

# Transcript of 'A Return to Biodiversity'

## Season 2, Episode 39, Transforming Tomorrow

[Theme music]

**Paul:** Hello and welcome to Transforming Tomorrow, the podcast from the Pentland Centre for Sustainability in Business. I'm Paul Turner.

**Jan:** And I'm Professor Jan Bebbington. Today we're chatting space.

No, we're not going back to asteroid mining. We are going to be talking about the complex world of spatial science and the information we can get about a given place, like an ocean or a large area of land, and then how we can analyse biodiversity over that area, and link it through to business activities.

[Theme music]

**Paul:** Jan, I want to return to a topic from a long, long time ago, that we covered in one of the first episodes of Transforming Tomorrow, but that I think we can bring new angles to today. Does that sound like a good idea?

**Jan:** It's a great idea. And what was that topic?

**Paul:** Biodiversity. And I want to talk about how businesses deal with biodiversity, how they address the challenges that biodiversity brings and how they shape their strategies around what biodiversity can mean to them and how they can help biodiversity.

**Jan:** And it's a really smart topic to be returning to because concern about the state of nature, um, biodiversity and the services that nature provides to people and to businesses, um, keeps on climbing up the agenda, but also requirements for better management practices for reporting on those management practices, and for really being, you know, systematic and strategic in how businesses think about biodiversity has intensified since, you know, we first talked about it, you know, probably about two years ago or so.

**Paul:** And we've touched upon it occasionally in different podcasts since then, but we've not had that as the specific focus of a podcast, but there's so much that we can be thinking about, about the different types of action that companies can be taking about the risks that they face when it comes to what they're doing.

There's so much that could be going on.

**Jan:** And business needs help. And I think particularly our guest today is one of those, works for one of those bodies that help business make sense of those things.

**Paul:** Yes, because we're joined today by Dr Michael Burgass, who works for Biodiversify. And they are a company that uses cutting edge science to understand some of these complex social, ecological systems and develop biodiversity strategies.

And some of the companies that Michael and Biodiversify are working with are some of the biggest in the world, so they are in a position to make a big difference, or hopefully they're in a position to make a big difference.

**Jan:** Excellent.

**Paul:** Michael, welcome to the show.

**Michael:** Hi. Yeah, thank you for having me.

**Paul:** No problem at all. Can you tell us a little bit, Michael, about your background and how you've ended up advising businesses on biodiversity issues?

**Michael:** My background in terms of my academic career, you know, I did Geography at uni for an undergrad, and then went into a Master's in Marine Environmental Management.

So my kind of focus, or what I was interested in, was always around kind of conservation issues, how humans kind of relate to their environment, how they impact it, how they depend on it.

And that sort of, you know, shaped my interest in biodiversity, I think as a whole. I kind of graduated back in, um, 2010, which was a terrible time to graduate because it was the, um [laughs] you know, aftermath as a global recession and it was difficult to come by a job.

I think originally I wanted to be more of a conservationist or start my career as a, you know, what I would call a 'proper' conservationist within, within an NGO, getting into the field and, um, you know, doing more of those typical things.

And I, after looking for a job for a few months, I was on the precipice of, of going to do that in, in Egypt, um, doing kind of scuba diving and marine conservation, and then the Arab Spring sort of hit right as I was going to go, so I had to turn that down and, and instead went to work for a business, um, in a more of a traditional, uh, graduate scheme, I suppose, doing environmental consulting for a company called RSK.

So that, I guess, kind of set the, uh, set things, things in motion. And after a few years of working in, um, kind of infrastructure and oil and gas doing, um, environmental and social impact assessment, I got a bit jaded with the kind of procedural element of it all and the tick-boxy type nature of it. And I felt that it wasn't perhaps as impactful as, you know, I wanted it to be.

So I went to, went to do a PhD, and wanted to do something different, change up my networks, get some new skills, and that sort of turned the tables on, on everything really.

**Jan:** And from that work did you then sort of really set your sights on business advisory services that are really, you know, not tick-boxy, but are actually strategic and engaged and, and a real world and a real way?

**Michael:** I think it was sort of a background, background intention. I think if those, I think with biodiversity in particular, if those jobs had been available at the time, I probably would've moved into that straightaway. They just simply didn't exist at, at that time.

It was really only probably, yeah, these kind of extractive sectors, the ones that were engaging with biodiversity very directly that were kind of, you know, they were the only ones really considering, um, biodiversity directly. The, the breadth of companies now is, is so much more.

