



Wales and global responsibility

Friday 26 November at 2pm

[https://www.youtube.com/watch?v= SKOZ20mt94](https://www.youtube.com/watch?v=SKOZ20mt94)

Gyda / With: Shea Buckland-Jones, WWF Cymru; Stuart Taylor, Argoed Farm.

Shea Buckland-Jones

.....I'm the food, land use and nature policy manager at WWF Cymru. I'm going to talk about our Wales and Global Responsibility Report, so you'll hear a bit about the report first and then I'm going to hand over to Stuart Taylor from Argoed Farm in North Wales. He is going to present some solutions for the challenges in the report, so we've got a double act. I'm going to kick off first with a bit of insight into what we've been doing in WWF and some context around our work.

You've probably heard this a number of times over the last few days, you know we face a climate and nature emergency in Wales, but we also face it in a global context. And you know across the globe we are losing around 18 million hectares of forests every year so that's nine times the size of Wales across the globe. That's driving a number of things, climate change, nature loss, it's impacting indigenous people in terms of where they live and reliance on the forest and habitat for their livelihoods. It's also driving pandemic risk. So, the more we are cutting down our forests and destroying our habitats across the globe, we are bringing people into closer contact with wild species, so the chance of zoonotic disease passing into the human population is increasing because of that linkage. The Amazon, just taking one example, we've lost 20% of the Amazon. It's really at a tipping point at the moment. If we lose another 5% of it, we essentially lose the fight to some extent against climate change and that rainforest could turn into a different landscape and become a savannah and have a very different role on our planet.

What does this have to do with Wales and the food and farming sector in Wales? We commissioned a report in WWF Cymru, Size of Wales and RSPB Cymru called "Wales and Global Responsibility" and this report for the first time really gives us a view of Wales' impacts overseas as a result of a number of key commodities that we import into Wales.

In this report we've been producing over the last 12 months – we launched it in October to a closed audience with a lot of political representation and we launched it

publicly via the BBC in COP26 – and what the report does for the first time in Wales is really has a look at a number of key agricultural and forest commodities we import into Wales.

Cacao, palm, beef, leather, natural rubber, and soy and timber and pulp and paper. Obviously, a lot of those are agricultural commodities and very relevant to this conference, and we look at where those products and commodities are produced overseas, and the land footprint associated with their production. In other words, the land area used overseas in different countries for those products which are then imported into Wales. Our report crucially shows the impact those commodities are having on deforestation, habitat loss and social exploitation in the supply chain and obviously driving biodiversity loss and greenhouse gas emissions at the same time.

Key findings. The report basically includes an area equivalent to 40% the size of Wales, so nearly half the size of Wales was required overseas just to grow those seven agricultural and forest commodities in an average year. This is the really crucial stat: 30% of that land used to grow those imports of commodities is in countries categorized as high or very high risk of deforestation, habitat loss and social exploitation in the supply chain, and this slide here just gives an equivalent land use area for those imports.

For example, Welsh timber imports use a land area two and a half times the size of Anglesey overseas, our soy imports using land area greater than the size of Monmouthshire, and palm an area greater than the size of the Wrexham county.

Different commodities have different land footprints. Timber for example has the largest land footprint overseas, all the way through to rubber which has the lowest land footprint: so, timber has used the largest land area overseas in terms of what is produced overseas and then imported into Wales.

This is such an important aspect of the report because we're always going to have a global market where we're importing products, we're exporting products etc. The issue we raise in this report is the risk of those commodities we are importing into Wales and then consuming or using in different ways. It gives each country a risk score based on a number of criteria, so they're calculated on things like the country's total tree cover loss, deforestation as a percentage of total forest loss, rule of law and labour standards.

Just to pick out a couple of commodities that are high risk. One is low, as a score, all the way up to 12 which is really high risk. You can see soy for example, it's a really high-risk commodity, largely comes from South America so Brazil, Paraguay, Argentina and palm as another high-risk commodity largely comes from Southeast Asia so Indonesia and Malaysia. When you break it down, some commodities are a lot higher risk than others.

