

Regenerative Agriculture Week 2022: An Annual Update

A Special Interview With Ronnie Cummins

By Dr. Joseph Mercola

Dr. Joseph Mercola:

Welcome everyone. Dr. Mercola helping you take control of your health. Today we are going to be having an interview with Ronnie Cummins for our Regenerative Agriculture Week. Ronnie runs, of course, the Organic Consumers Association (OCA), and that is one of the nonprofits that we've been supporting regularly by donating a significant portion of our revenues to help support the mission because it's not just enough or sufficient to give you the information. We have to sort of pave the way and make it easier for you to do these things, and Organic Consumers [Association] is one of the groups that we work with to facilitate that process. Welcome and thank you for joining us, Ronnie.

Ronnie Cummins:

Good to be with you today.

Dr. Joseph Mercola:

What are the updates since the last time we had this discussion? And what's new? You're actually in Mexico, which is a lot warmer than your normal rains in Minnesota [[crosstalk 00:01:04](#)]

Ronnie Cummins:

Organic Consumers Association, we're a family of organizations that include Regeneration International, and in Mexico, we have a research farm for Regeneration International and a staff of about 50 people down here, mainly young agronomists and young farm workers. And then we have an activist's office in Mexico City. We also have a research farm way up in northern Minnesota, but we don't do too much farming there in the middle of the winter, except in our deep winter greenhouse, which is pretty amazing where we are, growing green vegetables now, even though it's 20 below zero. But you have to have a specially designed greenhouse. There's very few of them right at this point. There's five of them in Minnesota, but have one of them at our OCA headquarters.

Dr. Joseph Mercola:

Is that very energy-intensive to keep the environment warm enough to support the plants?

Ronnie Cummins:

No, it's solar-powered, this deep winter greenhouse. It's solar-powered. The glass is pretty darn expensive, but it's very efficient. We have a backup natural gas heater in case it gets too cold at night in the greenhouse, but very rarely have we ever had to use that in the last five years. There is a way to grow green vegetables year-round, but it's going to need to – we have to stop prioritizing GMO (genetically modified organisms) soybeans and corn in the Midwest and start prioritizing food for real people if we're going to do that.

Ronnie Cummins:

Down here in Mexico it's a totally different situation where we're in a semi-desert area near San Miguel de Allende. Our research on regenerative and organic food here is focused on, "How can you grow a bunch of food and basically restore the environment when you don't have wells, you don't have rainfall eight months a year?" We get rain three or four months a year, and then we get no rain the rest of the year. It's necessary to use all these permaculture-type practices. We have these ponds where we catch millions of liters of water from the mountains. We have cisterns below all the buildings. We catch the water on the roofs and put it into the cisterns. We have composting toilets, recycled shower water, and we try to grow crops and trees that are adapted to low moisture.

Ronnie Cummins:

But we've hit on some techniques that Mercola has helped us publicize over the years, to use native desert plants, in our case agave, and the trees, the mesquite and musaceae, to basically re-green the desert and produce some fermented animal feed, silage, for livestock that's inexpensive and that really is healthy for the animals. I am excited. I've had to spend a lot of the last couple of years dealing with the COVID crisis and the disinformation that the government and the industry have put out, but I've been able to [crosstalk 00:04:53]-

Dr. Joseph Mercola:

We wrote a book last year. "The Truth About COVID-19," which was number one in the country.

Ronnie Cummins:

Yeah.

Dr. Joseph Mercola:

I got a question for you. How many inches of rain do you get down there in Mexico, where you're at San Miguel de Allende?

Ronnie Cummins:

In a good year we get 20 inches. The problem is that we get it in July, August, and September, and then you don't get maybe – we had one slight drizzle in January. The technique is, "How do you conserve as much water, how do you save as much water, and how do you grow crops year-round?"

Dr. Joseph Mercola:

How much of the water are you to save? How many millions of gallons do you capture and store?

