

Sawbones 555: Tylenol

Published September 30th, 2025

[Listen here on Maximum Fun](#)

Clint: Sawbones is a show about medical history, and nothing the hosts say should be taken as medical advice or opinion. It's for fun. Can't you just have fun for an hour and not try to diagnose your mystery boil? We think you've earned it. Just sit back, relax, and enjoy a moment of distraction from that weird growth. You're worth it!

["Medicines" by The Taxpayers plays]

Justin: Hello, everybody, and welcome to Sawbones! A marital tour of misguided medicine. I'm your co-host, Justin McElroy.

Sydnee: And I'm Sydnee McElroy.

Justin: Hey! How's it been going for you over there, out there in the world?

Sydnee: A lot's been going on, Justin.

Justin: Busy time. Busy time. Busy time.

Sydnee: Mm-hmm. Well, we were promised, I think everyone remembers, we were promised—was it back in May?

Justin: Yeah.

Sydnee: Was that when—

Justin: We're gonna get to the bottom of this—

Sydnee: Yeah, RFK Jr. announced that he was gonna crack the case of autism spectrum disorder.

Justin: Yeah.

Sydnee: That he would have a definitive announcement. And now, to be fair, I assumed, when he said, "I'm going to tell you what causes autism in September," I thought it was going to be vaccines.

Justin: I don't think any of us were ready for the twist. [chuckles]

Sydnee: No. I mean, I really—

Justin: We didn't see this coming.

Sydnee: I really thought—I think—and a lot of people assumed he was just gonna pin it on vaccines. And now, don't get me wrong, underneath this—we're gonna be talking about Tylenol and pregnancy. But underneath that conversation, there are, I mean... there have been insinuations, and not just insinuations, but direct advice from the Trump administration to spread out vaccines, to take fewer at a time—

Justin: So—

Sydnee: To avoid certain vaccines. So, that is happening.

Justin: Right, so, I—this is my personal—can I tell you, as I've been watching this, this is where I—what I understand from reading and watching. The people that wanted RFK in office very much cared about this nonsense. Like they really cared about this MAHA (Make America Healthy Again) garbage.

Sydnee: Yes.

Justin: And I think that the Trump administration, as we understand it, does not necessarily care or have the will to fight these fights about vaccines. I don't think they care that much.

Sydnee: No.

Justin: But I do think to get RFK to drop out of the race, concessions had to be made. So, I do think—I would not have been surprised if the initial plan

had been to say vaccine—like, if that had been the vaccines, and they had to be talked down from that to a lesser offer.

Sydnee: Well, and I'm gonna go through the timeline of research here, and a lot of this is sort of hinging on a paper that was released in August. Like last month, August. So, it almost makes you wonder if they didn't see this paper and went, "Well, let's just go with that. That seems—that'll be easier. Let's go with that."

Justin: Yeah, because most of the people in the Trump administration do know that vaccines are safe and effective. Like, they do, they—it is a bargaining chip. It's how much of your health are they willing to trade away to make things harder for trans people and people of color and... et cetera, et cetera.

Sydnee: Right. And I mean, I think the thing with vaccines specifically is—and the more and more we learn about how radical political ideology is not one thing on the right, there's a bunch of different flavors of that and worldviews. Vaccine denial is not universal across them, and I think our own senator, Jim Justice, is a good example of that. He's on the far right, but he wasn't so sure about the vaccine stuff. Like, he really likes vaccines.

Justin: Now, Sydnee, you say that, that man was—that man ran as a *Democrat*.

Sydnee: Well—

Justin: There is no way he's on the far right, that's impossible! He was elected the Democrat governor of West Virginia, there's no way he's—

Sydnee: And then he—and then he called Donald Trump to come here, and he changed to a Republican in front of him.

Justin: He said—guys, it is—if you follow wrestling and you don't—and you don't follow West Virginia politics during that time, you really missed out. Because it was the most amazing like—Trump showed up and he was like, heel turn, "I've actually been GOP this whole time!" Like, yeah, dude...

Sydnee: Put on a MAGA hat and—

Justin: Yeah, Jim. No kidding, dude. Sydnee and I walked into the voting— [chuckles] the polling place saying, "Well, here we go! We're gonna vote for Jim Justice, a Republican."

Sydnee: Yeah. Sometimes in West Virginia, you just, you know you're violating your own... ethics. [titters]

Justin: [sings] Just hold your nose and push the button.

Sydnee: No matter how you vote. But the—[titters] So, but what my point is, is that even Jim Justice recently came out and said, "I like vaccines. Like I did the whole Do It for Babydog during the covid vaccine thing, to get people—"

Justin: "I did it. I raffled old trucks."

Sydnee: He said, "I get my flu vaccine, I get my Covid vaccine." He was encouraging people. So, I think you have less consensus on the right to undermine vaccines.

Justin: Because we have the people in this state that will listen and die.

Sydnee: Well—

Justin: Because the people of West Virginia will—are the people who will be disproportionately affected with worse outcomes, because they don't have these simple preventative treatments.

Sydnee: Yes, not just us, but any area that is living in—

Justin: Well, yeah—

Sydnee: The kind of poverty that—yes.

Justin: Obviously, Syd—

Sydnee: Yeah.

Justin: I wasn't implying that West Virginia was the only place with poverty in the US.