But I think through doing the PhD, I, I started thinking from a policy perspective in my, in my research. So I was looking at, um, large scale targets around biodiversity. So at the time it was the, the [inaudible] targets in the, in the Global Biodiversity Framework and companies were making kind of national level targets on that.

Um, and my research was looking at how do we track progress towards them. So how do we measure biodiversity at, at large scales, what are the problems with doing that in, in terms of creating indicators and metrics, how they relate to the targets, um, how do we get through some of the uncertainties? And so

as I got to the end of my, you know, PhD that, you know, became a useful skillset for, for when as businesses started to get more engaged in this topic and there were lots of questions around, well, you know, what would, what do biodiversity targets look like for a business? How would a business measure, um, progress?

So I, I think it helped me gain a lot of the underlying skills to kind of start tackling, uh, some of those questions.

**Paul:** What is it that's particularly rewarding and impactful then about working directly with businesses when it comes to biodiversity?

**Michael:** Well, I think it's just the, the innovation really, and the fact that it's just kind of the new [short laugh] new frontier in terms of conservation science.

You know, like we, we know from a global perspective what the, the main drivers of, um, biodiversity loss are, particularly with things like land, you know, land use change driven by, you know, expansion of agriculture and, you know, that's essentially driven by consumption and businesses are kind of at the, you know, at the heart of, of that, um, producing the, the goods, um, driving biodiversity loss.

So understanding how to tackle that is the great challenge of, of our time that, you know, a lot of people are thinking from a policy, uh, policy perspective, but actually how you implement, say, policy or change, um, particularly within a corporate setting, there's so many unknowns, basically.

So I, you know, I think we very much work in this space of like real applied, applied research from a sort of understanding perspective. But then I think there's a huge amount of kind of social science, decision making, negotiation, like all these types of things that also come into play.

So to work in this space, you kind of need a team or you, you know, you need people who are well-rounded, lots of different things. So it just makes for a really engaging, engaging workspace, I think.

**Paul:** Do you find that when you're going in there as an external voice that's been brought in, sometimes you're listened to more than when you were in those previous roles that you mentioned that sometimes felt a bit like tick box exercises for the oil and gas industry that you were working in.

Do you find that your voice is listened to more as an external advisor on these issues?

**Michael:** Oh yeah, it's night, night and day, I think. Um, I mean a lot of the big, you know, the big extractives, they have really good expertise in, in-house, to be honest, themselves. So they have quite a high level of technical understanding anyway.

Um, and really what the, you know, the environmental processes are there, they're part and parcel of getting, getting work done. So, they're almost viewed as like a constraint or, uh, a blocker to getting stuff done.

So you kind of, you feel under quite a lot of pressure to just get, get stuff done and clients, you know, will push you around to, you know, make sure to keep stuff moving or, you know, try and say, oh, I don't think we need to do this actually, like, this isn't important, and these types of things.

Whereas yeah, this, this topic you're basically doing, um, for the most part, you know, education as well. I mean, it's changed a lot over the past two or three years, but certainly when, you know, when we started previously, there was a very much an openness to what is this topic, what does it even mean, how does it even relate to us?

And so, you know, we've been on a, on a journey with the people that we've been working through with for a while, you know, they're understanding is increasing, and then together the, you know, what you can do is, is just more and more really.

**Paul:** Do you find you're generally then working with the companies who have to start with an interest in this before they've even brought you in?

The ones who are maybe more at the, you know, the more proactive end of the scale.

**Michael:** Yes, a hundred percent. That has been the, the trend and, and why, you know, a small company like us has had the opportunity to work with, you know, some of the biggest brands and um, and companies out there. Because it really has been the sustainability leaders driving this, uh, driving this topic area forward.

I think the interesting thing is now that it's, it's definitely mainstreaming more. So we're seeing the next wave, like what we would call like sort of fast followers or this kind of thing. So it's, um, you're seeing a different type of

company coming into asking questions, um, about this topic now, which is, which is cool really.

**Paul:** I can see Jan's desperate to ask a question [general laughter] but I've got one more question to keep going along this chain and that's, you talk about there was the people at the leading edge and then there's the fast followers. Do you think eventually though that everyone is getting on this train?

**Michael:** I mean, you'd hope so, right? I think, uh, but I think we have to also, um, make it manageable for different, for different businesses.

