PLEASE NOTE: This transcript has been auto-generated and has not been fully proofed by ISEOF. If you have any questions please reach out to us at info@thegreatsimplification.com.

[00:00:00] **Samantha Power:** There's no need to wait for further collapse. There's no need to wait for someone to come and give you permission. Bioregionalism and bioregioning is available to all of us right now. You can do it in the place where you live. It's about a different way of seeing and being in that place and reclaiming our agency, but also responsibility to be good citizens.

[00:00:27] **Nate Hagens:** It is reality round table time again. Uh, today I'm excited to be joined by Isabel Carlisle, Daniel Christian Wall, and Samantha Power. Each of them are deeply involved in what is known as the bioregioning movement. And in this conversation, we discuss the introductory foundations to bioregioning and why it's relevant to the future human lives under the broader arc of the Great Simplification.

[00:00:55] Isabel Carlyle is the founder and director of the Bioregional Learning Center in Devon, UK, which offers a climate resilience learning journey for the bioregion there with aims towards creating systemic change. change for the area. Daniel Christian Wall, who is a former guest on this program is also one of the catalysts of the rising regeneration movement, as well as author of the book Designing Regenerative Cultures.

[OO:O1:23] Finally, Samantha Power is a co founder and the director of the BioFi Project, as well as the founder of Finance for Gaia. She's also the co author of the book, Bioregional financing facilities, reimagining finance to regenerate our planet. Other than Daniel's first episode here, prior to this recording, I knew next to nothing on bioregioning, uh, but I felt it's important to explore this as a central theme of the podcast.

[OO:O1:53] But this conversation, uh, taught me, uh, at an embodied level, the importance of bioregioning and the practice of, of people working in their bioregion, leading to believe that this is really a center node, uh, of what's ahead, bringing human societies back in balance, uh, with nature. Lastly, if you are enjoying this podcast, I invite you to subscribe to our Substack newsletter where you can read more of the system science underpinning the human predicament,

where my team and I post special announcements related to The Great Simplification, and in 2025, there will be much more written content knocking on wood.

[OO:O2:33] uh, with plastic veneer. Uh, you can find the link to subscribe in the show description. With that, please welcome Isabel Carlisle, Daniel Christian Wall, and Samantha Power on bioregioning. Good morning, Daniel, Isabel, and Samantha. Actually afternoon for Daniel and Isabel. How are you today?

[00:02:54] Yeah, we're good.

[00:02:55] Uh, maybe each of you could just briefly introduce yourself, uh, 30 seconds, name, where you live, what you do.

[00:03:01] **Daniel Christian Wahl:** My name is Daniel Wahl. I live on the island of Mallorca where I moved 13 years ago because it's a perfect case study for bioregional development. And I've been working with, um, trying to fit the human species back into a planet with a biosphere through design and, um, the shift towards regenerative cultures.

[00:03:23] returning to our original pattern for the last 20 years.

[OO:O3:28] **Isabel Carlisle:** So I'm sitting in South Devon in England. Um, it's the bulgy bit, which is next to Cornwall. And I've been living here for, I guess, about 14 years now, and came across the whole narrative of bioregions and the kind of concept of bioregions. I suppose back in about 2008, um, I was sent a paper by Donella Meadows, which you might talk about later on, which kind of lays out this concept for a bioregional learning center, and that's been inspiring us here ever since.

[00:03:56] Nate Hagens: Samantha Power, welcome.

[OO:O3:58] **Samantha Power:** Thank you, Nate. Really happy to be here with you and these amazing friends. Um, I am a regenerative economist, a bioregionalist, and a futurist. And, um, A few months ago, about six months ago, I launched a nonprofit called the Biophyte Project that I am one of the co founders and one of the stewards of that is working to build a new layer in the global financial

architecture of financial institutions that are service to the bioregional movement that we call bioregional financing facilities.

[00:04:36] And that's what my colleagues and I are up to these days.

[00:04:40] **Nate Hagens:** Excellent. So I've asked you all here, uh, to talk about bioregionalism or bioregioning. And the only time, um, that I've discussed this, uh, in our 150 odd episodes was when Daniel Voll was, uh, briefly mentioned it on his first appearance here. Um, I've heard this term a lot.

[00:05:00] Uh, but I don't, I'm not really clear on it. Um, so I thought we would do kind of an introduction to bioregioning. What is it? Why is it important? Why is it relevant to the listeners? And why is it relevant to our future? So who can kick me off on what is bioregioning? And maybe what is the history of the movement and the practice?

[00:05:25] Isabel Carlisle: So, um, bioregioning is something that are humans and early pre humans, homonyms, have done really since the beginning of time. And it means living in a place, understanding that you're part of the natural systems of the place, and in a sense working with those natural systems. So we might get onto this later as well, but for instance, Neanderthal people knew where their their food came from, where their herbs were, where their water was, where their stones were, and what kind of trees were growing what.

[OO:O5:55] So they were kind of, they were thinking in systems, basically, and they were thinking as part of the natural world. And while the bioregional movement went through what I would call a slightly romantic phase back in the 1960s and 1970s on the northwest Pacific coast, um, um, I would say that this latest iteration of biregions and biregioning, which is the verb, like how do you do it, really is kind of getting to grips with existing power structures, with politics, with economics, with, uh, climate change with all the kind of challenges and ills that we're facing.

[OO:O6:33] And some people see it as a response to the polycrisis because it embraces everything, because it covers ecologies and economies and human health and the health of our biosphere as well.

[OO:O6:45] **Nate Hagens:** Well, I have a historical speculative question based on what you just said. So I don't know how much you know about my work, about the fact that humanity has outsourced our wisdom to the broader financial system.

[OO:O6:58] And, and we've become this globally interconnected economic superorganism that just blindly eats energy and ecosystems. But let's just speculate that that didn't exist. And, and there wasn't this global economic system. Um, would. Uh, uh, pro social, benevolent, alien, philosopher, visiting earth. Find humans naturally organized by bioregions, um, without all the fossil input and all the things that we've done.

[00:07:31] Is that like the natural default state of how we would self organize?

[00:07:36] **Isabel Carlisle:** Yes, well you only have to look, I mean, obviously I know more about the United Kingdom than anywhere else in the world, because I'm a native of here, but you only have to look at all the native accents that existed a hundred years ago in Scotland and Wales and Ireland and England to understand that our living was very regional, and yes it was bi regional, because uh, What we produced in each place, the kind of food we ate, the kind of trading we did was entirely located within our bioregion.

[OO:O8:O7] So we haven't actually already described what a bioregion is, but it's a coherent, um, geographical entity. It's a landscape. It's not politically defined. It has, um, coherent geology and, uh, landform type and, uh, fauna and flora and rainfall and human history in the terms of economic history and social history and political history.

[OO:O8:31] So there's a coherent story that runs through all these different layers. When we are thinking about the kind of islands of coherence or lighthouses that we need in order to kind of move our species forward at this present moment, bioregions give us that kind of cultural grounding, if you like, in what was historically true and what we need for the future.

[00:08:57] **Daniel Christian Wahl:** I alluded to this earlier when I mentioned, um, something that my mentor David Orr said 20 years ago, um, that to fit, how to fit a species arrogant enough to call itself Homo sapiens onto a planet with a biosphere is a design challenge, and he said we needed a form of ecological design to refit it.

And this homo economicus that you just described, um, that is a briefly running a pattern that seems almost cancerous to the living system, um, back into the biosphere.

[00:09:35] And that is by remembering that our core pattern as a species has been to be bioregionally regenerative for the long journey of evolution. And that the pattern of falling out of that has only been, um, somewhere between five and 10, 000 years. And so, I would go as far as saying bioregioning is our species evolutionary survival pattern.

[OO:10:01] None of us would be here if we hadn't been regenerative expressions of place, or to scientifically speaking, a keystone species that has worked to create the ecosystems, co create the ecosystems within each dwelt, meaning that there are places around the world and there's evidence coming up. hard and fast, that whether North America, South America and Europe and Africa, the forests that we call pristine rainforests are not forests that have not been touched by humans.