Sydnee: No, I know, I just mean—

Justin: But disproportionately—

Sydnee: Yes, yes. And that's why, even on a state level, our legislature keeps trying to undermine vaccines, and then they just don't follow through. Now our governor is trying to override the legislature, that's a whole thing. But the—but the reason you see that is because there are... in the Republican super, super, super majority we have on a state level, they still are kind of like—

Justin: Super-duper, y'all.

Sydnee: Yeah.

Justin: It's like eighty-eight or ninety. I can't remember the last—

Sydnee: There's like five—

Justin: Ninety out of a hundred—

Sydnee: Democrats or something. But anyway... So, instead, he told you not to take Tylenol. He tried to tell you not to take acetaminophen, but he could not pronounce acetaminophen. So instead, he told you not to take Tylenol. Technically, the thing they're cautioning you against is acetaminophen. So, I think it's important to know Tylenol is the brand name. Acetaminophen is the—

Justin: Tylenol also makes a lot of non-acetaminophen products.

Sydnee: Exactly, and... there—through most of the world, acetaminophen, what we call acetaminophen here in the US, is paracetamol, same thing. So,

I think it's important to know that, because I don't—[chuckles] I don't want to get sued by Tylenol.

Justin: Yeah!

Sydnee: So, if...

Justin: So—it's so... it was so wild to see them go after a brand. I didn't think a brand would be in the cross hairs?

Sydnee: He said, "Don't take Tylenol."

Justin: Certainly not a brand?

Sydnee: What did he say? "It's all bad... be good, it's all bad. Don't take Tylenol." I don't remember the quote.

Justin: [titters]

Sydnee: But as medical advice goes, it's not—I would not say it's the best. So, the idea is that they've come out and said, "We have recent research that indicates that if a pregnant person takes acetaminophen during pregnancy, it increases the risk of autism in the child." And they don't—and I will say like, in the—in the announcement, they don't say, "Absolutely, this causes this." That's true. They do heavily encourage you not to take Tylenol in pregnancy. I mean, he says directly, "The President said don't do it, don't do it."

Justin: Yeah.

Sydnee: "Don't take Tylenol." So, I mean, definitely causation is being presented. A lot of defenders jump to say, "Well, they're just calling attention to some studies, some associations." But they definitely said, "Don't take Tylenol during pregnancy." Okay, so, why is this such a big deal? Well, let me say, first of all, if you're—if this is not something you're familiar with, when a person is pregnant, they have very limited options when it comes to over the counter pain control medications.

Justin: Mm-hmm.

Sydnee: It is not safe for the pregnancy or the developing fetus for you to take what are called NSAIDs, non-steroidal, anti-inflammatory drugs. And that would be your Aleves, you know, your naproxens, those sorts of medicines. You can't take those for a variety of reasons in pregnancy. And so really, acetaminophen is your only option. You got a headache, you break your ankle. [chuckles]

You—I mean, obviously, if you're being hospitalized, we can do other things with stronger prescription medications, monitoring and blah-blah-blah. But if you are at home and you are in pain, and you are pregnant, the only thing that your obstetrician is likely to tell you to take is going to be Tylenol. And that can sound like a minor thing, until—I will tell you, I had a horrible sinus infection during my second pregnancy with Cooper. I have never been in, I mean, other than my C-sections, I've never been in that amount of pain in my life. My face felt like it was gonna explode.

Justin: Yeah...

Sydnee: And the only thing I could take was acetaminophen, and it doesn't help as much, in my opinion, as ibuprofen, but at least it was something that gave me a tiny bit of relief, while the antibiotics did their thing. So, it is a big deal for pregnant people, if you're suddenly telling them you can't take acetaminophen. And then it's also a big deal for every parent or guardian who perhaps took acetaminophen during pregnancy, who is now blaming themselves if they feel that their child, you know, has specific struggles or challenges. They are now looking to themselves to say, "Did I do something that made my kids life more difficult in some way?"

Justin: Mm-hmm.

Sydnee: That is how—that is how they're being made feel. So, where did this come from? Well, first of all, I'm not going to do an entire episode just on autism here. I want to be able to talk about both, so I'm going to be kind of skipping through it quickly.

Justin: Okay.

Sydnee: To give you a timeframe, how long have we talked about autism? The term dates back to 1911. Eugen Bleuler was the first like child psychologist and physician to talk about what—the term autism. And when you go back—and so I think it's really important, as we combat misinformation, to understand the nuances here. When the term autism was originally introduced, he was talking about a kind of schizophrenia.

Justin: Okay?

Sydnee: And it was actually, autism referred to children specifically who had sort of these like—only lived in this imaginary, kind of like figurative realm. Kind of the opposite of [literalism??]. Which, I think our current idea of autism spectrum disorder, this is going to sound a little strange, right? This sounds like—and I think it's fair to say that the term autism did not mean what we would think of as autism now, when it was introduced in 1911. So, if you say, well, autism has been around since 1911, and Tylenol didn't come 'til much later, it's sort of true, but I do think it's important to recognize that the term was being used differently—

Justin: Mm-hmm.

Sydnee: As we were talking about. At the time, children who behaved or thought or acted in ways that were different, that were divergent, we really didn't understand. And we usually chalked it up to some sort of childhood schizophrenia. Autism being the way that he described it, right?