You know, I, I have seen people talk about SMEs, you know, reporting on this kind of stuff. But you've also gotta appreciate the constraints that different businesses are under, the levels of expertise and capabilities and, and, and these types of things.

So I think what, you know, say an SME would be thinking about in regard to this might be at a lot, lot more basic level than, uh, you know, somewhat like the, the much larger global international companies which have far more resource and also sway, um, and influence over their supply chains and, and peers and things like that.

So I think, you know, it's a topic that connects with people fundamentally. It's, it's a lot more tangible than, uh, climate change and, and carbon. It's something you can see and feel and kind of understand. So I think it does have like a lot of potential to, um, to keep, keep spreading and, um, yeah, we'll see. [laughs]

**Jan:** Given that it is so important, but also given that it's kind of new, what kind of challenges do people you've worked with face when they're trying to, you know, deal with nature and biodiversity?

What, what's tough for them to get, either to get started or even to progress further?

**Michael:** Um, I think the big thing is, like, the big thing is this, the, the scale of the complexity, I suppose.

I think, um, while bringing this topic to the fore with business, a lot of, like that's happened by a combination of scientists, academics, and you know, people like us who are kind of scientists and [laughs] you know, NGO background anyway.

But, you know, as conservationists we like to tackle the root challenge. We like to think big. We like to do everything. So when you get into some of the, you know, increasing, I mean, I guess we'll come onto this, but the increase in legislation or, you know, the frameworks in, in this space and what they're asking of companies, it's really, really detailed.

So obviously Scope 3 climate, you know, emissions for climate is, is really complex and loads people have trouble deciphering that. Well, basically Scope 3 is at the heart of biodiversity, like that's almost the starting point rather than the, the bit to come down the line. We, we, we get people to dive right into the detail.

And, and not only do you have to understand, um, you know, relative, um, volumes or costs of your supply chain, you also need to know exactly where you're sourcing from. And, um, that's also challenging 'cause that's not something businesses have ever really been asked, uh, to, to do before.

So you're, you're looking to unpick the geography of your supply chain. And then you need to know, well, biodiversity is impacted by lots of different pressures on your, um, from your, um, supply chain.

So you've gotta think about pollution, you've gotta think about land use change. You've gotta think about the effects of climate change on biodiversity, over-extraction of water, um, and all these different things. There's so many facets that it's just really, really complicated.

So the, the biggest challenge is getting people to get their heads around it, I suppose first, first and foremost, and how to actually go about, thinking about it and tackling it.

**Paul:** So you talk about the, you know, the, these challenges. Does that vary across different sectors and the different businesses you are dealing with as well?

Are, are you dealing with one company that might have a whole different set of issues they want to address, as opposed to another?

**Michael:** Yeah, definitely. So I, I think in the early days, um, you know, before, you know, talking about sort of four, five years ago with the really early leaders, um, we approached things from a strategic point of view.

So, um, 'cause there's also a lot of benefits to thinking about this in terms of, of the business. So if you take a strategic standpoint and not just focus on impact,

you know, you can think about broader, broader ambition, um, in terms of places and spaces and how biodiversity or nature or ecosystem services relate with your customers, your staff, your operations and, and these types of things.

Um, and we've seen some really interesting case studies over time of, say, tech companies that we've worked with in Silicon Valley really took this topic from a, from a place, um, perspective and a recruitment perspective. You know, having amazing biodiverse campuses was seen as a, a really key driver for attracting and retaining staff and that, that angle actually is what managed to unlock funding to improve [laughs] or do more around biodiversity.

The decision making within the business can be different based on, you know, the different ambitions. With the income of different frameworks and things, like I was talking about, the focus really has gone on to impact and dependency within, within the supply chain.

And that's where, you know, depending on the complexity of that supply chain is, is it can be a bit night and day. If you say, got a fashion, uh, retailer say, they might only deal with a handful of, of materials compared to, um, a supermarket who deal with say thousands and thousands of product lines. Tackling that is, is much more challenging.

**Jan:** When you're talking about, you know, those frameworks. One of the frameworks that are out there is the Science-Based Targets for Business initiative. Could you tell us something about that?

**Michael:** Yeah, absolutely. So, um, I'll shorten it to SBTN for, uh, for ease, but the, the SBTN is basically, uh, the next kind of evolution or, or, or partnership with the, um, Science-Based Targets initiative, which is, you know, well known within, within climate circles.

