remember thinking, you know, no matter what we do in pediatrics, the problem developing with obesity is going to touch all of us in primary care and specialty care, and that certainly has been true. There's so many elements of weight issues that touch all our specialties. So a very important area, of course, to work on and very rewarding as well because we know we can make a big impact on children's health moving forward.

Dr. Hassink So Mike, you said a couple things there that I really want to key on. One is we saw this coming and we knew we all have to work on it and I think that weaves into our next question about just how have you seen your relationship evolve, or how would

you like it to evolve as a specialist in a children's hospital with your colleagues in primary care trying to take care of the kids with obesity out there.

Dr. Dedekian: Well, that is a critical relationship, of course, with primary care and I think what has been true for me as I've developed through my career, and I'm sure is true of most specialists, is our reliance on primary care to help us with care management, grows over the course of our career. Some of us may come out of fellowship feeling like we can do it all and handle everything with complex disorders, but we really do need a strong engagement with our primary care colleagues. That goes without saying. So that relationship is extremely important and especially in something like wellness, obesity care, helping kids stay healthy, preventing diabetes. I have learned through my career; we cannot fix this problem one patient at a time in a specialty clinic. That is difficult to access and expensive to run and can't reach every kid that needs to see us. So it is absolutely critical that we have strong relationships with our primary care teams. And thank goodness, here in Maine and around the country, we have tremendous talent and tremendous resources. Not as much as we would like, of course, but we have tremendous investment and passion in our primary care colleagues with helping us in this work. So more and more we work together on these issues. There's no doubt about that.

Dr. Hassink So Mike, I talk to a lot of pediatricians and some of them are in areas where endocrinologists are really hard to find and one may be a couple of hours or more away. And they may not know them personally, but they're looking at these children that they know need help, how would you recommend that they reach out to their endocrinologic colleagues? Like, what would be a good way for them to do that to make that connection?

Dr. Dedekian: That's a great aspect of the relationship to talk about. And I think endocrinology, being a cognitive specialty, is very well suited for this kind of relationship, and very well suited for kids who maybe just need a little bit of advise going back to the primary care team. And then they can continue management and continue on a preventative care kind of path. I think most endocrinologists would say we see children in our clinic. You don't really necessarily need all the bells and whistles that are in an endocrinology and diabetes clinic. There are other things, more accessible things, lower cost things, that we can do in the community in the primary care setting that may be very effective. And a program like 5210 is a great example of that. I mean, I can do 5210 just as well as a primary care doctor can. There's nothing special about seeing that messaging in the endocrinology clinic, and many times that's the intervention, or something like it, that will be effective.

So yeah, you mentioned this idea of thinking about relationships in your community or in your state and certainly your comments resonate with me where in Maine, the most rural state in our country, in the lower 48, we run into this all the time where kids will be two or three or six hours away and not have easy access to getting to us in clinic. But telehealth has improved that, but if you know your neighborhood endocrinologist and have some way to interact with them electronically or by phone

… here at Barbara Bush Children's Hospital we're rolling out asynchronous e-consults which have been tremendously effective in endocrinology in particularly. Primary care may just need a little bit of guidance, a little bit of advise and then are in a much better position to help a family moving forward. I could give a specific example of that, Dr. Hassink, if you think that would make sense.

Dr. Hassink Sure. Sure. I'd love to hear that, Mike.

Dr. Dedekian: Yeah, we have a very engaged provider about two hours from here in a rural setting who is just a tremendous advocate for her patients. And she had a family where the child was around 14 years old, struggling with a number of psychosocial stressors as a diagnosis of autism spectrum disorder, very elevated BMI, prediabetes, hyperlipidemia, etc. And that family had transportation issues, which is unfortunately common in many of the families we work with, and they very much wanted to have an interaction with me but just weren't able to get here. There were some technological hurdles to doing telehealth. So what we did in that situation was the pediatrician scheduled a follow-up visit with the family just to talk about lifestyle, healthy habits, prediabetes, and I put that patient on my schedule and with the iPad that the primary care doctor had in clinic I joined the visit. And we had her present, I was there and then was able to meet the family through telehealth. And they just needed…they, the family, I think the physician in this case knew what to do but the family, I think, just needed a little more explanation, a little more encouragement. They needed to hear it from somebody else besides their primary care doctor and we run into that a lot where families kind of like to hear the same message from a different person before they're ready to move forward. So I was able to provide all of that and they were off and running. And I've not had to do a follow-up visit with that teenage, but I've kept in touch with my primary care colleague and that family's doing very well now six or eight months after that touch point that we had. Now this is a person that I know, she trained in residency here with us, so there was a relationship there and I, you know, was able to flex my schedule enough to make it all work. I mean, it's a tall order to ask everybody to do that, but in certain situations that might be very effective. So we got that adolescent great care, the families on a great path, primary care team is rallying around that child and they're off and running. They can call me if they need me but they're good.