Palm is a really high-risk commodity, so 84% of the land area used to grow palm abroad for Welsh importers is in countries categorized as high risk of deforestation, habitat loss and social exploitation, and the same for soy. When you break it down, what does this mean in practice? Where do you find this unsustainable palm in particular products? Palm is imported into Wales in a number of forms, processed foods, biscuits, cakes and confectionery as well as in palm kernel expeller, an oil cake which is an ingredient in livestock feed and I'm just picking out some examples of the commodities here relevant to today's discussion.

We're importing around 190,000 tonnes of soy a year and those imports increased between 2011- 2018. Soy is mostly imported into Wales in the form of meal and beans for livestock feed, 80% of the Welsh soy imports are meal and beans for livestock feed. Our report provides a breakdown of how that soy is consumed in different sectors and across Wales. The poultry industry is the largest consumer of soy in Wales, estimated to be responsible for consuming around 48% of imported soy feed followed by dairy which covers about 20% of feed.

Another fairly high-risk commodity is beef. We import beef into Wales from all over the globe, whether it's fresh, chilled or frozen or in processed meat products such as corned beef. Beef has a really large land footprint overseas in terms of the beef that's produced overseas and then imported into Wales. It is not as high risk a commodity as commodities like palm and soy for example, but nevertheless it has a large land footprint. 26% of the beef land footprint falls in countries at a high risk for deforestation, habitat loss and social exploitation, including places like Brazil and Australia, which hammers home the need for us to embed high social and environmental standards in trade deals. You can see quite an interesting finding from the report was Wales having a higher proportion of beef land footprint in Brazil compared to the rest of the UK due to our high levels of corned beef consumption in Wales. I think there's some messages there around not just environmental impact, but I think social impacts in terms of our diets and our eating of processed foods in Wales being higher than other parts of the UK.

We've broken it down by different commodities and we can see that as a result of the deforestation and habitats being changed to produce these commodities, Welsh imports of just four commodities, so soy, cacao, palm and natural rubber total 1.5 million tonnes of CO2 each year. That's equivalent to 22% of the greenhouse gas emissions from transport in Wales annually. A massive significant figure and obviously in those countries that are producing commodities for Wales there are 2,800 species threatened with extinction.

When we launched the campaign back in October, we'd been really clear our target audience is Welsh Government and we've been calling on government to do everything they can within their decision-making ability and power to eliminate deforestation, habitat loss and associated social impacts from its supply chains. We were really happy to see in the event itself in October but also in COP26, government

committed to a number of things around this campaign. I'll talk you through those quickly in terms of the relevance to today's discussion.

First, we've called on the government to account for and report on the greenhouse gas emissions caused by Wales overseas as a result of the deforestation and habitat loss associated with Welsh imports of commodities. The climate change minister, Julie James, has agreed to look at that ask and review our net zero carbon plan, so we do account for our overseas greenhouse gas emission impact.

I think there's a potential in Welsh government's economic contracts when they give money to businesses, to require supply chains free from deforestation conversion and social exploitation. I think there's a big potential in procurement policies to really introduce those requirements around deforestation-, conversion- and social exploitation-free supply chains and there's obviously a big review of procurement in Wales at the moment, particularly public sector procurement and the Social Partnerships Bill. I think if we can get to a position, particularly in food and farming, where we have production and supply chains in Wales free from deforestation, we can be in a good position to really, for example, link public sector procurement for schools and hospitals and others to food produced by farmers in Wales.

These next two recommendations are key to this discussion: so, we're really calling on government to support Welsh farmers to eliminate imported livestock feed linked to deforestation habitat conversion overseas, and to design the sustainable farming schemes so it incentivizes farmers to adopt nature- and climate-friendly farming methods such as organic, agroecological or agroforestry systems and we're going to hear from Stuart Taylor shortly about some good practice on his farm and how he's developing those methods of farming not reliant on external inputs such as soy and palm kernel. We've had some really good discussions with the Nature Friendly Farming Network in Wales, as well as NFU Cymru and we've agreed to look at this issue in more detail across the sector.

The fifth ask is really around an opportunity which some of you might have seen in the recent Labour-Plaid agreement around developing a Community Food Strategy in Wales. I know there was a session on this on Wednesday, I think, and there's a real potential in that strategy to drive and reward local, sustainable farming and fishing for the supply chains.