The difference is, obviously this one is, is about nature and, um, fundamentally it's about providing a science-based methodology for companies to be able to set targets, um, on nature and then meet them.

It's been around a little while. It's basically constantly in development, like I say, and because it's such a complex topic, I don't think this will, you know, potentially ever, ever end, but, um, it basically walks you through a number of steps in, in terms of target setting. Um, and it's based around target setting for different realms.



So at the moment there's kind of land targets where there's a full methodology and there's also freshwater targets where there's a full methodology, but there'll be, um, ocean targets to come. And the idea is to kind of iterate on these methodologies as they're being tested.

At the moment, the pilot process has been complete, but we're still in the kind of early, early stages. The other thing about it is it's gonna provide a platform for companies to be able to have their targets validated, much the same way as the Science-based Targets Initiative on, on climate. So basically provides the highest rigour in terms of kind of target setting and delivery. I

suppose the interesting thing on this, again, it, it really is about value chain. Um, primarily there's a quite a high requirement to, to, um, assess your value chain through this, but the targets aren't set at a corporate level, other than a couple.

But the, the main thing is to have place-based targets. So it is basically about understanding and prioritising where your key sourcing landscapes are, and then, uh, setting targets within them. So it's a very different way of thinking and operating for businesses, essentially.

So to give an example of that in terms of like water, for example. So it would be highlighting where, throughout your supply chain, water is the biggest, you know, a big issue in terms of, uh, drought or these types of things. And then setting a target for the basin as a, as a whole. And then understanding what your contribution should be to, to that basin. So really specific and, uh, obviously yeah, a bit different for businesses.

**Paul:** How much of an input do businesses themselves have when it comes to shaping what targets should be? And does your work as advisors for this business help in anywhere to shape what these standards, targets, et cetera, should be?

**Michael:** Yeah, I mean, this has been an interesting one with SBTN, because the, the idea is that it, it, or the underpinning of it is it's science-based.

So in a way, businesses haven't really been part of the methodology creation, because the idea is it should be, you know, science driven, uh, for, you know, for a better world type of thing.

I think the problem that, you know, we've had, or like, you know, that kind of keeps unfolding is that if you want something to be implementable, you also need to consider the people who are gonna be implementing these things.

So it's always been the, it's been the knotty sort of, uh, point with SBTN is like, how do you, how do you balance that? And so there has, there have been tests and pilots and these types of things where businesses have been able to, to feed back.

But ultimately, SBTN is a group of NGOs and um, scientific institutions and things, so they do kind of make the final decisions on, on these things. I think, yeah, it's, it's a real trade off, and I don't quite have the answers for it, 'cause you want something that's challenging obviously, and that leads to better improvement, but it's also got to be scalable, and I think that's the, the tricky point at the minute.

**Paul:** In your view at the moment, do you think it's got the right balance so that enough businesses, once it's all drawn up, will actually take part in the initiative? Or do you still feel it's either too difficult, or too complex, or not quite aiming at the right targets for them? I.

**Michael:** Um, so I think, so it's a, it's a number of steps, basically. The first two steps are about the prioritise prioritisation of what areas of the value chain to focus on and these types of things.

I think they've got that bit eventually pretty, pretty good. And actually, it's the only methodology that you can follow out there, basically, which again, is a, you know, a bit of a, a bit of a problem from a rigour point of view if you're not following that methodology.

Um, as a, as a business then, what methodology, are you following, or are you being transparent about what you're following? So I think, you know, we tend to, um, advise to follow the methodology for the first few steps because it is very much more around materiality, prioritisation and these elements.

Once you move into the kind of more place-specific stuff, I mean, you know that in itself is a incredibly high barrier for most companies to look at at the moment. So I think you will be limited in terms of the actual target setting in, in places to sustainability leaders at the moment. And how scalable that is. Not sure.

I think, I think to make it easier to scale, they probably need to consider sort of, uh, collaborative ways of working, how to bring in, you know, others, you know, like I say, fast followers without, you know, being able to hold their hands a bit more or bring them into those spaces and actually get companies working together within landscapes, which it doesn't actually make sense for every company to be trying to operate individually. Um, and, and a lot more can be made working together.

So that's probably the way to scale it, I would, I would think.