Dr. Hassink Well, Mike, such a good story about just thinking a little innovatively about how do we make this work. What about a primary care doc that really doesn't know their endocrinology colleagues at the Children's Hospital? Is a cold call okay? I mean, could they just, like, call up a department and ask to speak with somebody and talk about how they might work together? What would that be like?

Dr. Dedekian: I think that's a great idea. I can't speak for every endocrinologist out there but most specialist are like everybody these days, overburdened with the volume of stuff that we have to deal with. So knowing you have an engaged partner in the community

who wants to make care effective and coordinated and cost effective for your community, I would take that cold call any day of the week. My guess is that most of my other colleagues in specialty care would be delighted to do that because it helps the specialists run their clinic as well. So I would encourage that. You know, find who the office manager is maybe and reach out to them, set up a half an hour to touch base with somebody. When our residents leave our program, and I'm sure this is coming, and go to other regions of the country, one of their areas of anxiety, right, is who do I call. Like, I used to call Mike if I had a quick question. Who's my curbside person now. So we always encourage them to go find out. Find out who the specialists are that serve your region and figure out how to reach out to them. I can think off the top of my head five or ten primary docs that do an especially good job of that and we should study that probably, Dr. Hassink. But those patients I think get better care. I think they get better care, more coordinated care, and they probably utilize less health care as well. So those relationships, I think, are worth investing in.

Dr. Hassink Well, Mike, you're singing my song, and I remember back in the 80's when I was starting my weight management clinic. I was in the hospital but I actually went to each of the specialists just to have a conversation about here is what were likely to see, of course we didn't know as much at that time about the comorbidities, what part of this work up would you like to do, what part would you like me to do, and it actually did help the child get smoother care. We understood our individual roles. So don't be surprised, Mike, if primary care docs are going to start calling up their endocrinology colleagues and saying, "Mike Dedekian told me to call you."

Dr. Dedekian: I love it! I think it's great! I'll be on the hook for that. I will talk away and take responsibility. So again, it helps us run our clinics and if we can get better input through our clinics and see the kids we need to see when they need to be seen, that's a better running clinic. It's a better day, it's less burnout, there's so many positives to it so it's worth doing. And you know, it takes engagement and we know that we struggle with engagement around the country. So it does take an engaged primary care person and an engaged specialty person to make it work.

Dr. Hassink Yeah, and just to close out this part of the conversation, I would say that that half hour that you might talk to your colleague, your specialty colleague will pay you back many fold over the course of time.

Dr. Dedekian: Absolutely!

Dr. Hassink It seems like a lot but it will pay you back. So Mike, I did want to get just get your thoughts here. Here we sit, the obesity epidemic has been going on and unfortunately and sadly we haven't been able to make a big dent in it before COVID, and then COVID came and now we know obesity is increasing and diabetes is increasing. So can you talk a little bit about prediabetes. It's something that we focused on but I think we're increasingly focused on now as we know that these numbers are just increasing.

Dr. Dedekian: Right. It is really sad to see and the kind of collateral damage from the COVID pandemic. It's as if so many young people were on a metabolic cliff, right? They were right on the edge of the cliff sort of doing ok, maybe some hits of metabolic syndrome, or just a little whiff of elevation in glucose. And then when the pandemic hit and there was less active time, more time at home, inevitably more time around food and eating, not to mention the stress of going through COVID and being a kid during COVID which has really been hard on children, there's no doubt about that, a lot of kids fell off the cliff. It's unbelievable.

In one of the recent studies that was just published through Children's National, a staggering 180 percent, somewhere in that range, increased incidents of Type II Diabetes during the COVID pandemic. An increase in Type I as well that's of concern, but the numbers for type II really blow everything away. Just incredible and more of those patience presenting in DKA also Type II. So here's a disorder that 40 years ago we never heard of in pediatrics that now is really increasing to staggering numbers. And we know that the phenotype of Type II Diabetes in young people is different. It's more aggressive, it progresses to needing insulin faster typically than in adults. And sometimes is also associated with autoimmunity which goes by different names. You can have element of both Type I and Type II Diabetes in the same kid. You can have both kinds of physiology at play so we always encourage people, don't be biased by the BMI. If you have a 14 year old with new onset diabetes, you should do some work to figure out which type it is. Don't assume it's Type II just because of the elevated BMI.