Ronnie Cummins:

For this farm, we've got about 75 acres, so we are able to save 12 million liters, or 3 million gallons of water a year, which is, until recently, was adequate for what we were doing, but now we've geared up to produce a really exciting project, reforestation project, where we take the

limbs of healthy mesquite trees and – it's called air-layering. You can turn these limbs into full-blown trees. You cut through the bark on the limb, you add some natural hormones to this. You have a little bag that goes around the branch of the tree that is filled with compost, and then after three or four months on the tree, you can remove that branch and root it into – we root it either directly into the soil or into containers. You end up with a-

Ronnie Cummins:

Our 1-year old mesquite trees are as big as a 7-year old mesquite tree from a seed. It's a method that we're really excited about. People in the Southwestern U.S., Texas, and the Southwest, are very familiar with mesquite because there's so many of them. Texas, I believe, has 55 million acres, alone, of mesquite. The pods, they're like bean pods on the trees, and they're highly nutritious, actually. The flower, you can bake with it for human food, and animals love the pods as an animal feed.

Dr. Joseph Mercola:

When you're growing these mesquite trees and they're mature, do they help retain the water in the soil over time?

Ronnie Cummins:

Yes. The mesquite trees can – their roots, because they're a desert native tree, the roots go way down. They don't look as impressive above the ground the first 10 years of their life, but what they're doing below the ground is incredible. They have roots that can go down hundreds of feet, and they basically are the Internet below the soil that feeds all the other plants in the area, and they exchange the liquid carbon from the tree for the nutrients from the soil. The combo of the native agaves and these type of nitrogen-fixing trees is the real key to restoring the environment. Here, this was originally, 400 years ago, this was savanna. It had oak trees. It had lots of mesquite trees. It had a different climate. The timber was valuable, though. The Spaniards basically deforested much of Mexico over the years because for the silver mines they needed charcoal. Over in Europe, they loved the mesquite trees and the oak trees for building purposes, building ships, houses, and so on. Once you deforest it, large swaths of Mexico, just like the Southwestern U.S., it changed the climate.

Ronnie Cummins:

Now the native trees, they need human intervention to reforest. But if you can come up with a system, which we have, that rewards the small farmer or the rancher right away, in this case because they get low cost animal feed that's much cheaper than alfalfa or corn silage, you can get people to start adopting this. We've planted about 350,000 agave seedlings in the last two years, and we're seeing the popularity of this system now starting to spread.

Ronnie Cummins:

We're actually getting inquiries from all over the world now, including ranchers in Texas who would like to improve their pastures, and who would also like to improve their ecosystems in general.

Dr. Joseph Mercola:

The agave that you planted, 350,000 plants, was that all in San Miguel?

Ronnie Cummins:

All right around here on the farm and in these rural communities. There's billions of agaves growing wild across Mexico. It's just that most of them aren't being taken care of and used in a regenerative fashion. For example, Americans are very familiar with the drink, tequila. It's a booming alcoholic beverage. In one of the states of Mexico, Jalisco, which is where the city of Guadalajara is, you have 500 million blue agave plants growing for this tequila industry. The problem is that they're being grown as a monoculture. They cut down all the preexisting vegetation. They grow crop, these plants. And then when you do this kind of thing, they have to use chemical fertilizer. They use Roundup. They, basically, are degrading the landscape, rather than improving it.

Ronnie Cummins:

The way we're doing it is, it's organic and regenerative, biodynamic. It's preserving the biodiversity that's out there, but making use of the natural potential of the plants. And the big breakthrough for us was that these small farmers figured out that the leaves of the agave plant, which are huge biomass, one leaf on some of our plants can weight 40 to 80 pounds. But these were always discarded. For thousands of years they were considered junk. But when farmers learned that you can chop these up real finely, put them in a closed container, and ferment them, and then this turns this leaf into a very nutritious supplemental feed for animals. If you mix things in there like the pods from the mesquite tree, you actually get a feed that's far superior to alfalfa for about a third or a quarter of the price. Alfalfa uses, I think, 26 times more water than these native desert plants.

Dr. Joseph Mercola:

What type of animals can use this feed? Is it cows, chickens, goats? All of them?

Ronnie Cummins:

Yeah. Right now, cows, both beef cows that are grass-fed, are eating up to 20 kilos or 45 pounds a day of this silage, especially during the dry season. What we're finding is that it's really been beneficial for the animals. They're natural substances. It's a prebiotic, this agave, so it makes them get more nutrition from the grass that they consume. But cows, sheep, goats, our pigs and chickens are also eating this. And even our sheepsdogs that protect the sheep and the goats seem to like it.

Dr. Joseph Mercola:

But can they eat that exclusively or do they need to integrate regular vegetation?