**Jan:** And, in answering that you, you actually sort of prejudged a question I was gonna ask that, you know, in a, you know, in a place-based piece of work in an ecosystem, there's obviously other businesses, so sometimes fast followers might be people who see the leaders and want to do the same, but there might be spatial followers if, if we could use that phrase, which is, you know, entirely illegitimate in a way, that you've got maybe an anchor uh, institution.

You're a large company in a, in an ecosystem. And everyone who's around says, well, okay, can we work together to jointly achieve things? So I think that gives almost a different sense to what a follower would be. It could be people participating in a particular locale.

'Cause I think you're absolutely on the ball when you identify that nature action has to happen where in a place it's very place-based, which makes it really tough because you know, if you're a very large organisation, you're in lots of different places, and so you've got a volume problem going on as well.

**Michael:** Absolutely.

**Jan:** So, when you are thinking about, you know, maybe using the Science-Based Targets for Nature initiative or other approaches to deal with, um, nature, what kind of steps from a generic perspective would a business have to do to start down this route?

So, if you were going to give them, you know, um, on, on this podcast, the ABC of how to get going, what would those steps be?

**Michael:** So I think in terms of starting to understand things like this, I was listening to you, the podcast, um, that you did on the Task Force for Na...or on, Task Force on Nature-related Financial Disclosures...

**Paul:** ...you can't get that wrong. I wasn't allowed to get that wrong, he's certainly not allowed to get that wrong.

**Michael:** [Laughs] Yeah, yeah, you must, you caught me out there definitely as well. Um, so, you know, that provides a pretty loose, uh, framework for kind of walking through, um, some of these things.

So, like I said before, it's sort of about, you know, locating your, your interfaces with nature through your value chains, evaluating, uh, you know, evaluating in those locations.

So looking at the, um, looking at the different pressures that are exerted from, from those activities, uh, and, and the sensitivity of the biodiversity itself, um, in those locations. And then, uh, starting to, to, to prioritise essentially, in terms of, you know, where, where we need to work or, or, or look at or think about.

I think, I think interestingly here, you know, the emphasis is very much on science or science, having the answers and these, these types of things. I'd go a bit broader than that, and, and I think, you know, you have to, you have to be a bit broader in terms of when you're starting to take action and, you know, where's actually feasible.

Like where's, you know, where's possible, where can you get the most traction and, and bang for your buck and the, the, these types of things? Because I think ultimately we want to start moving people towards action. And that comes, like you say, from moving off kind of, you know, spreadsheets, graphs, analyses, and actually, you know, if you are actually going to go out and do something, it's gotta be, it's gotta be workable.

And that's, you know, you can't let that get in the way of not doing anything. So yeah.

**Paul:** Is anything that's actually meaningful easy in this for them, or is there anything that they, these businesses want to do that's actually gonna have a real impact that's gonna be meaningful? Is it all tough for them?

**Michael:** Yeah, I mean, it's an interesting one. It's a bit like Scope 3. I think you go back to the Scope 3 analogy. Like if you look at the whole picture, um, you know, Scope 3 stands out massively, right? And it's a, and like I say, we tend to jump into the supply chain side.

But obviously once you get into the supply chain that your sphere of influence your control over these things, uh, weakens. Like, and often the direct operations and your actual footprint and, and these things can be overlooked,

but that's the stuff that's directly in your control basically. And you, you can do more.

So we, we do encourage clients to, to think about that. Particularly ones who have large, you know, land holdings, um, and, and these types of things.

So we, we've actually been engaged with a number of people now who are starting to look at their global estates and portfolios, starting to, like look at measuring the biodiversity on them in terms of getting a baseline and then looking at how to roll out, um, yeah, basically sort of restorational conservation efforts across their, um, across their estates essentially.

Which, yeah, when you put it in the context of supply chains, probably doesn't come out that impactful, but like in terms of something you can actually do and get going on, and that definitely has impact locally in those places, a hundred percent.

And the other thing is, I think when you're working with these businesses, these types of things are held, uh, by different teams. So like the, you know, estates management and estates team will be a completely different team to procurement and supply chain.

So there's absolutely no reason why you can't, uh, get going on, you know, two things at once with, with different teams.

**Paul:** So there's lots of talk here about place and in the briefing for this episode, when I mentioned there were lots of things that confused me, one of the things that was mentioned was spatial science.

So I want, um, to see, to explain how spatial science might be appropriate with regards to this kind of action. But first of all, tell us what spatial science actually is.