In prediabetes you mentioned, we know that if you catch diabetes early it's going to be easier to manage and you have a better opportunity to prevent progression. So that absolutely is something we want to keep an eye out for. And, you know, what's evolving around screening. You can probably speak to better than I, but as a biased endocrinologist I like fasting glucose, I like A1C many times is very helpful, but if you have elevated BMI, particularly with acanthosis, particularly strong family history of Type II Diabetes which is very genetic, a strong genetic influence. we want to be on the lookout for Type II. So looking at prediabetes is a great endeavor. It's worth the effort and then if we find it, what's also great, we could talk all day about this, is modest changes to lifestyle where low hanging fruit, getting rid of soda, things like that, increasing exercise even modestly, even minimally, often can turn the ship around. So high yield, high reward.

Dr. Hassink So Mike, talk a little bit about talking to patients about your screen kids in clinic, your primary care, and you know, you have a child has elevated BMI, you're screening and you find prediabetes. How do you talk to patients about what's going on there?

Dr. Dedekian: I love this conversation and this topic. It's a big one, right? I'll just try to say a couple things in a very concise way. One is that I really encourage everybody to find a way to buff up your motivational interviewing skills. Through the Let's Go program we've been very fortunate to have some pretty high level training on motivational interviewing. It's not something that was even remotely on my radar as an

endocrinologist and I had zero interest in it and it probably is the single most important piece of my training that I've had outside of fellowship. And absolutely has changed my day-to-day, everyday that I come to work. So investing in a short course of a couple of days, there's many of them out there, is really something that I would endorse. So using motivational interviewing is the short answer to that question.

To go in a little more depth, we love to make sure we're not using stigmatizing language, of course. That could be another whole podcast. So we talk about BMI, we talk about health, and we talk about how to have a healthy life and grow up healthy. And I like to talk about how hormones are, kind of, doing their thing and a lot of it is not necessarily under our control. So removing stigma and bias, because I still think most families come in they're worried the physician's going to blame them for what's going on. Even if we don't say it that way, sometimes the way we approach it is very blaming of the child or the family that they let this happen. And we try to really steer away from that and explain that 'Look, when your weight is going up faster than height as you're growing," that's a little phrase I like to use, "we know that your hormones are working hard and sometimes they work overtime. And when they're working overtime, your blood sugar can start to rise a little bit and we want to make sure that doesn't evolve into diabetes. So very patient-centered language, as much, you know, non-stigmatizing language as we can use is absolutely essential.

Dr. Hassink So, you know, we all are very familiar with the fact that, you know, you're seeing the child but often either the obesity or the diabetes is in families. Do you have a way of just sort of approaching where you're including the family in the home operation here?

Dr. Dedekian: Yes, absolutely. I always like to see families together. So even for older teenagers, my own personal style is generally we're working with the whole family all together. So that is absolutely critical. And I use it as a positive because if a family member has been struggling with weight, a mother or father, often it's of concern to them and I like to hear about the kinds of things they've tried to do in their life to be healthy. Again, we ask in a very open ended way, you know, have other people in your family been concerned about weight, have you been concerned about weight, or do you have diabetes, are there health problems, and you get a ton of great information from that. Families will say what they've tried, what they feel worked, what they feel didn't work, that also is part of motivational interviewing. You may think the kid needs to stop drinking soda and the families got some whole other opinion about soda and maybe that's not the thing that you want to work on. So letting them lead the way is critical and yes, doing everything in the context of the family is absolutely so important. So we love to hear from family members too about their experiences and their goals for their kid.

Dr. Hassink Mike, I have been concerned for a long time, I think we knew this clinically before maybe we knew it by studies, and how more aggressive Type II is in a child. Can you

talk a little bit about that? Do we know why this is happening that it is a more aggressive disease in kids?

Dr. Dedekian: Yeah, that is a great question and I will be honest with you, I don't know the recent literature on that in terms of molecular mechanisms of why that might be true. So I don't know. That's a good homework assignment for me.

Dr. Hassink Yeah.

Dr. Dedekian: One of the reasons we do think plays a role, and I'm not sure what studies have born this out, is that puberty itself is an insulin resistant state. So we know that by making a lot of testosterone, estrogen, and particularly growth hormone, which is almost the same molecule as insulin , you are insulin resistant by definition just be being a teenager no matter what your BMI is. So when you have the physiologic insulin resistance of adolescents on top of weight related insulin resistance, those likely compound each other. So I'm not sure that that's been scientifically proven to be the reason, but we do know that the insulin resistance of adolescents is not helping these kids.