[OO:10:36] They have been gardened by humans to be as abundant as they are now. The wonderful research of Dr. Lila June, um, Architects of Abundance, details that for North America in quite a lot of detail. So. Basically, your conjecture is absolutely right. Bioregioning is essential to refitting humanity back into a planet with a biosphere, into the regenerative patterns that sustain life on this planet.

[OO:11:O7] **Nate Hagens:** I could do the thought experiment in the other direction too, that Well, after the carbon pulse, hundreds of years from now, thousands of years from now, those humans living are descendants, however many there will be, will almost by definition be living bioregionally. Yes, absolutely. Trick question, Daniel.

[00:11:29] If and when we colonize Mars, would people there be living bioregionally?

[OO:11:37] **Isabel Carlisle:** I can respond to that if that sounds good with you, Daniel. So, bioregionalism for me is a way of organizing ourselves, um, governing ourselves, telling stories about ourselves that is rooted in living systems, patterns, and principles. [OO:11:58] And Because life on Earth did not evolve on Mars, I think it would be very difficult for us to live bioregionally there. So it would be missing the living

[00:12:08] Nate Hagens: part.

[OO:12:O9] **Isabel Carlisle:** Yes, yes. Well, the Earth is a part of our body, right? Like, humans are an extension of the Earth. We were born out of the web of life on Earth, and bioregionalism is about Coming back into a deeper recognition of that truth and living in harmony in reciprocity with all of the plants and animals and insects and water and rocks in the places where we live and that we are tasked with humans on this planet as stewarding.

[00:12:40] And um, if you, you know, take us and put us on Mars, it's not going to work quite the same way in my opinion.

[OO:12:47] **Nate Hagens:** So that's, again, that's, uh, one of the juxtapositions of, of technology and, and putting things in buckets as opposed to ecology and, and systems, how important is, um, indigenous cultures and ways of living contribute to the work in, in bioregionally, uh, bioregioning and bioregionalism?

[OO:13:O9] Isabel Carlisle: Um, yeah, I'm happy to take that one. So certainly indigenous wisdom, indigenous ways of seeing and being and governing are some of the best information we have about how to live by regionally, how to live in a way that's rooted in living systems, patterns, and principles. And that is, you know, why you see such a resurgence in interest in these indigenous ways of relating to the natural world, but also to structuring economies and governance systems in this moment, because we see that they have been holding these intelligences that so much of modernity has forgotten.

[OO:13:56] **Nate Hagens:** Is it fair to say that indigenous cultures, uh, extant today have been living, um, bio, a bioregioning way? It's just that their regions have been shrinking from external forces.

[00:14:11] **Isabel Carlisle:** So bioregioning, which we haven't really talked about yet, But it's a practice of relationality, and indigenous people live in relation to place.

[OO:14:19] You know, it's a two way exchange between place and people, and in many ways that's what bioregioning is trying to get back to, that kind of two way exchange, but also this sense of belonging to place, having an identity that's rooted in place, that we've lost so much of that.

[00:14:35] **Nate Hagens:** Here's a A dumb question. Um, and since, uh, at least Samantha and Daniel are friends of mine, I, I feel entitled to ask dumb questions.

[OO:14:44] Um, does one have to understand bioregioning in order to live in a bioregional way? Um, or do you just be a human and, and follow our natural instincts and live a certain way? I mean, how do you, how do you parse all that?

[OO:14:59] **Isabel Carlisle:** I've had Indigenous colleagues say bioregioning is just a word that the white folks came up with for what we're already doing, how we're already living.

[OO:15:07] And likewise, loggers in the Sierras, there are so many people out there that are bioregioning and, and they are not yet steeped in the philosophy, nor do they need to be around, um, this, this return to that way of life because they've never lost it.

[00:15:23] **Daniel Christian Wahl:** I think it's so important to understand that both when we talk about regenerative cultures and when we talk about bioregioning, they're not some kind of new fringe proposition that we now need to maybe consider making, taking mainstream and supporting.

[OO:15:41] Um, they are life's pattern. They are going on whether we want it or not, because that's how life organizes, and every act of caring, sharing, nurturing, protecting, loving, that people have with life. community and place that binds them into the living fabric that they emerged from is bioregioning and is regenerative culture.

[OO:16:O5] So we, it's, it's much more a fanning of the embers of what is there behind the story that separates us from nature. And that's where the link to indigenous cultures, it actually doesn't really serve to separate humanity between indigenous and non indigenous. We need to all come back home to place. We need to all come back into that living fabric.

[00:16:26] And then we will all be indigenous again. We are born into life as life. We are

[OO:16:31] **Nate Hagens:** life. So how do you define a bioregion, um, both like its definition and, uh, in terms of the actual place? Like I live on the border of, uh, Wisconsin and Minnesota. I've never really thought of what, what is the bioregion here?

[00:16:47] **Isabel Carlisle:** So here in South Devon, we've defined ourselves by water.

[OO:16:51] So bioregions are defined by geology and geography, but it's really a felt sense. This is not a scientific process, I have to say, defining your bioregion. It's very much a felt sense of, do you feel at home? Because people who live in South Devon know instantly when they're crossing into Cornwall or they're moving over Dartmoor into North Devon, it's a You know you're not in your home place any longer, and your home place can be very big, it can be Cascadia, which is huge, or it can be smaller, like South Devon, which you can cross in any direction in a car in about two hours.

[OO:17:28] **Nate Hagens:** Are there concentric circles of what might be defined as Like, cause I know the 20 minute bike ride from my house that has a real intense recognition. And then there's the three hour drive is like central upper Midwest has a feel. And I mean, where do you, where do you draw the boundary? Is there strong form, semi strong form, weak form, bioregional, uh, boundaries, or how do you guys think about that?

[OO:17:55] **Daniel Christian Wahl:** I found it really helpful to, in a conversation with Tyson Young Caporta about the natural bioregional boundaries in Australia between the different tribes, that when we talk about boundaries, we must first call into place that indigenous way of understanding boundary. He said, a boundary is a place of kin making, not kin breaking.

[OO:18:17] It's about relationship making. It allows you to say, this is where we are, and there's a beyond, but in order to then connect and interweave and be dynamically interlinked with that beyond, not, um, that's the border and we're going to build a big wall and not let you in. Um, so, so, it's really important to understand that, um, when we engage with bioregioning, there is, are these two terrains that we're engaging with.

[OO:18:45] One, as Peter Berg says, is the biogeophysical terrain, the topography, the, the river system, the, the soil series, um, the fauna and the flora, what makes that ecosystem distinct. But then the other is the terrain of consciousness. And that's what you were speaking to, Nate, that, that sense of, um, yes, the 20 minute bike ride, but then there's this other crossing that bridge, going through that tunnel, um, going over that ridge where you kind of go, okay, I'm out of the shire to, to speak in English terms.

[OO:19:18] **Isabel Carlisle:** And if I could just quickly add, we at the BioPhi project like to talk about drawing bioregional boundaries in terms of hard lines, soft lines, and human lines, so geological lines, ecological lines, and cultural lines, and all of those are important in mapping a bioregion, and certainly life is organized fractally, and bioregions are as well, so some of the bioregions that we work with are working in a very small watershed, But they are seeing themselves nested in a larger watershed.

[OO:19:49] They're seeing themselves nested in Salmon Nation, a bioregion that spans the Pacific coast and encompasses everywhere where there are salmon along that coast. And so the working fractally and seeing these different layers and designing economics and, and governance that is informed by those various fractals is an important part of bioregioning, I believe.

[OO:20:16] **Nate Hagens:** So back when we were, um, the O. G. hominid, um, in Tanzania on the plains of, uh, um, you know, by the Olduvai Gorge, it was just one re one bioregion. And then we expanded around the world, um, And how much of bioregioning the, the, both the geographic boundaries and the conscious feeling, uh, boundaries runs up against population constraints where, no, that's, that's my new bioregion.

[00:20:49] Like how much of a bioregion is kind of implied by its own carrying capacity.