**Michael:** Yeah. So, like, you know, we have a, a lot of people in our team are much, uh, much more depth than, than myself, uh, spatial science and spatial, um, analyses.

But essentially it's, um, you know, it's looking at, uh, spaces in land, oceans, et cetera, maps of, maps of the world, um, that contain different data, datasets on different things.

So looking spatially, um, how, you know, say biodiversity differs around the world, how, uh, pressures are exhibited differently around the world. and then

using those data layers in different ways to answer, answer questions of, of interest.

Um, and it's, you know, it's, it's complicated and it's very time consuming because it's an awful lot of data once you start to add up different global data layers for, for example, and then try and produce meaningful, um, results.

So there's a lot of kind of modelling, um, a lot of analysis that needs to be done and testing assumptions and these types of things to, um, understand if you're kind of getting to the root of it, so to speak.

**Jan:** And I suppose, um, I'll give a very simple example if it, if it helps. So, if you're a fishing company and you're wanting to fish in particular waters, there may be regulatory requirements when you can't fish because maybe there's, um, creatures breeding in the, in the space and that you want, they need to be left alone to do that.

But some of the things then gets quite complicated is about when species move around. So, natural science datasets exist for how different species move and at what time they move and where they're moving to and from.

And if you have operational assets in that area, whether it be, for example, it could be wind turbines in the ocean, or it might be shipping lanes, or it could be, um, you know, fishing activities. So directly using, um, uh, materials, then you might modify your operations in order to be able to ensure that the migratory patterns or the breeding patterns can be sustained naturally and your operations aren't mucking around with them.

Now that, that's, you know, how do you know where, where, you know, seabirds are moving? That's a big natural science question for which there are big datasets, but, but each, there's usually a dataset for each species [Jan and Michael laugh] [inaudible] species.

So how are you gonna layer them on top of it and actually be able to make, um, impactful operational decisions becomes really complex. So it's a fantastic area, but as, as Michael says, it's really hard work to get that right.

**Paul:** Complex.

**Jan:** So there were a couple other things that I think that you might, you might want us to explain, Paul. Both physical and transition risks. And I think our listeners will be really interested to know what the differences are between those two categories as well.

So over to you Michael. How would you explain to a business the difference between these two aspects?

**Paul:** First of all, how would you explain what both of them are? I don't wanna know just the difference, I want to know what each of them are.

**Jan:** Okay, okay, we can start from the beginning...

**Paul:** ...go back to basics, always start from the basics.

**Jan:** Yes, indeed.

**Michael:** [laughs] Well, feel free to help me out, Jan. 'Cause it's, uh, I know it's topic close to you as well.

In terms of how we talk about risk or thinking about risk, I mean we deal probably primarily in what we do with, uh, physical risk or, or, or thinking about physical risk.

So we're, you know, in the context of a business that is, how does the environment, you know, around it or that interacts with it, how that is changing, um, particularly in the face of climate change and biodiversity loss, and how will that impact, um, their, their operations and their, and their day to day?

And actually, I mean, when I started doing this, I assumed because of how, you know, advanced climate, you know, modelling was, and all these types of things, the businesses would actually be pretty adept at understanding, you know, future climate risk and, um, these types of things, let alone biodiversity risk.

And actually, yeah, kind of found that not, [laughs] not really, um, not really to, to be the case, which was, which was pretty, um, surprising, particularly when physical risk is rearing its head here and now, all the time. [laughs]

I think that it's an interesting area that I think will bring home, you know, issues around climate change, around biodiversity, much quicker because yeah, the impacts are already being felt basically.

And then transition risk is more about the kind of, um, I guess the policy, markets, human responses to the, to the changing world and how that is gonna put businesses at risk as well, in terms of changing consumer preferences or policy, you know, policy changes, making things harder for business, like, um, say electric cars or, you know, mandating that certain

amounts of electric cars need to be built, or things that businesses need to be aware of and be able to, to respond to.

And I guess that one's probably harder to model in a, in a way, like the, [laughs] certainly the physical risks. You can, I think scientists are very good at modelling, actually different futures and potential futures and things like that. Businesses maybe not so used to actually sort of understanding that as a concept or thinking about that as a concept. So that's probably the gap there.

**Jan:** And I suppose the big issue with transition risk, which we're sitting in the middle of at the moment, is that it can come and go as well. So, preferences...