Dr. Hassink And we also, you know, the other concern just in terms of time, is you know, a child in that, or an adolescent who gets Type II has many, many years to live with this disease and the ravages of the disease which is also a concern and always sort of upped my urgency for trying to get this early and work on it. I was giving a lecture on comorbidities the other day and just the point came up of now that we have kids with obesity and DKA is rising, just educating your entire staff, especially your front line staff about just when a patient calls in when you might want to see them urgently when you know this about them. Do you have any advise about how you train their front line staff when they're answering a patient call?

Dr. Dedekian: Yeah, excellent topic. We like to train all our front staff about symptoms of diabetes so polyuria and polydipsia should be taken seriously. And that -- it's rare to have those symptoms in a presentation of pediatric Type II diabetes but is possible. So is still something important for staff to be aware of. And I had a situation a year or two ago where this was a problem in the primary care setting because, you know, urinary types of symptoms are a common triage call to a primary care office. So it is a bit of a challenge and we did kind of a mini quality project on it re-educating front desk staff and helping them distinguish dysuria and frequency in that -- that may be a UTI type of symptoms to polyuria and polydipsia. It would be of greater concern. So that is definitely another area that's worth investing with your teams to talk about.

But the problem with Type II Diabetes is largely asymptomatic, right? I mean, that's the issue. It's very rarely going to present with the classic signs of diabetes, increased thirst, urination, and vomiting, signs of DKA. So it's conundrum. It's largely a silent disease even when A1C can be pretty high. Often there are not a lot of symptoms.

Dr. Hassink So I have another question and it may not be germane, but I've been really fascinated by the increase in technology that the children and adolescents with Type I Diabetes

are using the loop, you know, the continuous glucose monitor and the insulin pump. Do you see that technology coming into the population of kids with Type II?

Dr. Dedekian: Yes. Absolutely. So unfortunately, a number of kids with Type II Diabetes are going to progress, sometimes quickly, to needing insulin and yeah, a full armamentarium of tools that we have for Type I Diabetes you would absolutely use for Type II. It depends on the severity of the disease. If you have a more mild Type II patient who is just using Metformin or Liraglutide we're using more and more now. So a couple different names out there, brand names for things, but these GLP-1 agonists are being used more and more in younger people. But Metformin is still usually our first go to. So many patients just on Metformin don't need a whole lot. Even blood glucose monitoring is not super essential if A1C is relatively controlled. But as diabetes progress is yes. We will use pumps, we will use sensors, the closed loop technology that's evolving is absolutely incredible; just amazing. And we definitely will utilize any and all of those things to help our kids who are struggling.

Dr. Hassink So Mike, as we wrap up, is there anything you'd like your colleagues, either endocrine colleagues, primary care colleagues, or both to know, specifically, just what we're living with obesity and prediabetes and diabetes at this time?

Dr. Dedekian: I think the thing to and remember, for all of us to remember, is with Type II, unlike Type I, there are some really effective things that we can do that don't involve a prescription. And it's the stuff we all know and that's good news, right? Eating a little bit healthier, moving around a little bit more does wonders. It's incredible. So sometimes it feels like a real uphill battle. Moving patients toward those things, they're they easiest things to say and the hardest things to do or prescribe. But they're so effective and we've seen so many kids who get on the right track with lifestyle and put Diabetes in the closet and it's, kind of, still there but the door is locked and Diabetes is not coming out. And that's really rewarding to see. So I would just make sure that we continue to encourage ourselves that we can do a lot as providers and healthcare teams with not a lot of fancy stuff and not a lot of money to really make kids better.

Dr. Hassink Mike, I so appreciate that and I so want to thank you for sharing your time with us on this podcast. Thank you so much.

Dr. Dedekian: Thank you. My pleasure to be here.

Thank you for listening to my conversation today with Dr. Dedekian. I hope our conversation gave you some insight about ways you may be able to connect with multidisciplinary partners on your care team. I also hope this podcast helped you think about ways in which you can respond to the increasing prevalence of prediabetes and diabetes among our patients. You might want to check out the following resources as you move forward in your care plan: Diabetes Clinical Practice Guideline, Quick Reference Tools, Management of Newly Diagnosed Type II Diabetes Mellitus in children and adolescents. A study categorizing the risk for Diabetes, Diabetes increases in children following COVID-19 infections, which is reported in the AAP News. Childhood Obesity and Primary Care Module 6, Motivational Interviewing: A

Strategy to Stimulate Change Talk, and Change Talk: Childhood Obesity, Motivational Skill Building Module, Download from Apple or Google Play. Thank you for listening.