

Hello, ladies and gentlemen, and welcome to the first ever episode of Impact on You, a podcast where we talk about environmental issues here in Utah that directly have an impact on you. I'm Bauer Anderson, and joined with me is America Cox and Kaylee Gilbert. And today, we're talking about a pretty hard-to-ignore problem here in the state. And I don't even know if I'd call it a growing problem. It's more of a shrinking problem. That's because we're talking about the Great Salt Lake. Now, most people know the lake is shrinking. You've probably seen pictures online, or maybe you've even driven out there yourself and wondered, where's the rest of the lake? The shoreline didn't look the way you remembered it, and that's because it's not. Water levels have been dropping for years now because of things like drought, water usage, and just how much we rely on the rivers that feed into the lake. But here's the thing. That's where a lot of the people stop their conversations. They hear shrinking lake, and they hear, yeah, that's not great. But they don't really think about what happens after that. Because when the water goes away, it doesn't just leave empty space. It leaves the lake bed. And that lake bed has been sitting there for decades, collecting everything that flows into it. Things like pollution, heavy metals, runoff from agriculture industry, all of it. And now it's exposed. So when the winds pick up, and if you've lived in Utah for more than like five minutes, you know it does. The dust gets lifted into the air. Dust. And not just normal dust. We're talking about something a lot more serious. Something that people could end up breathing in without even realizing it. To better understand this, Kaylee sat down with Joe Robinson and Alta Fairbourn from the Utah Rivers Council, who have been studying the lake and have been working towards a solution for years now. I'm Kaylee Gilbert. Today, we're exploring the importance of the Great Salt Lake with Alta Fairbourn and Joe Roberts from the Utah Rivers Council. I wanted to understand why it's important to conserve the lake and what impacts the declining lake may have on the future. First of all, the Great Salt Lake is the largest remaining wetland ecosystem in the American West. And it's been designated a site of great hemispherical importance for 12 million migratory birds across the Western Hemisphere. Countries that are far off rely on what happens at the Great Salt Lake. And they're relying on Utah to steward this important ecosystem for their birds. They talked about some important species that are being especially impacted by the declining lake levels. The American White Pelican uses Gunnison Island as a nesting habitat. It's a small island in the north arm of the lake where the birds build their nests on the ground. It's a safe space to raise their young away from predators. But in 2023, the birds abandoned this island because of a land bridge made possible by the low lake levels. You know, evolution happens. Species can respond to huge environmental changes, but it takes time. And at the speed we are removing the Great Salt Lake, it is going to be a crash for populations that are already fairly beleaguered. Joe is referring to the Wilsons fowler ope specifically. It's a bird that is being considered to be put on the endangered species list. But it's not the only bird that's being impacted by low lake levels. Joe also says that several other bird species are following similar trends of decline. But birds aren't the only ones who are impacted by low lake levels. So if the Great Salt Lake dries up, its lake bed becomes exposed and it contains heavy metals, arsenic, PFAs, and those easily become airborne, especially in hot spots. And so if inhaled, it can cause a range of health impacts. Clearly, a declining lake is not ideal for the ecology in the area or the communities surrounding the lake. So is it an easy fix? I asked how climate change could potentially be impacting the declining lake levels. Climate change accounts for around 8 to 11 percent of the reason why the Great Salt Lake is declining. So while I don't want to underestimate the impacts of climate change, climate change is a serious, serious issue that needs to be taken seriously. It's not the largest driver of why the Great Salt Lake is declining. But the main way that climate change is impacting the Great Salt Lake is dwindling our snowpacks. As our snowpack lines rise up the mountain, the less water we are seeing in runoff going into our lakes. And that is what's impacting the Great Salt Lake. We found that it is possible to send the Great Salt Lake enough water if we just got serious about it. You look at other places like Las Vegas, who was, you

know, suffering a water crisis as well. And the legislature said, look, we're going to define what non-functional turf is, and then we are going to get rid of it completely. Non-functional turf isn't necessarily the grass in your backyard or the soccer fields that your kids go play on. Instead, it's the driveway strips right outside your house or unnecessary grass in medians between car lanes. It just means that the grass that we're not using doesn't have to be taking up water. This is an example of legislation Utah could be using to bring water back to the lake. Alta and Joe expressed frustration towards legislators. They think that more extreme legislation needs to be implemented to rise to the crisis. Because declining lake water doesn't just affect ecosystem and human health, it also affects the economy. I like to think of, like, the water system as kind of like a circulatory system, where we need the Great Salt Lake to get the snowpack we do. And if the Great Salt Lake shrinks, we're going to keep getting less water. And so, like, shrinking the Great Salt Lake and using this water irresponsibly, we end up in this cycle of diminishing returns where every year it starts to get a little bit worse. And if we have a crisis, like a real bad snow year, like we're probably seeing right now, it puts us in a range where we have disastrous impacts that might not be able