Ronnie Cummins:

What we do is both. We both grass-feed and feed them this supplement. But if you add things into the fermented agave, like the pods of the mesquite, or we grow garbanzo beans because they take less water than pinto beans, you can produce something that animals could completely live on. We think it's a good idea to graze the animals, even in the dry season when there's not much vegetation, but graze them a lot less than has become the custom over the last 100 hundred years

because 60% of Mexico, like the Southwestern U.S., is semi-desert, arid, and it's been over-grazed. We need to get back to a regenerative grazing situation where you partly rest the land, you're reforesting it, you're using contours to help retain the rainwater.

Ronnie Cummins:

And it's a great regeneration process that we're going to have to see in the United States, in Mexico, Central America, all the different – 40% of the world is called arid or semi-arid, and it's in danger of reverting to outright desert where nothing will grow. But we can reverse this process using native plants and using some of the organic and permaculture techniques that modern organic farmers have developed over the last 50, 100 years.

Dr. Joseph Mercola:

When you put the mesquite pods in, are you fermenting those also, or is that something you do after the fermentation process?

Ronnie Cummins:

We do. Yeah. There's other-

Dr. Joseph Mercola:

Wait, so is it fermented or not?

Ronnie Cummins:

Yes. It ferments as well.

Dr. Joseph Mercola:

Okay, good. That's what I would think. By volume, what percentage of those are the pods that [inaudible 00:15:47] Maybe 10%, 20%?

Ronnie Cummins:

10% to 20% is a mixture we've been using. That brings the protein level up above alfalfa. We've got to quit growing alfalfa in the areas of the world that don't have sufficient water. Alfalfa is a great perennial if you have plenty of water and you're not draining the aquifer. But that's not the way it's being done. In Southern California, the giant dairy farms, the giant feed lots that are feeding alfalfa to the animals across the Southwest, these areas do not have the water availability to be doing this. We've got to stop doing this and start looking at the long-term water resources we have. We can bring more rain. That's what's amazing.

Ronnie Cummins:

There are some ranchers in Northern Mexico, in the Chihuahua Desert across the border essentially from Big Ben National Park in Texas, and because they have a million acres under rotational grazing, it's savory-type holistic management, they have actually been able to measure that they get about 15% to 20% more rainfall in this area of a million acres than the adjoining ranchers do in the Chihuahua Desert. You can literally bring back rain to a level that was traditionally there if you regenerate the landscape.

Ronnie Cummins:

And you do this not just with human ingenuity and stewardship, but the animals are totally necessary to speed up this process. We need the animals grazing in areas, even the semi-arid arid areas, but we don't them to over-graze, and we don't want to under-graze, and we need to use their natural behavior in conjunction with what we're doing to restore the environment. We can do that.

Ronnie Cummins:

The U.S. is going to have to do that. We've got 650 million acres that are about pasture and rains land in the U.S., which is, I think we've got less than 400 million acres of cropland. Most of the farmland in the U.S., people don't realize this, is essentially pasture land or rains land, but we're not managing the livestock in a way, or we're not supporting the ranchers in a way to regenerate the soil. Instead, we're still seeing degeneration of the soil.

Dr. Joseph Mercola:

It's somewhat surprising that the scenario is pervasive in the United States too. You would think it'd be more for arid countries like Mexico and other Third World countries, that would have this problem, but we certainly need it in the U.S. I'm wondering what type of strategies or collaborations you're developing to implement these approaches into their plan.

Ronnie Cummins:

I wrote a book called "Grassroots Rising" in 2020, where I tried to lay out a road map for transforming the U.S. through regenerative practices. I pointed out it's basically how do you finance farmers and ranchers changing the way they do things and moving to regenerative practices, to put more fertility into the soil, more carbon into the soil, more water retention into the soil, prevent the erosion and so on. Market demand is one of the factors that is driving regenerative farming and ranching in the U.S. There is a bigger demand for grass-fed, meat and animal products, than there was 10 years ago. And it's growing. But it's not growing fast enough. Basically, feedlots and factory farming still dominate.