We have a number of other asks of government in terms of supporting international projects and obviously influencing UK government when it comes to trade agreements to guarantee high environmental and social standards. I won't go through all this in detail, but there are details in the report around what companies can do, financial institutions, and things citizens can do in terms of looking at labelling and we do have an ask. We're sending an ask from the public to Senedd Members at the moment to get them to act on this campaign, so if you want any further information on that then let me know.

I'll just finish by saying, you know, we've been clear in this campaign that if we are serious about tackling the climate and nature emergency, we have to tackle our environmental impacts both at home and overseas, and clearly the food and farming sector in Wales has a key role to play in achieving some of the solutions in this campaign. We've gone from a position of getting commitment from government to work with us to deliver the campaign asked; we're now into that stage of delivery.

What does this look like in practice? How do we embed those recommendations into reality? Part of the reason for asking Stuart here today was to reflect on some of the ask around imported feed input and to work with more circular regenerative farming systems so we can really reward that local farm, sustainable, farm to fork supply chain. So, I'm gonna hand over to Stewart to tell you a little bit about his farm, Argoed, up in North Wales and just tell us a little bit about his farming practices and how some of the solutions he's driving on farm tackle some of the challenges raised in our report, so over to you, Stuart.

Stuart Taylor

I've been organic since 2000 and I keep 65 British Friesians on 150 acres. The British Friesians bit is crucial because for the direction I'm going that's the right breed. I couldn't hope to do it with a Holstein.

I'm transitioning to being 100% grass-fed dairy which isn't easy. Being organic, the price of organic concentrates is horrendous. It's gone up to £390 a tonne this summer. That's an extra £23 a tonne just because of harvest problems in China, and I don't want to be reliant on what's happening in China for what goes on at my farm.

I was feeding a tonne per cow to 65 cows and that was £25,000 a year or £2,500 a lorry-load every six weeks. That helps with the economics because the downside of going grass-fed I expect to lose about 25% yield, so on paper the business case isn't good. The loss of yield I think will marginally outweigh the saving but there's other beneficial effects. I've just got a hunch it will make me more resilient because I just won't be interested in what's going on with the soy harvest abroad. The only things that will affect me will be weather and grass growth.

I'm making it more awkward for myself because I've also stopped ploughing. I was growing corn until about eight years ago but then I realized that very good quality silage can replace grain and will be a safer feed for the cows than wheat, which is what I was growing. The downside of that is that I can't do a full reseed because I've decided to stop ploughing also for the soil's sake.

We've got some slopes here and it's took me a while to realize that the flat tops of the fields have got a lot more soil than the slopes, and that's after my family's been here 100 years and grown corn once in every 10 years. So 10 years of grass and then, well actually two years of corn, but even that has made the soil migrate downhill to the bottoms of the fields and now the slopes, they've only got half the amount of soil that

the flat tops and bottoms of the fields have got. That's the main reason for stopping ploughing, and also to build carbon. Once again resilience because now we have so much rainfall in intense episodes, and it can be at any time of year.

Just recently, local to me I've heard two stories of very heavy rain after a seedbed's been made and the soil ending up the wrong end of the field and even on the road. So, I'm going to keep a green skin on the soil from now on. That means it's more difficult to pep up what will effectively be permanent pasture, but I'm overseeding herbal leys and having reasonable success. I find you shouldn't judge the success until the following year because seeds don't all germinate in the first year, but they do come. The reason for the herbal ley is for the variety of clovers and chicory all rooting at different levels and all contributing something slightly different to the overall mix, so that's why and that's how I'm approaching it.

I've just got my first two-year-old heifers calving and coming into the herd and they've never seen concentrates. I raised them on milk and hay basically and then pasture in the summer. When you're organic you have to feed and milk until 12 weeks which is twice what a conventional farmer might give milk for, but I've took that to four or five months, and they do really well on it and in fact you have to be a bit careful that you don't overdo them, and they end up really big and fat and therefore not as fertile. I've got these heifers calving that have never seen concentrate and hopefully they're well adapted to milking on grass.