Justin: Mm-hmm.

Sydnee: When we get to the '30s and '40s, we start to see two terms. Infantile autism, which is getting closer to what we think of now as autism spectrum disorder. And then also, that's when you get the introduction of the term that we don't use anymore, Asperger syndrome.

Justin: Okay.

Sydnee: So, those both come out in the '30s and '40s. Where—

Justin: Do you—can I just clarify for myself, we don't use Asperger's anymore because of the Nazi connotation, or because it's an inefficient linguistic tool?

Sydnee: I would say both.

Justin: Okay.

Sydnee: I would say, I mean, both. I mean, we don't—we don't need to, from a diagnostic perspective, autism spectrum disorder does the job. Right? Like, that is... that's an appropriate way of describing, because it is a spectrum. And so, children that previously maybe were diagnosed with what we then called Asperger's—

Justin: Okay.

Sydnee: We don't need to.

Justin: Got it.

Sydnee: And also, you know, we're trying, like in medicine, to move away from anything associated with Nazis.

Justin: Get the Nazis out of here!

Sydnee: Yeah. Not so much on maybe a government level, but like—

Justin: Nah, get the Nazis in there! But out of medicine. [titters]

Sydnee: [titters] And so, from that point, as they started to tease apart what we think of as schizophrenia, and then this sort of different way of thinking and interacting with the world. Which, I mean, again, what we're talking about is neurodivergence without the word neurodivergence.

Justin: Yeah.

Sydnee: You just look at things and think about things differently. This is when we start to tease that out. So, the question has been for a while, if,

you know, what we think of as ASD now was described first in the '30s and '40s.

Justin: Mm-hmm.

Sydnee: We have seen rising rates of ASD, basically since the '50s. So, we described it in the '50s, and then ever since then, we've seen more cases of ASD.

Justin: Mm-hmm.

Sydnee: And so, the question from RFK Jr.'s perspective is, what are we doing to cause autism?

Justin: And what can we do to stop it?

Sydnee: To stop it, exactly. And the first part of that, I think, and you've probably heard this from many other medical communicate—science communicators than me. The first part, why is it—why are we seeing more of it? It's because we created diagnostic criteria, and then we expanded those diagnostic criteria, as time went on, to include more variety under the umbrella term autism spectrum disorder. And so, if you expand the criteria—

Justin: Which didn't—wasn't always an umbrella term. Right? So, we're—

Sydnee: It wasn't, we would tease that out.

Justin: Yeah.

Sydnee: And so now that we—because initially, a lot of these cases we were looking at people who had some of, I would say, some of the most obvious symptoms, especially communication difficulties, that really—like the diagnosis of autism initially hinged on that lack of ability to communicate.

Justin: You should—you should also know that like just in our lifetime, just as like people on Earth, that term autism be—like when we first became aware of—or at least, I should speak for myself. When we first became aware of it, it was basically relegated to people who were either like

nonverbal or had a level of—like, it was very much connected to like a savant kind of mindset.

Sydnee: Yes.

Justin: Like the first autistic person that I think most people my age became aware of was like Rain Man. [titters] So like, that was very much the image of autism that we had growing up. So, like, even that idea of autism is one that is like, the term itself has had to expand, the idea of it has had to expand. And just in like a linguistic sense, I think sometimes you should understand that older people, like us—[titters] have like, a different connotation connected to that. Like the term has had to evolve for us.

Sydnee: I mean, even when I was going through medical school, I remember in the lectures that I received about—and at the time, I don't think we were routinely saying autism spectrum disorder, even if that was already the accepted. I mean, what I remember is autistic. Like the autism—

Justin: Yeah.

Sydnee: Just autism. And the difficulty in communication was like the centerpiece of the diagnosis.

Justin: Mm-hmm.

Sydnee: And when you think about how many different ways—I mean, because we have so many different new like media depictions and reality TV shows that include people who have autism spectrum disorder, being their authentic selves in public, communication difficulties is not necessarily the centerpiece of every single individual's diagnosis, right?

Justin: Right.

Sydnee: And so, it definitely, as we've expanded, of course we're going to see increased numbers, because we suddenly realize like, "Oh, you also have ASD," now that we've expanded the criteria to include these other things. And then as there's more awareness, more people will go, you know, talk to their physician about the diagnosis. More parents will bring their

children in. More teachers will call—will reach out to parents and say, "Hey, have you ever considered taking your child in for this evaluation?" I mean, as there's more awareness, you're going to get more diagnoses. And then the other piece of that is that, because our educational system kind of goes at educating young people in a very specific way, that is based on neurotypical brains—

Justin: Mm-hmm.

Sydnee: In order to find other pathways to get certain—like an individualized education plan, an IEP, or certain you know, allowances or concessions, or things made different ways of addressing those learning needs—

Justin: Mm-hmm.

Sydnee: You often need that diagnosis. So, it becomes paramount that you do go and get the evaluation, and get a diagnosis, in order to allow your child to have the best opportunities educationally. So, all of that pressure, plus the fact, deinstitutionalization came into play. So, if you go back to the early years of autism and autism spectrum disorder, a lot of those children probably would have been institutionalized. And kind of tossed into the bucket of whatever term we wouldn't say today, would have been used for these children. They're not getting any sort of specialized care or, you know, supportive services.