Ronnie Cummins:

Another way to regenerate, another source of funding for this is government action, from the local to the federal level. We've seen a little bit of that, but basically, our government, USDA (U.S. Department of Agriculture) is still subsidizing degeneration, factory farms, chemical intensive agriculture, GMOs. But what's interesting lately is a development in the private sector and with private capital. The traditional image is that you got the tree huggers and the environmentalists over here, and then you have the evil corporations over here, or the fossil fuel companies, the timber companies, and so on. But recently, there is a percentage of people in the corporations who understand that we can't keep degenerating our environment and leave something decent for our kids and our grandkids.

Ronnie Cummins:

You have the development of this regenerative thinking on the part of some financiers, some corporations, and so on and so forth. I'm pretty excited about this, that there's a new type of asset

being developed on the stock exchange. The rules are being written up by the Securities and Exchange Commission. These are called Natural Asset Stocks, or Natural Asset Corporations.

Ronnie Cummins:

This is the type of stock different from anything we've seen up until now. The government of Costa Rica, for example, is putting all the lands that the government owns down there, the forests and the farmlands, they're incorporating it into a Natural Asset Corporation. What this is, is that if you're a manager of a pension fund, or an investor, or a corporation, you can invest in one of these natural assets, where you're not buying, you're not owing the land, you're not having a lien on any of the income that comes from this land. What you own are the ecosystem services that the land is providing.

Ronnie Cummins:

For example, you've got this system of agave and mesquite trees. We are incorporating now to where someone can own the environmental services. In other words, the amount of water that we're saving, the amount of carbon that we're sequestering, the amount of methane that our animals are releasing – they're releasing less when they eat this fermented silage. Instead of going to a corporation or a foundation and looking for a donation, what you do is you say, "Would you like to invest in a natural asset?" And then over time, as the forest matures, as the system matures, as you regenerate the soil, your asset is worth more money. If you choose to sell that asset, you can actually make money off of it. This is very appealing to Wall Street at this point. They're really worried about their reputation, as they should be, but they also are not going to change overnight what they're doing. But this is a way that they can pull some of their assets out of financial assets and put them into ecosystem assets, and still get a return on their money.

Ronnie Cummins:

But this is like organic certification. You can't just say that you're doing a benefit to the environment and then get people to invest in this benefit. You have to be able to prove it. We've developed a system of verification that is quite accurate scientifically. What it involves is you measure on the ground things like the numbers of plants, the size of the plants. You do soil analysis and so on. The traditional things you would look at. But then with modern technology, it's possible to fly a drone over the same area and take photographs. And then you compare your measurements on the ground with what the drone is seeing through their multiple cameras. And then you develop an algorithm and progressions to where you can then fly the drone over another area that you haven't measured on the ground, and you get the readings on how much carbon biomass is in the environment. You get a reading on other ecosystem services.

Ronnie Cummins:

We have to be – and we're using blockchain technology that will verify all these different calculations, to where there's not going to be a way to very easily cheat on this. If someone invests in a natural asset, you're going to be able to verify several years down the road, at a very low cost, that the asset has improved, or it has degenerated.

Dr. Joseph Mercola:

Is OCA going to these Wall Street firms and educating them on this investment opportunity to catalyze this regeneration process?

Ronnie Cummins:

They came up with this idea partly on their own, because ... Everyone's heard this. Carbon credits and carbon trading, emissions trading have gotten a terrible reputation, and deservedly so, because most of them are just corporate greenwashing. Most of them don't really result in improving the environment or drawing down carbon. But it's just like, what if – organic agriculture and biodynamic agriculture are really a good idea, obviously. More nutritious food, better for the environment, better for stabilizing the climate and so on. But what if all the organic certifiers in the world were totally corrupt and you couldn't believe in any claims in the marketplace because you didn't have a system of certification that was valid and that was verifiable? That's the situation now with so-called carbon credits and ecosystem restoration.

Ronnie Cummins:

But there are a group of us who are determined to use the technology that's at hand to have a system of regenerative practices that are verifiable. We know if you add fertility to the soil, carbon organic matter and so on, that you turn the ground into something more like a sponge instead of a tabletop. We know how much water you can retain in the environment, in the ground water, instead of it eroding off, or flowing off. We know how important it is – photosynthesis is the key to putting more carbon back where it belongs in the trees and plants and grasses and soil, where it used to be, instead of too much in the atmosphere.