[00:20:58] **Isabel Carlisle:** Well, I would say the caring capacity is not fixed, right? The rest of these places evolved as humans moved into them and stewarded them

and, um, brought more life there and in many cases. And so, you know, At a longer geological time scale, these carrying capacities moved with how well the humans were stewarding those places.

[OO:21:23] And, um, the regenerative potential of life tells us that we can change the carrying capacity of places, um, today, um, even in, in very short periods of time. Yeah.

[00:21:36] **Nate Hagens:** Oh, I just had an insight. Um. What is it? The existence of hydrocarbons moved our bioregions underground in a way. So it messed up the whole calculus of the actual ecological real time flows.

[00:21:54] Daniel. Well,

[00:21:54] **Daniel Christian Wahl**: we could also say that there was a bifurcation where we could have had the choice as we became more to either do what our it. Ancestors have done, which is how do we make this The caring capacity of this particular land higher by terracing, by caring, by foresting, by building more complex forms of agriculture, so complex that when Cook arrived in Australia, he said, the heathens don't practice agriculture, nor the system was just so It evolved over 40, 000 years that this heathen couldn't see it.

[OO:22:33] Um, so, so, um, it's, it's, uh, we had this choice of either going into the power with each other and with nature and build more productive ecosystems or go the power over city, state, nation, state, annex other countries, and, um, basically run another path. So we,

[OO:22:55] **Nate Hagens:** we. took the wrong path. But it wasn't we, it was some faction of we that then, because of that, amassed power and metabolism and military and all the things.

[00:23:08] **Daniel Christian Wahl:** And if you take that back to the species pattern, in biological ecological evolutionary terms, five to ten thousand years is about as long as a maladaptive pattern of a species is tolerated by by the evolutionary system. And then the kickback starts, and that's exactly what our maladaptive pattern, which is industrial civilization, Elon Musk's wet dream, um, is.

[OO:23:33] The whole idea of Mars and going, going off planet is the perversion of that power over story. And it's, we're going to turn into the locusts of the known universe and end up burning this planet while we try to find the next one to burn. Um, so, so it's literally as deep as that, that we're, we're coming back to our species survival pattern.

[00:24:00] Isabel Carlisle: So you could say the hinge point for this was between the Paleolithic and the Neolithic. I mean, the kind of change from hunter gatherer to agriculture definitely put us onto a different track. So it depends on how far you want to go back in time to say we made the wrong decision, but we have been making decisions of which we were not aware of the consequences for many centuries, if not millennia.

[00:24:25] So to kind of lay blame in any one particular spot is quite hard to do, I think.

[00:24:32] **Nate Hagens:** But in hunter gatherer times, would, was there a recognition that, oh, this is not my bioregion, this is someone else's?

[00:24:40] **Isabel Carlisle:** Well, if you go back to, uh, Neanderthal times, which is what I know most about because I was an archaeologist, um, so the site that I excavated in Jersey, which was a site for, um, butchering big game, like woolly mammoth, was inhabited by, um, You say inhabited or used.

[OO:24:58] There weren't actually any dwellings there, but it was used over 250, 000 years. That's an extraordinarily long time, and the people who were using that site went south when the ice came south, and they went back north when the ice came back north, um, when the ice retreated. I, so they, um, They were working with, um, Geosystems.

[OO:25:19] We talk about geosystems and earth systems. So what we're seeing at the moment is the kind of destabilization of many of our earth systems like the, um, Atlantic Meridian, overturning circulation, AKA, the Gulfstream or the melting of the ice caps or whatever it might be. Those are our earth systems and.

[00:25:41] In those very early days, humans were consciously or, you know, otherwise, they were de facto living with their Earth systems. And they were moving

with their Earth systems. Of course, we can't do that any longer. It's much harder for us to kind of shift our location and to simply kind of move around our planet.

[00:26:00] So were they traveling from bioregion to bioregion? Yes, because they would have had to know how does the game function in this region? Where is the water in this region? We're going to be traveling You know, thousands of miles to get back to this particular spot. And we want to know what life is going to be like along the way and how we're going to adapt to it.

[OO:26:18] So for me, this keeps on coming back to adaptation. How adaptable are we both for our good and for ill?

[00:26:26] **Nate Hagens:** I'm going to just take a 30 second side tangent because I had forgotten you were an archeologist. What's the coolest thing you ever found in your field studies?

[00:26:36] Isabel Carlisle: Well, I did find a woolly mammoth tusk.

[00:26:38] Wow.

[00:26:39] **Nate Hagens:** That would be cool. That would be cool. Because it brings you emotionally back to when that thing was alive just for a brief moment.

[00:26:47] Isabel Carlisle: It really does. Yeah.

[OO:26:48] **Nate Hagens:** Yeah. Awesome. So, um, how can bioregioning, which we've been discussing, um, be used to address some of the issues that we discuss on this, this podcast, um, the ecological, social and economic challenges that humanity faces?

[00:27:05] **Isabel Carlisle:** So what we are pursuing here in South Devon is this experiment in bioregioning. So bioregioning is a term that relates for me back to the commons and commoning. So commons is only kept alive by the people who are commoning, in other words, taking care of the commons, and bioregions only you know, come alive because of people that are functioning in a bioregional way.

[00:27:34] **Nate Hagens:** Can we even have bioregioning unless we have a commons? Is a commons a necessary precursor?

[00:27:41] **Isabel Carlisle:** Oh, that's okay. That's a very good discussion, which I think we should get into in a few minutes time.

[00:27:46] Nate Hagens: Okay. Sorry. Sorry.

[00:27:48] **Isabel Carlisle:** Lots of good questions here. So what are we doing in terms of bioregion here? So. So there are many gateways into a bioregion.

[00:27:55] You can come at it through green manufacturing or you can come at it through regenerative agriculture or you can come at it through democratic processes which relate to, um, Eleanor Ostrom's work on governing the commons. So yes, you could say the commons come back in here, but you kind of like, how do we reimagine what it means to be a citizen?

[OO:28:15] because unless we are all given that possibility of reclaiming our agency and taking responsibility for how we live in our places and share decision making and a awarded resources to be able to do this, I don't think we are going to be able to make it through.

[00:28:33] **Nate Hagens:** So in, in many ways, bioregioning is, is the antidote to the economic superorganism, which has sucked our agency, uh, away.

[OO:28:41] Um, or at least we perceive it as, uh, Daniel, how, how would you answer the question on how bioregioning, uh, can solve some of our, our meta crisis issues? And then Samantha.

[OO:28:51] **Daniel Christian Wahl**: Well, it's, it's actually interesting to think of the meta potential. of coming home to place, rather than lose ourselves in the meta crisis of yet again trying to find solutions to a problem at global scale.

[00:29:09] That's what we failed at for 50 years, for 60 years, and we still have international conferences that try to solve problems by making them ever more abstract, and then responding to these abstract problem definitions, and then

rolling it out or scaling it up, by bringing it back into the local. The bioregioning proposition is the exact opposite.

[OO:29:29] It is saying, what if all the facets of what we now call world problematic or the polycrisis show up in my bioregion, but they show up with a name and a face, they show up with a specific ecosystem, they show up with a specific history and timeline and everything. And suddenly, by becoming specific, and detailed, and nuanced, and full of warm data, as Nora would, Nora Bateson would call it, suddenly they become alive, and what is perceived as a problem, is actually potential.

[OO:30:04] That is the living potential of life coming through us and expressing ourselves as bioregional custodians again. In the context of the polycrisis, where the cart house is already falling, I mean, George Soros recently said that the collapse has started, um, and he's got a little bit of a, um, eye on that system that he made so much money off, eh?

[OO:30:28] Um, bioregioning is also our community. resilience building strategy. It is the only way that our species might get through the eye of the needle of the coming decades of cascading collapses that we now can no longer avoid. Um, if we use our time wisely and build. The resilience infrastructures at local and bioregional scales allow us to adapt in uncertain times.

[00:30:59] We might just use our time a lot better than starting another third world war in a chase for resources. And it's literally a species level rite of passage that we have to decide on. So I'm not kidding about it. This bioregional thing is not a proposition. It's a pathway through the eye of the needle, if we're lucky.