to come back from. Recent research shows in the next 50 years, it could cost \$35 billion for Utah. And that's not even taking into account the cost of rising health care costs for families exposed to dust, the secondary costs of ecological collapse, the collapse of our ski and tourism industry, the collapse of the \$1.3 billion economy at the Great Salt Lake for mineral extraction and brine shrimp extraction. There's no solution to the Great Salt Lake collapse other than delivering water to it. The Great Salt Lake isn't the only saline lake experiencing this kind of problem. Joe points to Owens Lake and Mona Lake as examples we can learn from. Owens Lake collapsed. That is now a billion-dollar venture from L.A. to mitigate dust there. Mona Lake didn't collapse, but they were both kind of initially having their tributaries diverted for Los Angeles. Joe says that Mona Lake was saved because of a coalition lawsuit. The Utah Rivers Council is a coalition that is suing in a similar way to Mona Lake. But this isn't the only action that can save the Great Salt Lake. Joe and Alta agree that the responsibility lies on everyone. So often, talking to people, I hear, well, we just need to get farmers on board. Or we just need to get people in the cities on board. Or we just need to get the statehouse to give a shit. But I think that the answer is all of that. And we can't just wait for, like Alta said, like everybody's passing the buck. Like it's not just legislators passing it around. It's like all of us passing it off to the people we can't see. And I think we all need to take it seriously and find out what we can do and do it. People need to know that you're super powerful. Like you are a unique individual, but you're also simultaneously a part of the collective. And there's nothing you can do to escape responsibility for being an agent in history and being a part of this collective. Every single thing that you do matters in public and in private life. We have so much power. And just a little bit of courage actually can be really, really inspiring to people. One thing that stood out is that while people talk a lot about climate change, it's actually only responsible for about 8-11% of the lake's decline. A lot of this comes down to how we're using the water. Things like upstream usage, irrigation, and just how much of that water actually never makes it back to the lake. America takes us a little closer to what this looks like for the environment and wildlife with her story. The Great Salt Lake is an established and central part of the ecosystem. The lake's drying is an ecological detriment, but it also presents a problem for the people in the area as it contributes to poor air quality. Carmen Valdez speaks to the issue of the Great Salt Lake as a senior policy associate for Heal Utah, the Healthy Environment Alliance of Utah. They focus on air quality issues, protecting communities from air pollution, building an adjusted equitable energy future, and protecting communities from radioactive and toxic threats. So as we know, the Great Salt Lake is declining. We have reached critical a few times and it keeps fluctuating. The problem, as we know, is the playa or the lake bed of the lake itself contains a lot of minerals and a lot of different chemical compositions because it is a terminal lake, so anything that falls in the Great Salt Lake Basin ends up in this lake. As the water recedes, those materials can become airborne when

disturbed by dust or by wind events, by human events, by animal events, which is then picked up in the atmosphere and carried into our communities. We already know there is research about arsenic being in the playa, and that will just, as the lake recedes, that will increase the amount of playa exposed, which will increase the amount of dust to be picked up by wind events and carried into our communities. The need for legislative support is not only acknowledged at the local level, but President Trump received applause for speaking on saving the Great Salt Lake. He came in to see me today. These are the kind of things, he said, Sir, we have to save the Great Salt Lake. I said, explain this to me, please. And in that city called Salt Lake City, we're losing water rapidly, rapidly, and it's getting smaller, smaller, drier, drier. And you tell those people, we're going to work on it really hard, we're going to save it. We're not going to let that go. That is what I call an environmental, a real environmental problem. But saving the Great Salt Lake, that's what we're going to be doing, okay? Despite support to save the lake on the national stage, it is not a simple fix. Raymond Ward, the House Representative of Utah's District 19, elaborates on the problem. He is the chief sponsor of HB 247 that will begin to reallocate funds towards saving the lake starting in the summer of 2026. Yet, obstacles remain in the way because people want their water. And that water comes from upstream diversions that would naturally flow into the Great Salt Lake. Each one of us still wants our shower to turn on and wants our lawn to not be dead. And even if a few of us care enough to say, well, I'm only taking a very short shower and I'm going to place all my lawn with cement, just one person at a time trying to do that still isn't enough to make a change overall. So we have to make some overall changes, but people have legal rights in our law to the water that they use. So we have to respect those. We can't just say, well, I'm going to take those away. That isn't the right way to go about it. And when it passed, it wouldn't have support. So this begs the question, what are we left with if legislation doesn't pass enough bills fast enough to actually restore the lake? Governor Spencer Cox's HB 250 already demonstrates millions of dollars for the cause, but the lake will take billions of dollars and intentional effort to fix. To understand the importance for fighting for the lake for economic, environmental, and community support, I sat down with Adelaide Scott. She is a youth activist working with the Sierra Club and UES, also known