Ronnie Cummins:

But we have to build to certify and guarantee these. We can't be paying people, which is happening over the world right now. Governments are taking money, saying they're going to reforest. They go through these intermediaries who sluff off a lot of the money. When you look at what's happening on the ground, 95% of reforestation projects don't result in reforestation. We can correct that with some of these modern technologies in combination with what we're already doing. Blockchain and drones, the artificial intelligence of drones, even though I don't like some of the aspects of artificial intelligence, this is one that will be really valuable. We need to be able to determine the state of the environment at a more detailed level than satellite photography can tell us right now.

Ronnie Cummins:

With drones, we fly a drone – we've got a \$10,000 drone here that is really different from most of the drones people have seen, but it has three different cameras in it. If you fly it, we fly it 50 meters over an area. It'll count the number of agaves. It'll count the number of trees. And if you program it to what you've learned on the ground, you don't even have to do on the ground experiments. That's what we're looking at.

Ronnie Cummins:

We went to all these, essentially, they call themselves carbon registries. They're ecosystem certifiers around the world. We went to all of them, the major ones that exist, and we told them about this agave, the potential of agave. It's one of the 15 plants in the world with the highest

level of photosynthesis, and it can draw down a heck of a lot of carbon and produce a heck of a lot of biomass, even in harsh conditions. They do their photosynthesis at night, these plants. That's one reason why they're really different from other plants.

Ronnie Cummins:

But what we found was they don't know whether to call an agave. Is an agave a tree? Is it a perennial? It's certainly not an annual. It wasn't classified in these registries. We've managed now to convince them that, "Look, here's our lab results. The amount of carbon in each plant. There's a way to do this in a regenerative way." We've convinced several of them that this is an interesting way, and now we're proceeding to prove the concept.

Ronnie Cummins:

Every day, technology is getting better, and this blockchain accounting system, which enables you to put a lot of different factors into an ecosystem service, is going to be a key part of this. When people say, "Are you really greening the desert? Are you really restoring the environment? Are you conserving water?" Are you producing important food for animals and humans?" You'll be able to prove it one package. There's \$125 trillion, apparently, out there invested in financial assets. Most of this is degenerating the planet. But there's \$125 trillion worth of natural assets that are not valued right now.

Ronnie Cummins:

What we believe is that approximately 1% of the financiers and the corporate money managers and pension managers right now are quite concerned about the environment, the same way we are, and are ready to start moving a portion of their assets. We only need to move 1% in the next decade to get the ball rolling. The benefits of regenerative food and farming are far beyond even just the ecosystem benefits. As we've seen during the pandemic, sales of organic food have grown substantially. Sales of dietary supplements have grown substantially. A lot of people have learned how to – the joys of cooking at home again, instead of going out to restaurants. We've got a potential market demand. We just need to get the ball rolling.

Ronnie Cummins:

Believe it or not, corporate managers and financial managers are going to help us do this, as we move forward. And these Natural Asset Corporations, which aren't – they're not registered yet on Wall Street, but they will be soon, and investors will have the opportunity to move part of their assets away from just strictly financial assets into natural assets, so that – the first country in the world that's announced they're going to do this on a major scale is Costa Rica. What you will be able to do as an investor, say you're an airline that has a lot of greenhouse gas emissions, and in Europe, an airline has to buy carbon credits to offset some of their emissions. Instead of some bogus reforestation program that doesn't really reforest, some of these airlines are going to invest in Costa Rica, in reforestation and regenerative agricultural projects that are verified and certified. That's the way it will roll out.

Ronnie Cummins:

If government can't get itself together, we work with local government and a little bit with the state governments here in Mexico, but we haven't gotten any action in the federal government.

But if governments want change from subsidizing degeneration to regeneration quickly enough, we need the private sector. And there's plenty of money out there to regenerate the Earth. We just needed to have a system where you can actually benefit from it, not only in PR terms, public relations, but actually you can make money off saving the Earth if you have a proper regenerative system to invest in.

Ronnie Cummins:

There's 570-

Dr. Joseph Mercola:

[crosstalk 00:36:00]

Ronnie Cummins:

-million farms across the earth. Three billion people are farmers or rural villagers. But most of them, they don't have the capital, they don't have the money to change the way they're doing things and do it right. But if you give them the capital, the overhead cost for doing this, a lot of them are ready to go right now as we're seeing.

Dr. Joseph Mercola:

Then, they would get the overhead costs from these investment strategies? Is that the plan?

Ronnie Cummins:

Yes.