**Michael:** ...yeah, exactly...

**Jan:** ...can, can come and go.

So if you were, you know, looking forward and, and, you know, this is one of the reasons why I, I really like some of your LinkedIn posts, is that you, you look forward and say, well, okay, what's, what's the future landscape likely to look like for business and biodiversity?

And so what, what do you see in that future in the near term given, you know, a variety of pressures, uh, for people who want to give up worrying about the natural environment?

**Michael:** Yeah, I mean, I, I think this is a really interesting thing. I think the more, particularly as the physical risk is impacting more like, um, we see this as basically becoming much more business-critical, and actually the, you're not, you're not necessarily just arguing it from a transition risk or a, you know, change in consumer preference and this type of thing.

Like, the actual business realities of, you know, issues being caused is here and it is felt already. Um, you know, things like cocoa prices, for example, have, uh, like rocketed over the past year or 18 months and that, you know, that's largely down to climate change and poor growing conditions and, and these types of things.

So yeah, the outlook is we need to do actually as a, you know, as, as a community probably, um, make our case more strongly, understand the business side, I mean, that's probably how we've changed our, our tune as a business or gone from, you know, starting out as sort of conservation, you know, scientists into people really kind of obsessed with understanding how businesses operate and how do you, um, how do you float the messaging in



the right way or how do you get things across, try and get things across to people, you know, in different parts of the business who are more senior or, or, or these types of things.

So that's the future really. Um, nothing like future's kind of set. We're gonna see more of this happening. So it's about how we, uh, how we communicate with intent, um, to, to get the message home, I think.

**Paul:** Have you seen any examples from all the companies that you've worked with of what you would consider best practice that you maybe can see being adopted, moving into the future?

**Michael:** I mean, uh, there's lots of good, there's lots of good stuff happening within, within different companies for sure. Like, you know, there's, there's now a collection of, say, biodiversity strategies that has gone on to, I think it's Business for Nature or one of those types of, um, websites is compiling, um, all different biodiversity strategies. There's some really good examples in there.

We've done a lot of work with Tetrapak, for example, who've combined kind of biodiversity water and carbon into a single nature strategy that cuts across, uh, their entire kind of, uh, value chain, including kind of downstream elements as well. Which I think is pretty, um, pretty groundbreaking.

And then obviously there's obviously, yeah, different companies who are, you know, more, more adept at sourcing, have been thinking deeply about sourcing for a long time, and therefore are able to accelerate, you know, what that, what that means on the ground.

And, and taking things like forestry for example, that hasn't typically been managed for biodiversity. But, you know, if we're starting to demand actually, well, we need to understand what the, you know, the biodiversity is in these forests, how are we gonna improve it? You know, that, that, that's really, really exciting.

Um, but I, I think, you know, when you look at the sort of benchmarks of companies and there's a few benchmark, benchmarking operations out there, you can still say even at the top, there's quite big gaps collectively, there's a, there's a long way to go.

I don't think you could say any company is, you know, nature positive or, or anything to that, to that regard. Yeah, we've got a lot more to do basically.  
[laughs]

**Paul:** [teasing] Did you know there were lots of benchmarking organisations out there, Jan...?

**Jan:** [joking] ...don't, don't, don't wind Paul up, Michael. [Michael laughs] I told you before, never mention the benchmarking. [Everyone laughs]

I'm just gonna step away from that...

**Paul:** ...leave the benchmarking alone and exit the room. [General laughter]

So just to round things off then, Michael, we won't talk about benchmarking, Jan will be disappointed to learn.

So, but where do you see inspiration and hope in this area? Despite all the challenges that we're facing?

**Michael:** Yeah, there's plenty of hope. I think we're, we're seeing this combination of companies starting to understand the need to, to work on the ground.

At the same time, I think you're seeing massive interest from financial institutions coming to the fore to, who want to know what the role of capital is in this and how, how we make capital improve this, this situation.

You've got this kind of flourishing nature tech startup space that, you know, is, is really, really exciting. And I think, you know, the monitoring and, and verification and all this type of type of stuff, um, you know, when you get the financial institutions involved, you're gonna have to provide rigour on that front.

So, I think all the pieces are, are, are really coming together. I think the challenge, um, that, you know, uh, we, we spend a fair bit of time thinking about but is, is how to pull it all together.