They're just put in an institution where they're taken care of. As you saw the movement of deinstitutionalization in the US and other countries, and you begin to see these children raised in their homes with their families, then those parents do start taking them in for individualized diagnoses and to find more services and, you know, ways to help their child adapt and learn. And so, then you do see diagnosis expand. And it's really interesting, because if you compare that to France, France went through the deinstitutionalization movement later, so their autism rates rose later.

Justin: Mm-hmm.

Sydnee: I mean, it's a very clear correlation between those two, because those children were still kept in facilities longer, and you see the diagnosis rate raise, you know, further down the road.

Justin: Right.

Sydnee: So, I mean, all of these things we know, these are all reasons. We have descriptions of what was probably autism spectrum disorder going back to the 1700s. Now, we didn't call it that, so I can't say that. So, autism has been around that long.

Justin: Okay. Longer than Tylenol, one could argue. I'm not a historian.
[laughs]

Sydnee: Longer than Tylenol. So, let me tell you about Tylenol, and what's the big deal.

Justin: All right.

Sydnee: But first, we have to go to the billing department.

Justin: Let's go!

[theme music plays]

[ad break]

Justin: I'm surprised that we had not done an episode about Tylenol, Syd. We've talked about a lot of great brands, including Pepsi, so, not—even Tylenol, we had not discussed. And I know we've done NyQuil, and I know I've done Advil, and a lot of other brands, but I've never covered Tylenol.

Sydnee: It's unusual too, because it's got an interesting backstory. Acetaminophen dates back, well, its precursor, to 1884. There were two German physicians, Kahn and Hepp, and they—basically, they were trying to figure out how to treat a patient who had a parasitic infection, had worms, had a fever.

Justin: Mm-hmm.

Sydnee: They gave him what they thought was Naphthalene, which, at the time, is how you treated worms. And it took away the fever. And they thought, "Well, that's interesting. We didn't think naphthalene would do that." And they went down to the pharmacy and figured out that they didn't give him naphthalene. [chuckles] They gave him acetanilide.

Justin: Okay?

Sydnee: Which is sort of like related to dyes. Like used in the production of synthetic dyes. [titters] And so they were like, "Ah, we can use this to reduce fever." So they started selling Antefebrein, this acetanilide, except it also could turn you blue, because it causes this thing called hemoglobinuria. I'm going through this quickly, to get you to Tylenol.

Justin: Okay.

Sydnee: So, they began to study it, to look for the other—what is it in—"What is in this that's breaking the fever, that we can isolate, and then not also turn people blue?" And through that research, they eventually arrived at acetaminophen. Now, it took—it took a while to get to acetaminophen. And then the other problem is, they didn't know if it would turn you blue. And so, even after it was introduced in like '47, it just sort of sat around for a while, while people were like, "We don't know..." There wasn't—there was not a lot of uptake of it. By 1955, they figured out it was probably safe. And they also were having a lot more problems with aspirin.

Justin: Mm-hmm.

Sydnee: As the competitor, because it's not good for a lot of other things, and it's not great for kids. And so, this is not me having a problem with aspirin, it's just, you know, use it for the right things.

Justin: It is what it is.

Sydnee: And so then, acetaminophen sort of took off. Tylenol became the brand in '55, and then you began to see more and more people taking it.

Tylenol has had some struggles in the past, acetaminophen has had some issues, because of the possibility of liver damage. I think this is—and I hear this a lot from patients, "Well, I'm not supposed to take acetaminophen because it could hurt my liver, right?"

Justin: Mm-hmm.

Sydnee: That, we have seemed to—in an effort to warn people not to take too much, sometimes I do think maybe we went overboard with Tylenol, with acetaminophen.

Justin: Mm-hmm.

Sydnee: Because if you take appropriate doses in consultation with your medical provider, especially if you have some sort of, you know, chronic liver condition, definitely talk to your provider.

Justin: Mm-hmm.

Sydnee: But for the most part, taking appropriate doses of over-the-counter acetaminophen is safe, and will not harm your liver. The reason this kind of starts to get tied up in the wellness MAHA pseudoscience movement, I think, is that when you take Tylenol, it creates a toxic metabolite as it's broken down. It does the stuff it's supposed to do.

Justin: Mm-hmm.

Sydnee: It reduces your fever. It's not great at inflammation, it does a little bit of that.

Justin: I know, yeah.

Sydnee: Ibuprofen is better, but it reduces the fever. But one of the breakdown products is processed through the liver, using something called glutathione. You'll hear a lot about glutathione as this conversation moves forward.

Justin: Mm-hmm.

Sydnee: Glutathione is responsible for a lot of detoxifying that is done in the liver, not just breakdown products of acetaminophen, but other things.

Justin: Okay.

Sydnee: Okay? And if you overdose on acetaminophen, the problem is that you deplete all the glutathione, and so then that toxic metabolite will keep building up, and then you—

Justin: Mm-hmm.

Sydnee: Can go into liver failure. So, that is where it comes into play with Tylenol. Now, if you use up all your glutathione, guess what? You make more. [titters] So, as long as you're taking appropriate doses, that's not considered to be a large problem. There are studies out there looking at like supplementation with glutathione.