[00:31:24] Most likely not for all of us.

[00:31:27] **Isabel Carlisle**: I have spent the past 10 years of my life thinking about how to shift this economic superorganism and change where money is flowing so that it supports life and the well being of people and moves away from this monoculture, extractive, destructive economy that is sucking up the earth and turning it into money.

[OO:31:52] And, um, as you and I talked about last time we were hanging out, I spent many years trying to do this from the top down and saw the limits of, of logic and research to change the minds or, or change the actions of the people that have Power in the superorganism. And eventually I came to bioregionalism and, um, it was a real desire to get closer to what was real and move out of this world of abstraction that brought me to bioregionalism.

[00:32:30] And, um, certainly the most urgent work in the world right now, I believe, is the stewardship and regeneration of our lands and waters and a culture that is truly regenerative and is connected to life. And bioregionalism invites us all back into that, to being, as Isabel and Daniel have said, good citizens of the places where we live.

[00:32:54] And particularly in this moment in the country that you and I live in, Nate, there's a real hopelessness around what can be accomplished at the nation state level. And I see this, you know, both as something we should grieve. Absolutely. The recent election in the United States is going to create incredible suffering in our country, but it's also an opportunity.

[OO:33:22] To think about, um, how we create governance structures and economic structures that are aligned with more agency, as Isabel said, and responsibility and sovereignty and well being and with the flows of life. And, you know, before the United States existed, there was a tapestry of Native nations across this country.

[OO:33:48] And I feel like now is the moment where we can recreate nature states and we can rebuild Native nations in a much more place based, decentralized, ecologically informed way.

[00:34:02] **Daniel Christian Wahl:** I just want to add a little beautiful bit of history I only learned last week, that in 1879,

[OO:34:13] John Wesley Powell, who later became the director of the U. S. Geological Survey or whatever it was called, suggested that all of America should be organized by watershed boundaries. And there's even a map of the entire United States organized as watersheds. That was a real missed opportunity, and maybe since you're now stuck with a government that is wanting to change everything fundamentally.

[OO:34:43] Coming back to more nuanced, place rooted administrative boundaries that actually root people back into the biogeophysical reality of the bioregions they live in, the watersheds they live in, might be an opportunity.

[00:35:02] **Nate Hagens:** Okay, so this gets into some, some thorny, uh, questions and ideas with a lot of the things that we discuss in this podcast.

[OO:35:11] There's different timelines. There's the triage, um, the transition period, and then the longer term. I am convinced that the longer term we're going to, by definition, have to live bioregionally. Um, you know, whatever human evolution, uh, civilizations exist, but to, uh, building on what you said, Samantha, um, to change the boundaries and have nature states and, and different, uh, different boundaries while there is a functioning country, the United 50 States of America is the concept of bioregioning a threat.

[OO:35:51] to a centralized power structure, I think kind of not because it's such a small thing, but if it were to grow and, and become an actual movement with millions of adherents, what, what do you think about that? Is there a, is there can, or let me frame it a different way. Can bioregioning and bioregionalism coexist within national governments as they exist today, or is there a conflict?

[OO:36:18] **Isabel Carlisle:** I'll give you an answer that is my favorite permaculture principle. It depends, and it depends who you're talking to within those governments and within those systems and what what their worldview is, Nate, right, and what their objectives are. And there is more and more conversation really just over the past six months or so emerging around bioregionalism within the United Nations.

[OO:36:46] An entity that is driven by historically nation states and the folks in that organization are seeing the limits of what can be done within the nation state paradigm to achieve these very basic Beautiful, very ambitious goals for large scale ecological regeneration, averting the worst impacts of the climate crisis, um, you know, protecting 30 percent of the Earth's lands and waters that they've laid out.

[OO:37:15] And, um, just to, to give an example within the United States, the Biden administration, of course, oversaw this very exciting inflation reduction act, which is

supposed to flow massive resources. To communities to implement climate adaptation and mitigation strategies, and if communities aren't organized and able to apply for those funds, receive those funds and govern those funds, then that money isn't doing any good.

[00:37:42] So even at the multilateral level, the UN level, the World Bank level, The NA nation state level, um, and the subnational level. I, I've been talking to the California Governor's office about bio regioning in, in California. There is a recognition that to avert the, the ecological crisis and to get us back on track to, you know, restoring our watersheds and, and living in harmony in our places.

[OO:38:11] This work will have to be decentralized, so there is some interest in flowing public resources from nation states, from multilateral entities, from subnational governments, to bioregional organizing teams that are doing the very difficult work of bringing together people in their landscapes, in their watersheds, to decide what are the most important projects we should be investing in here, and how do we work together to implement those regenerative activities.

[00:38:40] **Nate Hagens:** Could you briefly follow that up with a couple, three brief examples of what such projects might look like? Like what define a couple?

[00:38:49] **Isabel Carlisle:** Sure. So the biofib project is working with around 15 different bioregional organizing teams across North America, Central America, and South America. And these vary in scale going back to our conversation earlier about how you map a bioregion and what the boundaries are.

[OO:39:08] are, um, but one of those teams, I'll give a local example, is based in West Sonoma County, so not far from where I live in the Bay Area. And, um, they are starting very small with a town, um, that has been, um, kind of neglected for a while. There's a lot of empty buildings in this town. There was a blighted lot and they invested in creating a town square.

[OO:39:34] And in the center of the town square. There is a museum for the future, which is essentially a shipping container where people are going and sharing their ideas for the future of that town and the whole watershed that's surrounding that town. And what ecological and cultural regeneration in that place would look like?

[OO:39:52] What types of gatherings they'd like to have? What types of indoor common spaces they'd like to have? How would the salmon be brought back to that creek? Um, so that's one example. Another example is our mutual friend Atosa Saltani and her colleagues at the Amazon Sacred Headwaters Alliance have a huge bioregional plan for regenerating this massive area that is the headwaters of the Amazon River, and they've been working with

[00:40:29] And that organizing work is incredibly valuable for any entity that cares about the protection of the Amazon. And so we're working with them to figure out what are the capital sources that we can tap into to fund that stewardship and regeneration, including multilateral or bilateral donors that are interested in that.

[OO:40:53] I wanted to chime in and say that, uh, bioregional practice. I think has a very important role to play in depoliticizing what we're seeing happening right now. So it depoliticizes climate change, it depoliticizes, um, the injustices of inequity, it depoliticizes all sorts of things, because it brings us back to a level of, um, practice and connecting, and this is very much a practice, it's not a theory, which kind of gets underneath all these kind of, um, dualistic ways of kind of, you know, right or wrong, left or right, whatever.

[OO:41:28] but it kind of takes us into a different space. I think that's incredibly important. And I also see the capacity of bioregions and bioregioning to, um, step in where governments can't function in a joined up way. So, so much, I mean, just to take The UK is an example. So you've got sort of central government at Westminster responsible for things like um, defense and you then you have county councils which cover fairly big regions that are responsible for, for education and for transport.

[00:42:03] And then you get our regional authorities are responsible for the roads, and they're responsible for waste collection. Then you get our parish councils, but they're all working in silos. None of them are thinking in a joined up way. And we need to start thinking in a joined up way, having joined up strategies.

[00:42:18] **Nate Hagens:** So, so in a way, bioregioning, the verb, the activity is, is post partisan.

[00:42:26] **Isabel Carlisle**: Yes. Yes, that's a good way of talking about it. Absolutely.

[00:42:30] **Daniel Christian Wahl**: With regard to the European situation and, um, is it a challenge to the political superstructure? Uh, the European constitution enshrines the political ideal of subsidiarity, um, as, the concept of how we want to be governed in Europe.

[OO:42:48] The reality of Brussels and most nation states within Europe is different, but, um, in theory, national governments and the European government are subsidiary to, in support of, the local and regional decision making, um, processes of people in place where they're affected by the decisions that they're making.

[00:43:10] And so, um, it is actually, in many ways, an opportunity to, uh, to implement what has already been professed, that we do need to, uh, devolve governance in such a way that people have more say over how the money is spent. Participatory budgeting and all those kind of things, um, are being, um, experimented with.