as the Utah Youth Environmental Solutions. It's fascinating because I think a lot of people don't understand the global implications of it. I mean, not only is it affecting these birds, but we do supply about a quarter of the world's brine shrimp industry. And I don't think people really understand that brine shrimp, you know, they're not just like all cute little sea monkeys. They're not just those things that you buy for like students in class to look at what's in the lake. They are quite literally a cornerstone of the aquaculture ecosystem. That's what we're feeding our fish. And so I wouldn't really want to see the aquaculture industry collapse, but that's what we could be looking at if we lose brine shrimp in the Grigsell Lake. Scott is not only fighting for the economy, but for the environment. As a bird bander, she has witnessed increased cases of bird botulism as the bird populations are forced into closer proximity with the lake shrinking. In order to save the lake, we need to act now before it's too late. Anything under 4198 feet is considered not ecologically viable. So 4198 is like the minimum threshold for a healthy lake. It's not viable below that. And once those microbialites and microbial mats are exposed in particular, that's when you're really going to reach collapse because that's where brine shrimp are laying their eggs, brine flies are laying their eggs. And so if those don't hatch, that's the cornerstone that the entire ecosystem is built on. You're not going to have any resources for these birds. And the Grigsell Lake is such a critical stopping point because it is the largest terminal lake in the Western Hemisphere. And so it obviously is going to have the most resources for those birds. And so when all of them, over 10 million of them, are flying through here per year and there's suddenly a collapse of the ecosystem, the question is where are they going to go and how are they going to be able to continue their journey southward? To save the birds, the brine shrimp, and the entire ecosystem at stake, her solution mirrors that of Valdez. We need to make sure that industries are held

accountable for polluting industries, and then we need to save the Great Salt Lake. But we are seeing at least some commitments to working on the lake, and I think that we can try to hold our leaders accountable to those promises. So getting them to promise those things in the first place is the first step, and now our job is to hold them accountable. I guess something that's been bothering me lately is we've seen a lot of private money being pledged to the cause, and what I've been telling people, it's been like my slogan lately, is like private initiatives are no response to a public crisis. Scott noted in particular that the money dedicated to the lake through Governor Cox's recent HB 250 came from private fund donations. These donations are extremely helpful to the cause, but the lack of public funding and accountability leaves a sense of unease. There is a continued sense of urgency to press forward with environmental activism. Scott makes sure to leave us with an encouraging message to take action. UAS, in particular, has a free education series to help spread the knowledge and opportunity for activism. By eliminating the cost barrier to make sure that activism is not a privilege, but an inclusive effort, everyone truly has the chance to make this difference for the Great Salt Lake, no matter their skill set or background. I'd encourage you to use social media, not just to post, but to look out for opportunities to really get involved and to go to rallies, because there's always people tabling with ways you can get involved and, you know, just really find a way to use your unique skill set to work on the cause. I've never been super good at, like, I mean, I don't know, like, there's so many ways I've been involved. Like, UES, we make art and stuff, and I have a lot of friends who maybe aren't the most science-y people, but they're just incredible artists, and they've gotten to contribute a lot of really meaningful art and visuals to the movement. Or, like, I have friends who are photographers, and they can come and do that and really, you know, work on media. I'm a really good writer, and I'm really into biology, and I've gotten to use that, both in bird banding and in education. And so I think everyone has something they can bring to the table with activism, and I think that we should all seek out those opportunities and, you know, really get involved with the same passion that we have for talking about these things. Change does not happen overnight, either in legislation or environmental restoration. After hearing all of that, it kind of puts things into perspective, because this isn't just one issue, it's a lot of things happening at once. And it's easy to think of it as something distant, something that's happening out there, away from us, but it's not. This is something that's already here, and it's already starting to affect the way people live. And when it comes to fixing it, there's really one main solution. We have to get more water back into the lake. This could mean things like cutting unnecessary water use, even something as simple as just reducing non-functional grass, like medians and roadside strips. But this all comes down to something bigger. Accountability. From lawmakers, industries, and from all of us. Because one thing that kept coming up is that people tend to pass the responsibility off. To farmers, to cities, to the government. But in reality, it's all of those things at once. And every single decision adds up. So yeah, the Great Salt Lake is shrinking. But the impact? It's getting bigger. It's affecting the environment. It's affecting the economy. And it's affecting the people. Right now. And that's exactly what this podcast is about. Taking these issues, breaking them down, and actually understanding how they impact you. So with that being said, I'm Bauer Anderson. This has been Impact On You. Thank you for listening. And we'll see you in the next episode. Thank you. Thank you. Thank you.