Like how do you, [laughs] you've got all the, all these things that are up there and, and they have to be, they have to be brought together. And you've gotta kind of take a risk on that. Um, you've gotta maybe expect the first couple of times to not achieve the success that you want to, but, but take the, take the learnings and, and share from them.

But there's a huge amount of, um, enthusiasm from all different actors to, to improve things. It's just, um, it takes brave, brave people I think, to, to try it and get things moving.

**Paul:** Well, Michael, it's been a really great conversation with you today. I'll forgive you your mentioning of accounting, your mentioning of benchmarking [general laughter] because you brought much more to the table in terms of the biodiversity and everything. Thank you very much for joining us.

**Michael:** Oh, thank you very much for having me.

[Theme music]

**Paul:** Every time we come back to biodiversity, Jan, there's always something new that we learn.

**Jan:** What did you learn this time that was new?

**Paul:** I learned that people keep talking about benchmarking and accounting [Jan laughs] even when they're talking about biodiversity.

But, um, not only that, but the tie-in between biodiversity and the consumption-based society and business. The fact that if you are an expert on biodiversity and you go into a company as an external expert, they'll listen to you more than maybe they would've listened to you if you were hired by them and worked for them full time. Lots of interesting elements.

**Jan:** And I thought of, uh, Katherine Elsworth-Krebs', uh, podcast where she was talking about what a sustainability manager does, and it seemed that Michael had been one of those, and then an external advisor, and sometimes can get further in the door as an external advisor.

**Paul:** And he's not the first person we've had on who's worked in the oil and gas industry as well. And it's interesting that there's been a few people who've worked within that sphere who've then come on and worked very more specifically around sustainability.

**Jan:** Hush, I've told you that I... used to do a lot of research into the oil and gas industry. [laughs] I don't think I've ever admitted that. Yeah, so...

**Paul:** So whenever we've talked it about with anyone else, you've kind of kept shtum, but it turns out you [Jan laughs] were the biggest proponent of oil and gas at the last two COP conferences.

**Jan:** No, no, not exactly. But when I worked at the University of Aberdeen, I did a lot of work with the oil and gas majors because they were the, the key players in that, that area.

But also some of the, they've got some, you know, really challenging problems and especially when you think about business and biodiversity, so it's a really good learning ground as well as, as you move on to other, other areas.

**Paul:** And speaking to Michael, it's obvious that we talked a lot about science-based targets, but the importance as well, of what's feasible. Because science-based targets might want businesses to do lots of things, and it seems that a lot of these science-based targets will speak to businesses if they have to, but do they incorporate that into what the targets end up being?

Maybe not as much as they should?

**Jan:** The other thing he said though, that I thought was really interesting and sort of speaks to that point is that he's looking at businesses, thinking about strategies, um, but they're not doing strategies for climate separate from water, separate from biodiversity, but actually having strategies for those elements coming together because of the interplay between them.

So that joining up of strategic orientation, I think will, will serve us all well.

**Paul:** So what have we got coming up next week, Jan? Do you want me to tell you what we've got coming up next week?

**Jan:** Yes, please.

**Paul:** Because next week is the last episode of the series. [Jan gasps]

This is, this has been the penultimate episode. Next week will be the final episode of the series, and it'll just be me and you.

And you'll remember that experience from last year where there was lots of really fun questions for you to consider.

**Jan:** I think we should be more democratic this year and ask you a bunch of fun questions as well.

**Paul:** I've checked, and that's not possible [Jan laughs]

But, we will be discussing, we'll be looking back over the series that we've just had, looking at the various issues that have inspired people and looking a little bit ahead to what we're gonna be discussing in the next series, which will be coming up in the autumn.

**Jan:** And I think one of the things I like about how we're planning this final episode is that listeners would've realised that we asked lots of people at the end of their, their guest slot on the podcast, what was inspiring them.

So we're gonna integrate some of that together because if, you know, we do need inspiration, all of us need inspiration. And, um, in the, you know, the year that this, uh, podcast is being, um, produced, there are a lot more reasons to need inspiration because the, the ground for sustainability in business has become more complicated.

It's become more contested in some places. People have walked away from commitments they've paid and made in the past. So I think it's, you know, it's important to actually then draw those things together and make a thematic analysis of what were the things that make people hopeful.

So hopefully that might make our listeners hopeful as well.

**Paul:** Well until that inspiring finale to the season. Thank you very much for listening.

I'm Paul Turner.

**Jan:** And I'm Professor Jan Bebbington.

[Theme music]