[OO:43:31] And just to give you a few more, um, examples like, um, in Holland for the last 12 years, an organization has set up called CommonLand that, um, primarily focuses on ecosystems restoration, but it does so in a regionally bound way with a theory of informed social engagement strategy of building first multi stakeholder network in a particular region of landowners, and then it starts working with them on transforming over 25 years landscape scale ecosystems.

[00:44:08] And they've been working in a number of places for over a decade now. There's a place in southern Spain, near Murcia, where a million hectares have been pulled together into a regional transformation project. A million hectares that otherwise would have desertified and where people were fleeing villages.

[00:44:27] And so, um, in many cases, bioregioning is a response that enables the public private partnerships at the local level that Solve the problems that government at national level has not been able to solve. Um, so it's not a challenge. It's, it's a support strategy for them as we turn into failed states.

[00:44:50] **Nate Hagens:** Could you define or alter the definition of bioregioning as just applying permaculture principles to the scale, uh, of watersheds and, and regional ecosystems?

[00:45:03] Isabel Carlisle: I just spent 10 days in a permaculture course up in West Sonoma County last month, Nate, where I was asking this exact question, um, and I was particularly looking at permaculture principles and rainwater harvesting principles and Friedhoff Capra's living systems principles and how they inform the the design of financial institutions and economies that are aligned with bioregionalism and supporting the transition to bioregional regenerative economies.

[00:45:30] So, um, in that case of designing a bounded financial institution or an economic transition strategy, yes, I believe they can be applied, but I'll let Daniel answer on the overall bioregionalism.

[00:45:45] **Daniel Christian Wahl:** I just would frame it slightly differently because in many ways permaculture is a. Is a western abstraction of indigenous, um, land management and relating patterns that are ancient and do respond to our species core pattern of re regeneratively, bio regioning.

[OO:46:O5] So, so, so in, in many ways it would make sense that, um, if they did a good job in codifying this in into a language that we understand, it would also help us. in applying bioregioning, um, at, at a regional scale. But I guess what I,

[OO:46:21] **Nate Hagens:** my insight was instead of me and my neighbor, you know, each doing some permaculture principles that were borrowed from indigenous wisdom, we're all part of a watershed.

[OO:46:31] And there's a logic that makes sense for the synergy of 10, 000 people in this area doing similar things because of the soil and the wind and the seasons and the bluffs and the, and all that.

[00:46:44] **Isabel Carlisle:** One thing I would like to add, Nate, I gave a very positive answer to your question about, you know, these entities need bioregional organizing teams to achieve their goals and objectives and, and, um, carry out their mandates and avert these risks that are quite existential to their survival.

[00:47:05] But at the same time, it is explicitly one of our objectives in building these bioregional economies to build power in grassroots and indigenous communities. And that can be very threatening to the existing paradigm. And something that I've been talking to our friends at the Civilization Research Institute about is how we build.

[OO:47:28] And I think that's a protective membrane around these emerging, very, very nascent bioregional economies that allows them to build something that is rooted in living systems principles within the broader monoculture capitalist economy that wants to squash them.

[OO:47:47] **Nate Hagens:** About half of what I know about bioregioning, I've learned in the last 45 minutes, so I'm really, uh, just a student of it, but when I think of bioregionalism, in my mind, I think of watersheds and ecology and systems, but what I'm hearing from you all, especially you, Samantha, is bioregioning is really a merger of ecology and watersheds with some sort of a governance, a decentralized governance apparatus.

[OO:48:18] It's not just ecology. There's got to be some governance thing embedded in there. Yes?

[00:48:23] Isabel Carlisle: There has to be power.

[00:48:25] **Daniel Christian Wahl:** I mean, just again, to as we're doing a bioregioning 101, it serves to bring in people like Peter Kropotkin, um, and Patrick Geddes. Um, there have been other 100 years ago, 120, 30 years ago, propositions in Western culture in Russia and also in Scotland that, um, we need to organize at the regional scale.

[OO:48:50] And so, um, this, there's always been a social and a political, um, and an economic dimension to this movement. It's not entirely a sort of only ecological movement. It's, it's where all of that comes together, um, at a scale that actually makes sense for, for human settlements. Except,

[OO:49:16] **Nate Hagens:** if people are, I mean, apologies to the listeners in Southwest Arizona, um, if people understand and agree that bioregioning is the future, it implies, uh, that some places like Cascadia are wonderful destinations.

[OO:49:33] And they've got a lot of, you know, watersheds and rain and others like Phoenix, Arizona are way out of line with their carrying capacity. So the discussion in Washington state and Arizona would be quite different with current population levels. Yes.

[00:49:50] **Daniel Christian Wahl:** There is a worldview dimension to all of this. And that's also coming back to your question about indigeneity.

[OO:49:58] The one thing that we had all in common at that time. bifurcation point of carrying capacity and too many people, is if you believe that you are part of life and that life is skin and that what you do to the tree of life you ultimately do to yourself. That puts you into a checks and balances when it comes to invading on your neighbor's bioregion.

[00:50:22] You begin to understand that you cannot become the locust of the known universe. Um, and that's what it, of course, we had conflicts in the past too, and human history is full of them, but within A worldview of kin centricity, of understanding that life is kin and that we cannot, so on the branch that we're sitting on, um, the competition within the human species is regulated by the overall living system having to be maintained.

[00:50:56] And that, that's where I think we lost a lot of the, the, the, the north when we, um, called cultures primitive that we're actually. giving us the core survival patterns of how to live in right relationship with a living planet and with each other.

[00:51:14] **Isabel Carlisle:** So this kind of brings us to the question of how do you actually do this?

[OO:51:18] How do we get back into right relationship with the land? How do we imagine bioregional governance? What would a bioregional economy look like, etc., etc.? There's no doubt in my mind that, um, and this may be contentious or may not be, that climate change and the, um, imperative for climate adaptation, gives us this opportunity to start to think into what it would look like to organize ourselves bioregionally.

[OO:51:43] Because there's no doubt also that organizing, human organizing, functions very well at the scale of a bioregion. And interestingly, when we ran a series of seven bioregional conversations back in the spring and summer, the guests that we invited to come and join the conversation from South America immediately identified that their political organizing was happening at the scale of the bi region and that's how they related to their bi region.

[00:52:10] So how do we actually kind of do this thing? So what we are experimenting here with here in South Devon is working with our regional council. We're not setting up anything that's going to kind of take over from it in any particular way, but we are saying we need an entity that sits outside the council that is not aligned with party politics, that is able to make decisions and is resourced to make decisions about the kind of projects and things in the bioregion that need investing in, and we do this in a way which is strategic, so we look at how an investment here in the community, um, energy generation projects are related to the water quality over here, which is related to farming, which relates to other things like transport or livelihoods, so we're looking all the time at the whole picture.

[OO:53:01] **Nate Hagens:** I actually think, um, that is a wonderful idea because we know that the politics of our current meta crisis fueled, um, you know, national and global governments make these things difficult for others in power to, you integrate the concepts we're talking about. But if there was like a shadow council, uh, in each watershed that didn't have political authority, but they had, they would convene and do scenario planning and look at the decisions and investments needed in that bioregion, uh, and then report to the actual official council once a quarter or something like that.

[00:53:40] I mean, what's preventing something like that happening everywhere right now?

[00:53:44] **Isabel Carlisle:** Yeah, absolutely, and that course relates to exactly what Samantha's doing, because you need to have that financed, and it needs to have finance coming from multiple, um, directions, so that it maintains its independence, but it shouldn't be reliant on government funding, or philanthropic funding, or government funding.

[00:54:02] Just community funding. It needs to have a kind of, um, a whole menu, if you like, of different kinds of funding coming into it.

[00:54:09] **Nate Hagens:** So is, is bioregioning, um, a philanthropic, uh, government funded out of necessity or can it be its own, can it be a for profit, uh, pursuit?

[00:54:24] **Isabel Carlisle:** I think it could be for profit, but Samantha, this is your department.