Should we be giving people glutathione? Specifically, if like someone comes in with a heart attack, should we give them a big dose of glutathione to help them deal with all the breakdown products that are about to filter through their liver and kidneys and everything? So, there are these conversations happening. As it stands, there's no standard recommendation to take glutathione.

There's no standard thought that taking a normal dose of acetaminophen will deplete your glutathione. You can buy glutathione supplements, as you may imagine, from a lot of the same people who are upset about acetaminophen in pregnancy. And so, I think that's where this wellness argument comes in.

Justin: Okay.

Sydnee: Okay. So, we have autism spectrum disorder being described first, we have Tylenol coming along later. So, already we've got problems with this, right? Well, in 2021, this is where I think a lot of the original argument here comes from, okay?

Justin: Okay.

Sydnee: So, September 23rd, 2021, a... in Nature Reviews Endocrinology, a consensus statement is published on paracetamol use during pregnancy, a call for precautionary action. This was a consensus statement that reflected ninety-one scientists from across the globe. And basically, they looked at a ton of different studies on acetaminophen use in pregnancy. And they felt they saw an association between paracetamol use and increased rates of... I think it wasn't just autism, they talked about ADHD, other neuro divergence, right?

Justin: Right.

Sydnee: Neurodevelopmental issues. So, they basically at the end say, maybe be careful with taking acetaminophen. And take only as much as you need, take less of it, try to avoid it, whatever. Talk to your doctor. Okay?

Justin: Mm-hmm.

Sydnee: So that statement comes out in 2021. Well, obviously, this is a big deal for those who practice medicine and take care of pregnant people.

Justin: Yup.

Sydnee: And so immediately, the data started to get teased out. And what they found in this specific study is that they did not do a lot of work to control for all of the confounders. And what that means is, if I am taking acetaminophen in pregnancy, because... I don't know, I twisted my ankle, and my ankle sore, that is a very different situation, probably, than someone who is pregnant and maybe already has a number of chronic health conditions. And they are taking Tylenol to help with the pain related to several different chronic medical conditions, for which perhaps they're also taking other medications, or they're also seeking other—you know, there's—

Justin: Mm-hmm.

Sydnee: Or that have genetic factors involved with them. None of that was accounted for in this consensus statement.

Justin: Mm-hmm.

Sydnee: They were not trying to control for, why is the person taking the Tylenol? They didn't control for how much they took or how frequently they took it. They didn't control for siblings. If we've got siblings and the parent took more acetaminophen in one pregnancy than the other.

Justin: Mm-hmm.

Sydnee: Did we look at a difference there? They didn't control for any of that. They looked at all this data and said, "Eh, maybe there's something there." And so, follow up analysis of this was highly critical. There are a lot of problems in the way that this was, you know, addressed. And so, what do we do if we see evidence of something and we want to find out if it's true?

Well, we try to reproduce it, right? So, there was a study published in the Journal of the American Medical Association, JAMA, in April of 2024, analyzing two point four eight million children born between '95 and 2019 in Sweden. And this study looked at all these same things that they tried to do in that initial consensus statement.

But what they also did is control for things like genetic and environmental factors, like siblings, reasons for taking the medication. All those things that they should have done in the first, they reproduced and did it the right way in this 2024 study. And what they found at the end is that there really isn't any association.

Justin: Mm-hmm.

Sydnee: That they could find. So, it directly conflicted with this consensus statement. That is the best evidence we have at this moment, when you hear science communicators talking about why do the American College of Obstetrics and Gynecology, the ACOG, the AAP, all of the medical organization, every medical organization has come out against this recommendation from the President, from RFK Jr., from the FDA. Why is everybody coming out against it? It's because the best evidence we have is this study from 2024 that completely refutes this and says, at this point, we do not see this association. The study I referenced from last month—

Justin: Mm-hmm.

Sydnee: August of 2025, there was a... basically like a meta-analysis looking at a bunch of different studies that came out to, again, say, "Yes, no. We've looked at these forty-six studies, we've analyzed the data, and we think there is a relationship, a causal relationship." They don't—they don't say that, but that is what you can conclude if you—if you read it.

And the problem, again, they didn't—they didn't do any of the stuff that the Swedish study did. They didn't control for siblings, they didn't control for how much, they didn't—none of those things were characterized in the data. And then the senior author, Andrea Baccarelli, was a paid expert witness in a class action suit against paracetamol manufacturers in 2023. And eventually his testimony was tossed out, because it was scientifically unfounded.

Justin: Yeah.

Sydnee: So, the best—the best advice we have at this point is that we do not see an association between using acetaminophen during pregnancy and neurodevelopmental disorders down the road.

Justin: I was surprised when this came out, because I was surprised that they would attack such a large company as Johnson and Johnson, because that is a massive corporation. But when I was reading more about it, and I did not realize this, about two years ago, Johnson and Johnson spun off Kenvue, K-E-N-V-U-E, which is a—their consumer products division.

So like, stuff that you would think about like Johnson's Baby, the Benadryl, Tylenol, they spun off into this smaller company, which has a market cap of eighteen billion dollars. And Johnson and Johnson has a market cap of eighty billion dollars. And if you look at political contributions from the companies in 2024, Kenvue gave something like a quarter million, and Johnson and Johnson gave 8.2 million in 2024, and 7.4 million in 2023.