I was producing 6,000 litres a year on a tonne of cake. I went down to half a tonne of cake only fed in the winter, so for two summers they've only had grass in the summer, no cake. I'm now considering this winter dropping the cake for the winter. I'm not quite sure this is the year to do it because I've only just got enough silage but I'm just going to see how it goes. So, I've gone from a tonne to half a tonne. I've normally started feeding concentrates by the end of November. I haven't yet. The cows have probably got their last day out today and then they'll be in day and night from tonight. So, I've got from now until Christmas really to see how they milk just on silage with no grass to pep it up. I'm expecting a 25% drop in yield so that takes me down to about 4,500 to 4,200. I think I can do it at that level because of the loss of such an expensive cake bill. I think that will make up for the yield.

I'm finding that some cows do better than others. Well, none of them lose condition, that's the big thing. You might think they're underfed, they're not. British Friesians, they just like to eat and stay fat and that's what they're doing even without cake. They just drop their yield and that's what I want because obviously I don't want to challenge their health or their body condition, so that's going quite well.

Some of the cows are maintaining the length of their lactation up to 300 days, some are drying off at about 280 or earlier. The ones that dry off earlier, I think that's not the genetics I want: they'll have to go from the herd or at least not be bred from. It's the ones that still milk from 280 to 300 days, they're the ones to breed from and take forward.

I'm always very conservative with any estimates and I've done so much number-crunching over the past two years, but they're peaking at 26 to 24 litres after calving, and then the rest of the herd, including fresh calvers and ones that are practically dry and due for drying off, I need 16 litres a day in average over the whole herd to come out at my 4,500. Now even when you have a disaster, and they haven't had enough grass for some reason, it still only drops to 15, so as long as I can keep getting the grass into them, I think I can do it.

Like I say, it's the price of organic nuts that makes it feasible for me. Someone that's feeding nuts at a conventional price, it's going to be more difficult because they haven't got the same savings as I have.

I'd just like to say I couldn't even consider it without rotational grazing. I've been doing it for three years now and it's fantastic. I've got everything on rotational grazing now, first season calves, dry cows, in-calf heifers and the milkers, and for 20 minutes work a day moving the electric fence the payback is enormous.

I'm often staggered at how the grass regrows even in the beginning of November. The milkers have one paddock for 12 hours and then it's back fenced so they're only on it for 12 hours. By the time they get to finish the field, the first paddock has already got six days' growth on, and it can be phenomenal, so I'm very pleased with that. So, I intend to pursue grazing prowess to replace the cake.

Shea Buckland-Jones

It's good us raising the issues in our report, but I think speaking to you over the last few months has really helped me to understand. Poultry and dairy come across as the biggest consumers of soy and palm kernel in a Welsh context and clearly there are challenges around moving from understanding the problem to developing the solutions. Hearing your perspective from technical and environmental all the way through to the yields and the economic questions has been really interesting. I think it's clear this is not an easy thing to do and the more we share lessons, show good practice and work through the challenges together, then I think we'll be in a better place.

One other thing I didn't mention in my presentation was we're doing all kinds of research in WWF at a UK level around alternative proteins, things like seaweed, legumes and a number of other initiatives.

[discussion of some of points in the chat]

Here's a question just come in, how and where do you sell your milk?

Stuart

I'm a member of Calon Wen, the Welsh organic milk coop, so I sell to them. The people who are making the best success of grass-fed dairy are selling direct to the public, but that's not really an option for me so I need to survive on the wholesale price, rather than selling it for £1 a bottle.

Shea

You don't get any premium selling through the methods you use?

Stuart:

Not for grass-fed, only for being organic.

Shea

Another question: are you considering Pasture for Life certification?

Stuart:

I am a member of Pasture for Life so I'm learning a lot through them but it's an extra cost to get certified and at the moment I can't get the premium. Perhaps once I get there perhaps I will, and I might be able to sell culls or calves at a premium for being grass-fed.

Shea

I can see we're out of time, that went very quickly. Just again, thank you to the team organizing the conference for the invite today and also thanks to Stuart for presenting what you do on farm. I know how busy you are on the farm, so I do really appreciate it.