[00:54:29] I see Daniel raising his hand, though. Daniel, do you want to

[00:54:32] **Nate Hagens:** go first? I mean, to some extent, what we're talking about Well, how do you define profit? Is it regenerative for the future, or is it profit for the economic system, I guess, is a sub question. If we

[00:54:43] **Daniel Christian Wahl:** Again, I have the audacity of saying neither regenerative cultures nor bioregional regeneration nor regenerative economics is anything new and that in every place and in every bioregion, there are mothers and sons and daughters and fathers caring for children and for elderly, and in ways that are not part of the current economic system.

[00:55:07] That is the living, caring, bioregionally active, regenerative economy that is already in place. And, um, in re regionalizing our patterns of production and consumption, creating economic opportunities at the regional scale, at that watershed scale, to meet the human, basic human needs within the region from regeneratively grown resources in the region.

[OO:55:35] We make the economic activity of the local economy and regional economy a driver of ecosystems restoration, of healing our ecosystems and our watersheds. And that's really the massive opportunity here, is that it, in a, in a way, time of increasingly volatile global economic systems and supply line disruptions, we are building a scale linked and place routed economy again.

[OO:56:O4] **Nate Hagens:** Isn't another word for bioregioning, um, Reality. I mean, it just seems like this is just another shift in our perception. Like the listeners and watchers of this program, they could, after this episode is over, walk outside and

declare that they themselves are bioregionalist and just shift the perception that they live their lives, start to do things more locally in the direction of the things the three of you have been discussing.

[OO:56:33] **Isabel Carlisle:** Absolutely. And in a recent piece I published, a kind of call to action after the election, I said exactly this. There's no need to wait for further collapse. There's no need to wait for someone to come and give you permission. Bio regionalism and bio regioning is available to all of us right now, and you don't have to move.

[OO:56:55] You know, for those Americans that are like, we need to get out of this country. You don't need to move to Costa Rica or New Zealand to do this. You can do it in the place where you live. It's about a different way of seeing and being in that place and reclaiming our agency, but also responsibility to be good citizens.

[OO:57:16] So many of us. I think all we have to do to be good citizens is like vote every other year and maybe volunteer a couple times a year. It takes a lot of work to be a steward of your place and to be invested in regenerating culture there that is aligned with supporting life. And so there's a responsibility component here that I think it's important to emphasize.

[OO:57:41] **Nate Hagens:** So, so what would it mean, um, for each of you? to define that you see in the next decade, that bioregioning is succeeding, that it's becoming a successful movement. What are some of the guideposts that we might pass on route to, to this occurring at a much faster and larger scale than we're seeing today?

[00:58:03] **Isabel Carlisle:** Well, I think we definitely see more regenerative farming or farming moving towards thinking about how to take care of the soil and take care of the water. I think we'd see a lot more acceptance that being a citizen actually means some devolution of power and decision making from existing government structures down to more grassroots level.

[OO:58:26] Ideally, we'd see some kind of, um, citizen research or knowledge network, citizens being able to share data and information about the, um, the changes that they're seeing or the changes they want to make. Um, we would definitely see more funding coming into the bi region to be able to make these systemic changes and this real ability to, to think in a joined up way, to really understand how our ecosystems and our human systems.

[OO:58:56] interconnect, and also how we, how we kind of deal with this very dynamic situation we're in with earth systems on the move.

[00:59:06] **Nate Hagens:** Uh, Samantha, Daniel, I'd like you each to, to weigh in on that same question. What, what sort of guideposts might you hope for if this all succeeds?

[00:59:14] **Isabel Carlisle:** Sure. And, um, to come back to your earlier question, Nate, about, um, the, the finance and economics of bioregionalism, I'll, I'll answer, um, in that space.

[OO:59:27] Um, yeah, I think we would see the emergence of these. place based, regenerative, resilient, bioregional economies that are more connected to the geologies, ecologies, and cultures of the places that they live, indeed to the carrying capacities of those places. And to the regenerative potential of those places, and they will be tapping in to that regenerative potential.

[00:59:54] And so to answer your question about capital and what is the right type of capital to invest in bioregional economies, it's, it's all of them. It can take in all of them, but we need to expand our lens with which we're looking at risks and returns and take a more holistic view to viewing those two things.

[01:00:16] And, um, the way I would see this economy kind of manifesting in, in a felt sense is through healthier food, healthier water, healthier people. people, healthier animals, and more of a sense of belonging and connection to place and, um, a different also theory of value. Right now, our theories of value are so instructed by the global capitalist system.

[01:00:46] And we're, you know, often thinking in terms of quantification and dollar terms about our time, about, um, you know, How much wealth we have about, um, the options available to us and through moving into a more bioregional economy, we can start to see value as relational and flowing in relational webs. And that's, you know, between people, between bioregions, between organizations, but also between humans and the more than human life and the places where they live.

[01:01:22] **Nate Hagens:** Would it be a truism in your estimation that those areas in the world that adopt a bioregioning attitude and practice will be more resilient to the chaos and bumps that we know are coming?

[01:01:39] **Isabel Carlisle:** Absolutely. Yeah, I think the current economic system and the dominant nation state governance system is incredibly brittle.

[O1:O1:48] And, um, you know, as Buckminster Fuller says, you don't change things by fighting the existing reality, you build something new that makes the existing model obsolete. I think building bioregional governance entities, building bioregional financing facilities and bioregional economies. These will all be more resilient.

[01:02:05] And as the old system is, is brittle and is up against increasing impacts of the meta crisis over time, it will become less relevant. And these bioregional governing entities and economies will be the places where resources and energy flows.

[01:02:24] **Daniel Christian Wahl:** I think as, as we move into. a time of increasing disruption through climate change and environmental disaster through supply line problems because of war and geopolitical issues.

[01:02:39] There will be a natural relocalization especially the food supply chain. And just that, starting with food, connecting regional consumers to regional producers again, and valuing the activity of agriculture when it's done well, as agroforestry and other regenerative agriculture techniques, to actually heal the local ecosystem.

[O1:O3:O4] So, um, Um, because that then becomes a more holistic approach to the environmental issues like floods and, um, disasters. Um, you need proper forest management in order to avoid wildfires. So rather than seeing preventing wildfire, uh, fires and agriculture as two different stories, you begin to, at the bioregional scale, develop plans which are about landscape management and, um, landscape custodianship.

[01:03:30] And this is already happening, for example, in Catalonia, um, The voluntary credit market in the offsetting conversation has a new model to it, which

is not based on carbon, but on hectare, and it includes not just carbon fixation, but includes water retention in the landscape and all sorts of social flows and economic benefits.

[O1:O3:55] And so it's becoming a more holistic credit that. companies can invest in an order to support regenerative activity in their bioregion. And I think we're going to see many more of these kind of models where local businesses and even local governments can invest in maintaining the health and beauty of the region they depend on through these mechanisms.

[01:04:18] **Nate Hagens:** If people are following and agree with the general direction of this conversation and the importance, uh, ultimately and sooner rather than later of, of more humans, uh, bioregioning, what are some things that viewers, uh, and all of us should be asking of our governments now? towards these ends, our governments, our, our local, our state or regional, or maybe even national governments.

[O1:O4:45] Although I see kind of a little bit of a conflict of interest there, but what are, what are some things that, that smaller scale governments should be doing now?

[01:04:56] **Isabel Carlisle:** Well, I certainly think they should be thinking about devolution. Um, I think that's an inevitability. I think we will need devolution.

[01:05:03] Nate Hagens: How do you define devolution?

[01:05:05] **Isabel Carlisle:** Well, I'm speaking in the UK, which is the most centralized state in Europe. Uh, In Germany, they're more fortunate. They have the lender, and they kind of have much more responsibility and resource at what we would call county level. But we think that in order to be more resilient, we need to be able to give more decision making power.

[O1:O5:27] Kind of bring it down a level, as it were, bring it down at least to the county level or the land level. And we also would like to see more resource coming down. As well as, you know, political devolution is to come with some kind of budget attached to it. And just the kind of, uh, conversations we're having at the moment, we're having conversations with people who work in planning.