So, you're not—if you're gonna pick a target, right? They're not picking Johnson and Johnson the pharmaceutical manufacturer and the medical

device manufacturer. It's a multi-multi, you know... eight figure... no, sorry, eleven figure company. [laughs]

Sydnee: Yeah. Yeah.

Justin: Like, they're not gonna target Johnson and Johnson. They're going after this smaller fish. And the stock of this has been—was hammered on the 22nd. Johnson and Johnson weathered it fine. So, I will be interested to see. By the way, speaking of Kenvue, at least three lawmakers sold their Kenvue stock before this—the announcement, including Representative Scott Franklin, a Florida Republican whose committee work overlapped with his reported sale of Kenvue stock on June 16th. So, maybe a little profit there—able to scrape off the top. And that's the—that's the story there.

Sydnee: I think this is so harmful on multiple levels, the most obvious being we have no data that says it's true. So, at the current moment, it appears to be a false statement that has been made by RFK Jr., has been made by the President, has been supported by the FDA. [titters] We do not have any data of a causal link between acetaminophen use in pregnancy and autism spectrum disorder.

Justin: Yeah.

Sydnee: We just don't. We don't. The best evidence says there isn't one. Science is constantly evolving, but when we have an answer that says this probably isn't it, I don't know why we would make a public statement that it is.

Justin: [titters] Yeah.

Sydnee: That's false.

Justin: Yeah. Or like we should—or make a public statement like, fight like hell not to take it, like some people, including the President of the United States of America said.

Sydnee: Yes.

Justin: Sorry about my language, but I'm quoting the President? [chuckles]

Sydnee: It's the president, so it's fine, right? No, but that—

Justin: Well, that's—[laughs] listen. No, we cannot. That is not the standards of Sawbones.

Sydnee: I don't want you to say lots of things—

Justin: Yeah, right.

Sydnee: That the president said. But that—so, I think that that's the most obvious level that it's dangerous. It's dangerous because it's going to make pregnant people who need a safe over the counter pain relief option feel like there is none. Not treating a fever during pregnancy, there are known harms from that. There are reasons we recommend that if you develop a fever while pregnant, you do take acetaminophen to reduce your fever, because that can be harmful. So, obviously, there's direct harm if you avoid it.

There's the continued blaming on pregnant people of everything that ever goes wrong. If your—if your child is not whatever society deems perfect at that moment in time and history, it is probably your fault, pregnant person. It's probably your fault. It also steers us away from actually doing research on the best ways to understand and support people with neurodivergence.

Justin: It's worth noting, also, this is something that I always like to remind people, because I think they forget. Researching is... on pregnancy and safety is so hard. There is so little data, because no one wants to do it. No one wants to be the guinea pig who says, "Yeah, test me out. Let me see how it goes." So, like, we are—we have very little—we don't have enough information. We're at an information deficit. And so, to come out and undermine what science we have been able to do by just saying whatever hoes into your mind is doubly dangerous in this case.

Sydnee: Especially, you point out something really important, I think, a limitation of these studies that I haven't mentioned. How did they find out if the person used acetaminophen while they were pregnant?

Justin: Has to be retroactive, right?

Sydnee: They just asked them.

Justin: Yeah.

Sydnee: That's a terrible way to collect data, because your memory of exactly how much and when and how, what dose and why, that's a really hard thing to recall. And so, we're just—to ask for self-report is a terrible way to collect that data. I guarantee, if you come to somebody and say, "Hey, I noticed that you have a child with autism spectrum disorder," will you think back if you ever took acetaminophen during pregnancy? You're gonna—if you're being told there could be a connection, you're gonna be a little more likely to dig in and maybe find incidences of taking acetaminophen.

Justin: Also, ten months? I don't know what I put in my body over the course of ten months! Are you saying in the last ten months, was I at somebody's house and I said, "Do you have Advil?" And they were like, "No, but I have Tylenol," and I took it begrudgingly. Yeah, probably!

Sydnee: Well—

Justin: That happens to me all the time, I think!

Sydnee: I was sitting here, I—as I was doing this research, I kept thinking, I remember vividly taking Tylenol when I had that sinus infection with Coop. Because I was so sick, and so I remember the pain. Did I take Tylenol when I was pregnant with Charlie? *Probably*, but I don't—if you were to ask me how often or how many doses, I don't remember? I don't remember! So, how good could this data be that they collected? I mean, so I think all of that needs to be taken into consideration. But then the other piece of this is that the way that the President and RFK Jr. talk about this effort is that, "We're going to fix autism."

Justin: Yeah.

Sydnee: "We're going to cure it, we're going to end it." And I think we need to fundamentally call that into question. Why is that the perspective you have on individuals with autism spectrum disorder?

Justin: Well, I will say this. It is still marketed as a disorder. So, that's probably a place to start from, right? I mean, if you are calling something a disorder, the implication is it needs to be fixed. So maybe we're—the starting point should be a semantic one, right?

Sydnee: I think that's fair. I think it is important to recognize that some individuals with autism spectrum disorder are going to need, like I said, different educational pathways and specific supportive services, either as children or for their entire lives. And to make sure that we have a structure in place to identify those individuals and provide them with everything they need to live, long, happy, healthy, you know, fulfilling lives, just like someone who is neurotypical. And so, I do think it is useful to have tools, diagnostic tools, and... functionally, in this country, that means you have to have a diagnosis of something.