[01:05:51] We would like to see planning become bi regional. Because at the moment there's so much development going on, which is taking absolutely no account at all of the capacity of our rivers to support more people. Whether to give them more drinking water or to take in more sewage and just kind of dispose of the sewage down the river.

[01:06:10] So we need to be able to think more, um, comprehensively, more holistically, more strategically. But to just empower the, the people who want to change the planning system, the people who want to see governance devolved, the people who are thinking about citizenship, they need to be shown some kind of leadership and to be say, you know, to hear that it's, uh, it's something that can be, um, to be worked on and taken forward.

[O1:O6:36] Yeah, certainly it's easiest, I would say, at the local level because municipalities and, you know, sewage authorities and, um, town boards of supervisors share so many objectives with those of bioregional organizing teams and, um, this is already happening in, in many places I, I know, particularly across the United States.

[01:07:01] Um, At the, the subnational level, I think there is an increasing interest in planning bioregionally, um, so would, would echo Isabel there, um, to, to work together on landscape scale, watershed scale planning, uh, particularly I know in the Pacific Northwest as dams are coming down, There's a lot of regenerative potential associated with freeing the rivers again.

[01:07:30] And so, um, together with, with native, um, nations, with folks organizing bioregionally, states can invest in, in creating a regenerative bioeconomy in those places where the watershed is being restored. At the national level, I, um. As a former, um, World Bank nature finance specialist, I have to say, um, there needs to be a reform of subsidies that are ecologically harmful, and, um, I published a paper in 2022 that lays out what ministries of finance can do to align subsidies with supporting biosphere, rather than destroying the biosphere, but there are hundreds of billions of dollars annually for, um, from public budgets flowing into ecologically destructive subsidies.

[01:08:22] And that is one of the most urgent things we can do. It's very difficult to build a regenerative bioeconomy when you have that type of capital flowing into

destructive activities. Um, and at the multilateral level, I think there's potential for The United Nations and the multilateral development banks to think about how to invest in global public goods that the health of the entire earth depends on, like the Amazon and how we can pull public resources from countries around the world to invest in those bioregions.

[01:09:02] **Daniel Christian Wahl:** I think it would really help to understand that, um, we cannot tackle the climate change issues through the carbon lens and that The minute we shift from this carbon myopic approach that allows for another casino to be set up to just make money as the Titanic sinks to a more holistic approach, which is a watershed and hydrological cycle based approach, if we see it.

[01:09:34] Understand that healing local hydrological cycles and slowing down the water in the landscape is vital to re greening the planet and bringing back the forests that we cut down over the last 5, 000 years. There's half the amount of forests on the planet that there were 5, 000 years ago. And 20th century, many wars were fought over oil.

[01:09:58] increasingly towards the end over water. Most of the wars of the 21st century will be fought over water. If we don't fundamentally bring ourselves back into right relationship with that element, and that can only happen at the watershed and regional scale, then We just set ourselves up for more war and more strife.

[O1:10:19] So the way to deal with carrying capacity issues is not to invest into some kind of nanobot drone that will just exterminate entire populations. genetic profiles, as some people are working on, um, but to actually increase the capacity of watersheds to hold life, all of life, and in that process, ourselves.

[O1:10:45] Um, so we need, we need to fundamentally shift policy towards healing our watersheds, healing our soils, healing our forests, and in doing so, these are not ecological issues, these are sensible strategies to solve social and economic problems.

[01:11:02] **Isabel Carlisle:** One additional provocation I'll add is that if governments decided that they wanted to urgently invest in regenerative land and watershed stewardship projects across their country, they could tell the central bank to buy up

a bunch of bioregional bonds that were created by bioregional financing facilities that are funding organized portfolios of projects at the landscape and watershed scale.

[01:11:29] **Nate Hagens:** Instead of buying Carnival Cruise Line bonds, as an example. Exactly.

[O1:11:35] **Daniel Christian Wahl:** I, I do feel, feel that there's one thing that I would really love to also, um, ask Samantha about, because in the last three, four months, um, working and paying attention to some of the projects in the common land portfolio and all these other, um, initiatives that are working on landscape scale, ecosystems restoration, and bioregional regeneration.

[O1:11:59] Um, I'm a bit. concerned that in this blended finance idea that we're talking about, that this, okay, very often it's initially philanthropic money that gets the initiatives going, that builds the network and builds the, the movement, so to speak. Um, but are we not best advised to be extremely careful for one of the potential catastrophic caveats of building, um, bioregional finance institutions, which is how much do we let the chasing delta attitude come into the bioregion?

[O1:12:37] How much do we promise patient or long term capital return on a financial return on financial investment? Because the minute you still offer that offer, Opportunity to pull out the financial return. If you don't properly protect the local biomaterial resources and local healthy ecosystem from that extraction, you've actually in building the infrastructure for bioregional finance created the backdoor for the finance industry to still be extractive.

[01:13:12] two bioregions.

[O1:13:13] **Nate Hagens:** So you're, you're saying that there has to be the payoff from a current, uh, monetary surplus sloshing around the world has to be, uh, in a reverse King Midas sort of way, um, transmuted into ecological regenerative products that are not dollars and they have to be kept locally and regionally.

[O1:13:34] **Daniel Christian Wahl:** Yeah, it's not, it's not financial return on financial investment. It's health return. It's social return. It's ecological return. It's survival return,

[01:13:43] **Nate Hagens:** narrow boundary capital into wide boundary returns. Yes. Yeah. I like that.

[01:13:48] **Isabel Carlisle:** Neat. Maybe, uh, maybe you and I can, can go deep on this on another podcast, but, um, Daniel, my, my quick answer is.

[O1:13:56] This is the work of our time, right? How do we take this wealth, this financial wealth that has been violently extracted from places around the world and compost it so that it can support the regeneration of life in those places? And, you know, who are, are the people? people that play that bridge building role between the capital and this decentralized web of regenerative projects and what are the principles that can allow us to do that in a clear way that is in right relationship with those places that we are trying to bring those financial resources to.

[O1:14:35] And I'll just mention a few attributes of bioregional financing facilities that we've laid out to help us avoid this trap that you're mentioning. One is that they should raise capital from purpose aligned funders and investors. I've been a part of, or seen, too many projects where, uh, you know, the People that have a vision for a fund, it's, it's very beautiful.

[O1:14:59] And then they go to raise for the fund and they say, well, if we want to raise capital, we have to have these returns. We have to have this risk profile. We have to have these structures. And then before you know it, you're perpetuating. The old systems and the old power structures that are at the root of the polycrisis.

[O1:15:19] And so, you know, as a bioregional financing facility, if you start out with this mandate and you're engaging in conversations with potential funders and investors from a more equal place where you're not getting. Giving them power over you and your community and your financial institution, but you're you're building a relationship based on trust and reciprocity and that funder coming into relationship with the place where you live and the people that are stewarding it and over time trusting that they know how that capital should be invested.

[O1:15:53] And it might not be generating financial returns, at least initially. So we use the Common Land for Returns framework, which starts with inspiration returns at the top of the waterfall is first and foremost. You have to inspire people to

action. From there flows ecological returns, and then social returns, and then economic and financial returns.

[O1:16:15] So we recommend a holistic view of how risk and return are assessed. From the beginning of setting up the investment portfolio, developing the term sheets, building relationships with potential funders and investors, and then another one of the attributes of bioregional financing facilities is that growth and returns are a means, but not an end.

[O1:16:36] So, a means to achieving the long term bioregional regeneration strategy of that place, um, but you, you don't start with, you know, this is our target financial return.

[O1:16:50] **Daniel Christian Wahl:** We've mentioned common land a number of times and what's powerful about the common land approach is that because they've now been active in some of the landscapes over 10 years, they can now make the real time argument to show that Investing half a million a year for a landscape into the social process, the bringing people together, the return of inspiration will then lead to ecological and social returns shortly after, and with a time delay of six to eight years, the diverse financial returns economic returns for the local economy start to happen.

[O1:17:31] So the new cooperatives are being built, new employment is being created, new products are going to market, new value is being created out of the bioproductivity of the landscape, and that is is giving us a proof of concept that this type of investment makes a lot of sense, but it's really difficult up until this point, it was so difficult to get any funders to say, to throw half a million a year over ten years to do it.

[O1:18:OO] Um, a regional, um, um, um, um, project. And the other thing that he also kind of created a breach for all of us with is that he always spoke of 25 years plus time scale of landscape scale transformation by regional transformation starts 25 years plus any type of financing that isn't interested to be involved for that kind of longer journey, He said no to.

[O1:18:27] He had the guts to say no to funders that wanted to just work for a year or two. And in creating that line, he's really created a breach for this movement. So I have

[O1:18:39] **Nate Hagens:** two questions to close this with. I'd like each of you to, um, answer this for listeners who are convinced that the future is, um, zigging and zagging, but inevitably headed towards a bioregional sort of existence.

[O1:18:58] What are some necessary baby steps that individual humans listening to this show can start immediately and get headed in that direction? Um, Danny, I'll start with you.

[01:19:10] **Daniel Christian Wahl:** Earlier on, when you talked about is it inevitable, I felt like, um, bringing this up, and this is my answer. It's a poet, a poem by Gary Snyder, and it's called For the Children.

[O1:19:22] The rising hills, the slopes of statistics lie before us, the steep climb of everything going up, up, as we all go down. In the next century, or the one beyond that, they say our valleys, pastures, we can meet there in peace, if we make it. The climb, to climb these coming crests.

[01:19:42] One word to you, to you and your children. Stay together, learn the flowers, go light.

[01:19:49] **Nate Hagens:** Thank you for reading a poem by Gary Snyder, who I also wanted to have on this, uh, this roundtable. Um, Isabel.

[01:19:56] **Isabel Carlisle:** I'm going to give a very different answer. I was asked this question by somebody who lives, um, in the south of England.

[01:20:02] How do I get started? What are my first steps? And I said, well, I think that, um, one way to go in is through climate adaptation, because that's an imperative. And just find out what your local council is doing. Have they got a strategic plan? And it's, uh, almost likely that they don't. But we need to come in from the perspective of saying, there are many, many things that we can do in order to join up all the different parts of, um, our bioregion, all the different initiatives in our bioregion, and if we can kind of, Go in with an offer to an organization, an entity that has some decision making power in our bioregion and start to work through that.

[01:20:46] I think that's a very good first step.

[01:20:48] So there is a table at the end of my book, Bioregional Financing Facilities, Reimagining Finance. to regenerate our planet that is a call to action for many different types of actors and lays out specific actions that each of them can take. So I would encourage your, your listeners to check that out.

[O1:21:O8] Um, they can also join if they're interested in bioregional finance and bioregional economics, the biofi community of course. practice, a community of more than 400 people and growing on a pro social social media platform called Hilo. And on that platform, there's a map function. So you can go and see who in your buyer region is interested in bioregional finance or bioregional economics, and you can connect with them.

[O1:21:36] And we have self organized calls. We also have calls organized globally, where folks can connect and come up with. plans to build bioregional financing facilities in the place where they live. And, um, I would say at the highest level, just find the others. Start having conversations about bioregionalism in the place where you live.

[O1:21:58] And, um, December 12th is tomorrow, which is a holiday started by some of my friends called Inheritance Day. And on Inheritance Day, we embody a world 150 years in the future where humans are living in. Harmony with the Earth. And we celebrate all the steps that we took to get to that place. And we look back at what we needed to do to get there.

[01:22:23] Um, so your listeners, they might hear this after December 12th, but they can host an inheritance day any day of the year and start to envision what steps they need to take to achieve that sacred reciprocity with all of life in their bioregion.

[01:22:37] **Nate Hagens:** I recently had a podcast with Bill Plotkin who talked about ecological adult adulthood and how few humans actually attain that, and it's almost dovetails with bioregioning that we have to do.

[O1:22:56] Recognize that this is our responsibility. There's no one at the national level going to come and help our bioregion, our watershed. And there is a fiduciary responsibility as a human alive at this time to kind of learn about this spearhead, um, these efforts. And it starts in your own region, in your own, in your own backyard.

[O1:23:18] And so I think the first thing is a mindset shift change. Um, so, um, I, I appreciate all of your, your time today on this podcast and, and your, uh, steadfast work on, on this topic. This was Bio Regioning 101 because I just wanted to get a little bit more exposure for myself and, and the viewers. If there was a bio Regioning 1 O 2, uh, a kind of an advanced, uh, uh, follow up conversation, I would like to ask each of you, what is one topic that you are particularly, uh, individually passionate about, that is under the broad umbrella of bio regioning that you would be willing to take a deep dive on on that.

[01:24:01] topic.

[01:24:02] **Isabel Carlisle:** Yeah, mine is pretty easy. I'm I'm really focused right now, Nate, on bioregional economics and bioregional finance. And just to echo your last point, um, our theory of change is that by engaging in the process of stewarding financial resources together and planning for a transition to a bioregional economy, you can catalyze worldview shifts, which further enable the to that regenerative economy and you have this toroidal flow.

[O1:24:30] For me, it's bioregional governance and what it means to become a citizen of place, um, and all the implications around that. So, of course, governance is linked to kind of data and information, and, um, yeah, governance, you could say, goes everywhere. It goes into the, the rivers, it goes into soil, it goes into biodiversity, and that would be, that would be definitely my choice.

[01:24:51] **Nate Hagens:** M. So governance is one of the central challenges, uh, with the meta crisis and the human predicament and your advice or your speculation or belief is that to address that we have to do it using a bioregional lens. C.

[01:25:06] Isabel Carlisle: Yes. I would say, I would say so, yes.

[01:25:10] **Daniel Christian Wahl:** I think topics like food, water, education, um, community resilience, um, how all of this is, is to some extent also about disaster preparedness, about, um, getting ready for what, we pretty much clearly know is now no longer, um, avoidable.

[O1:25:34] Highlighting the wonderful stories that already happen. Like for example, the, um, Cinture Alimentaire of the city of Liège, um, where since the pandemic, they've started a whole kind of plethora of cooperatives and organizations that are all interlinked to connect the city to its green belt. and create farmers that don't commit suicide, um, city dwellers who have a connection to the landscape and the food they're eating again, and in all of that create community and regional awareness and regional celebration.

[O1:26:11] And, um, Whether you take the entry point through food, water, energy, or local economics, there are just wonderful stories to tell of bioregioning being the way forward.

[01:26:24] **Nate Hagens:** How much of a fringe topic is this? Are there bioregioning convenings all over the world that I'm just unaware of? Are they called something different?

[01:26:33] Or is this growing, uh, these conversations?

[01:26:36] **Isabel Carlisle:** It's a movement, Nate, and it's a movement that, um, at least in North America went underground for a little while and it is experiencing a massive resurgent right now. And some of us are talking about organizing a North American bioregional Congress in 2026, and it would be the first one to take place here since 2009.

[01:27:00] **Nate Hagens:** So where I live, uh, on the border of Wisconsin and Minnesota, does that bioregion have a name?

[01:27:06] **Isabel Carlisle:** It might be the driftless, but let me look into it and get back to you. I'd love to connect you to the bioregionless and the place where you live.

[01:27:14] **Nate Hagens:** I'm about a hundred miles away from the actual driftless region, but, um, yeah, excellent.

[01:27:19] So, um, thank you all. Uh, this, this was very, uh, uh, illuminating for me. And I, I expect for our viewers to be continued, all of you, and thanks for your important work.

[01:27:31] Isabel Carlisle: Nate. Really enjoyed it.

[01:27:33] **Nate Hagens:** Yeah. Wonderful. If you enjoyed or learned from this episode of The Great Simplification, please follow us on your favorite podcast platform.

[O1:27:42] You can also visit thegreatsimplification. com for references and show notes from today's conversation. And to connect with fellow listeners of this podcast, check out our Discord channel. This show is hosted by me, Nate Hagens, edited by No Troublemakers Media, and produced by Misty Stinnett, Leslie Batlutz, Brady Heine, and Lizzie Sirianni.