Justin: No, I know.

Sydnee: But I understand what you're saying.

Justin: It's just part of it, I think.

Sydnee: Do you feel personally that—I'm asking you this question. We haven't talked about this before, so I'm sorry if I'm putting you on the spot. Do you feel personally hurt by the use of the word disorder, as we talk about ASD? As someone who, while you've never formally been diagnosed, your doctor wife has told you many times that, probably, if you went in and had a... you know—

Justin: Who's got the time? You know. [titters]

Sydnee: If you went in and had a diagnostic evaluation performed, you probably would qualify as ASD.

Justin: Yeah, yeah, I don't know... No, I don't think... I think disorder is pretty loaded, obviously. But we use that for a lot of different stuff that I think that it—the dis maybe meaning outside the norm is not great. But I understand that there's no—there's not as much of a judgment put on it in the medical community, but I—so it doesn't bother me as much.

I think that it was... it is helpful, I think, to... understand better about how my brain works, and has been helpful in me... assessing that like maybe things that—like things that I always thought were like quirks or whatever, like just things that I could avoid to maybe make my brain work a little better. And things that I understand about my brain that make it work a little better.

But like, I don't think of it as something to fix or go away, because it is like... You know, I think about this a lot, about like... you know, my—I feel like a lot of the work that I do, like think about like a lot of My Brother, My Brother and Me, like, I didn't start talking about fast food every single week because I just think it's a great thing to get the word out about, y'all. Like, I... I've built structures around myself to work through my hyper fixations in public. [chuckles]

Like, I'm gonna go to the restaurants and try all the new stuff anyway, because I always have, you know what I mean? Like I'm gonna try every new beverage, because I always have. You know what I mean? Like, I'm gonna read all of the Disney news, because I do. And it just benefits my family that they also want to go to Disney, but like, this is just the way it works up there. It's just part of the structure of things.

Sydnee: Which, I don't—I mean, and in that, I have not heard a single argument that would make me think it needs to be cured or fixed, or...

Justin: I should hope not.

Sydnee: I know, I—

Justin: I need it, at this point, to function. [chuckles]

Sydnee: Well, and I think—I think that we talk—you know, the longer we've been together, it's been really helpful to talk about the way that we communicate, and how that difference does put us on different pages sometimes. Because I am—

Justin: It's been—it's been hugely beneficial for our relationship to not assume that we are starting from the same place every time, right?

Sydnee: Yeah.

Justin: And because I think that that has been really helpful for me too, to say, hey, this isn't necessarily how I feel. It is what I was feeling in the moment. And—you know what I mean? And that—being able to suss that out has been really helpful for us, to be able to say like, "Hey, I know I said that. And like, I definitely was feeling it then, but that's not where I'm at," I guess.

Sydnee: I also, I would make the case that you mask less now than you used to early in our relationship. And I don't know if that was—I don't know if that is a conscious choice, or if you are just feeling more comfortable being your whole self.

Justin: I use humor constantly to mask my inability to like grok some social cues. I use humor a lot. So, the humor will be out of left field, right? And it'll seem like kind of random or lateral, but that's just because I didn't understand the context. So, I think for me, I'm now more comfortable saying to you like—not masking that with a joke, and saying like I don't understand what you're trying to get across to me. And I think it's funny, because when I started doing that, I think you remember, I started doing it about a year and a half ago. Where it's just like, I can't do this anymore. It's exhausting. And I think people still laughed. Like, it took a while. You remember this? Like—

Sydnee: Yeah. I remember, yes.

Justin: I kept saying over and over again like, no, I'm...

Sydnee: Well, it took me a while to figure out that you were saying like literally, "I can't."

Justin: I can't tell the—I don't know. You have to just tell me, I don't know. [chuckles]

Sydnee: Which, you know, it's interesting. Because we joked about like, I feel like, somehow, like, you have become more autism spectrum disorder—you know, we've joked about this before. But it's not, it's that you are feeling more comfortable being exactly you.

Justin: Living my life out loud.

Sydnee: Well, and that—

Justin: And not—and not judging—

Sydnee: Think about that on a societal perception level.

Justin: And not feeling like crap about myself for how my brain works.

Sydnee: Exactly!

Justin: Like, for not—for not—you know... And I think being honest about that is probably the—what we need to get closer to with like a first step. Rather than curing, like talking more, I think would be really helpful.

Sydnee: And I would—I would think about this in yourselves, listeners, because this was a real awakening moment for me. I was having lunch with a friend who works at the autism services center, and she made the comment that, in the Venn diagram—she was joking about people she knew. And in the Venn diagram of ADHD and autism spectrum disorder and gifted, this is where people landed in the various parts of the Venn diagram. And I said, "I don't—gifted?" And she said, "Well, that's a neurodivergence. That's another form of neurodivergence." Which, I had never thought about that—as a—as a—and the reason I bring this up, I'm not—this is not me bragging. I was a kid who was put in gifted classes.

Justin: Mm-hmm.

Sydnee: From very early on.

Justin: Mm-hmm.

Sydnee: I was immediately shuffled into those classes. And I do... I've never thought that I have ASD, but I have thought as I've gotten older, I gravitate towards environments where I can constantly be doing multiple things at once. Because my brain works best when it has—I can focus more if I have lots of thoughts that I'm having to deal with at once. And so I do wonder if being shuffled in to gifted, adjacent to ADHD, if there were features of my brain that work that way. And I've never thought about myself that way. And I don't think that was the societal perception of ADHD for so many years, right? I think it got a very negative connotation for a long time. It's interesting!

Justin: Can I—can I just say, though, I think this... I get really dispirited a lot on Sawbones. And I actually don't find that one—this one that dispiriting. I think that it is so ludicrous, and the response to it has been laughter. I mean, everyone knows it's a joke. I have to feel like even people who are deeply in the paint for Trump, like some of those people have to know that this is ridiculous. They're laughing at it, right?

Sydnee: Yeah.

Justin: You know, there's people who are laughing. It's a joke. I think that it forces a conversation that we should probably be having more often. And I think that it is a good conversation to have. And it's probably a conversation that we should be having more publicly, so that we—so that we know how we feel about stuff. And that more people can say like, "Yeah, my brain works a little bit differently," and like, that's fine.

Sydnee: Yes.

Justin: It's fine, it's—yeah, I'm doing—

Sydnee: And the—and the time—

Justin: You know, if you—if you want to talk about people who need to be fixed, if your brain makes you act—if you care about how your brain acts towards other people, which is really, if society is going to care about something, it should be how your mental state impacts those around you, right? If you're going to treat me, that's what you should treat.

If I'm looking at people whose mental states make them act different ways to different people, the people I'm going to be focused on fixing are the people whose mental state causes them to think it's appropriate to grab people's vaginas without asking.

The people I'm not gonna fix are the people who care a lot about things too much and get fixated on things too much, and don't like concerts. You know what I mean? Like, let's focus on the real problems. It's the—it's the real evil people. [chuckles] Let's fix that mental—let's figure out what pill you need. What did your mom take that made you such an absolute D-bag? [chuckles]

Sydnee: And I think it's important that we be really vocal about that, because again, while the information is bad, it's not—we have no basis for it, it's not scientifically founded. So, it's bad advice being given by the government health agencies. Beyond that, it's dangerous to say to young people with autism spectrum disorder that we want to cure you and take away who you are, and prevent people like you from ever being born again. That's what that message is. It's an incredibly dangerous message.

And while I think the response like when I engage with people on TikTok and stuff about it has been, "This is ridiculous. I'm making a joke out of this. This is something to laugh at." And I think that that's fair and valid. I think it's important to remember that there are going to be young people who aren't feeling that way, who are hearing these messages and wondering, "Am I wrong? Am I broken?"

Justin: Okay, well, your podcasting hero, Justin McElroy, is here to tell you that out here on the frontier, we're all partners. [chuckles] We all have each other's back out here on the—on the frontier.

Sydnee: On that note, we got an email just yesterday, that I told you I wanted to address. Grady emailed and said, "Did the flu shot and the Covid shot make me autistic?" And wanted to know the answer to that question definitively. And I thought it was important, because Grady's mom said no. [chuckles] But Grady wanted to know from us, Justin.

Justin: Yes.

Sydnee: I will let you answer first, and then I'll just reaffirm.

Justin: Hm... I will answer you, Grady, with an anecdote. I... I was the way I was before I started getting my flu shot. And Grady, I am the first person in my family to get my flu shot, because I have mnemonic devices that help me remember when to take my flu shot. And that is thanks to whatever is cooking upstairs in the lab, in my brain. So, it has actually helped me to remember to get my flu shot. So, no. No worries there.

Sydnee: No. Vaccines do not cause autism. We have never had any evidence that that shows that link.

Justin: Nope. It's just made up, Grady. And it's stinky, but—

Sydnee: Your mom was right to encourage you to get your Covid and flu vaccines. [chuckles] Good job, mom.

Justin: Here's what I'm gonna tell you also, Grady. Sawbones was a show before the Trump administration, the first one, even! And Sawbones will continue to be a show after the Trump administration has ended. And our information will continue to be accurate. Except for one period where we weren't quite as freaked out about Covid as we should have been, very unfortunate. [chuckles] And listen, we worked—we worked to claw back.

Sydnee: No, so, and it is—

Justin: [laughs]

Sydnee: It is that time of year, get your flu—

Justin: Get your flu—

Sydnee: Vaccine!

Justin: Flu vaccine.

Sydnee: Get your Covid booster. If you can't—

Justin: And it's already pumping through Mr. McElroy. Dr. McElroy, how are things going over there?

Sydnee: I'm going to—I've been trying to find—

Justin: *Whoow!*

Sydnee: Time to take the kids at the same time. I wanted to—

Justin: Just, hey, listen—

Sydnee: Do it all at once. [titters]

Justin: Just roll into your local pharmacy, wherever. Whatever you need to do, just go get it. Thanks to The Taxpayers for the use of their song Medicines is the intro and outro of our program. Thanks to you for listening! That's going to do it for us, until next time. My name is Justin McElroy.

Sydnee: I'm Sydnee McElroy.

Justin: And as always, don't drill a hole in your head.

["Medicines" by The Taxpayers plays]

Maximum Fun.

A worker-owned network...

Of artists-owned shows...

Supported directly by you.