Dr. Joseph Mercola:

What is the role that OCA is playing in this to facilitate this whole strategy here?

Ronnie Cummins:

Our role – you basically need some intermediaries in this process who can train the farmers on how to do this. We have training sessions all the time. People come in to the farm. They see what they're doing with the agave and the mesquite. They go back to their home communities and they try to find the resources. We believe you need to set up a model right here. When people come here and they've never seen a sheep or a goat or a cow eat fermented silage, you can explain it all you want to over a Zoom call and over the telephone, and if you give a talk, but seeing is believing. When they see our livestock gobbling up something that they thought was garbage, was just something to be thrown out, the leaves of the agaves, they sit up and take up notice. When they notice that our animals are fatter and healthier than other animals in the area during the dry season, especially, they take notice.

Ronnie Cummins:

The [inaudible 00:37:56] system, which is this system of taking limbs off of mature mesquite trees and turning them into saplings, this was never done except by one professor at a university a few hours from here, who recently passed away. But thank goodness some of his students and some of the professors at the university retained that knowledge. We're putting it into practice.

Ronnie Cummins:

But our role is training, educating, publicizing. This whole system of agave agroforestry, only one farm that we've been able to find has been practicing this in Mexico over the last 12 years. They happened to come to a workshop on how to make organic compost here, and they told me about it. They said, "Ronnie, have you ever heard of fermenting the leaves of these giant agaves, and animals love them and they're cheap, and so on?" I said, "No." We went out to their farm. They had been doing this for 12 years and no one had ever heard about it because they didn't have websites, they didn't have newsletters, they didn't have a global network like Regeneration International to talk about these things. Our job is to identify the best practices of regeneration, highlight them or publicize them, and then work to see if we can't get financing to scale these up. That's what we're [crosstalk 00:39:34]

Dr. Joseph Mercola:

You mentioned Regeneration International. Can you get more specific on what that organization is and how long it's been around?

Ronnie Cummins:

Yes. We formed in 2014. It was actually Mercola and OCA that incorporated Regeneration International. We incorporated it in Minnesota. The idea was that we were going to – we attracted a bunch of very well-known organic pioneers and practitioners, like Vandana Shiva is on the steering committee. André Leu is our international director who is head of the IFOAM, the International Federation of Organic Ag Movements before. We got Rodale Institute. We got all these savory grazers and biodynamic farmers involved. At this point, we've never raised a whole lot of money for RI up until the present time. Thank you, Dr. Mercola for being one of the few who's supported us.

Ronnie Cummins:

But we have developed a global network. We have a regenerative farm map that's pretty interesting, especially for the U.S., where it lists all the regenerative farmers and ranchers across the country. We've developed a network of 400 affiliates in 60 countries who have applied to be affiliates, who are all doing regenerative work. What we realize now-

Ronnie Cummins:

In 2014 when we first set up at the Climate March in New York City, what we said is, "Look, we got to change the global discussion on regenerative agriculture and climate." Climate activists aren't talking about agriculture, and organic proponents aren't talking about climate and ecosystem services. We feel that after seven years, we have changed the global conversation. Everyone, nearly, has heard about regenerative food and farming at this point. There's a lot of people thinking of adapting it and so on.

Ronnie Cummins:

But the second stage is you have to look around the world, look around, in the case of the U.S., look around at all 50 states, all 3,200 counties in the U.S., what are the best practices that are out there right now? Where are the Gabe Browns and so on, across the country, and what are they doing? Once you've identified the best practices, the next task is publicize them so that they

become better-known. Someone like Will Harris from Georgia, who I know I visited with you, with the Mercola team before, as we're getting well-known.

Ronnie Cummins:

But the bottom line it finally comes down to is, “Can we scale up these practices and make them the norm, eventually, instead of just the alternative?” And if we're going to scale them up, the 800-pound gorilla in the room is money. Farmers don't have the money, for the most part, to make the changes that will be appreciated in the marketplace. But that's what we're working on.

Ronnie Cummins:

As we started recruiting into Regeneration International, some allies who had experience in the banking sector, people who had – they made their money on Wall Street, or they made their money in transnational corporations, but you reach a point, they told me, where once you have enough money, you start thinking about some other things. And there are, believe it or not, there's a lot of bankers and pension fund managers, there's a lot of corporate executives right now who are trying to figure out, “How can we work together?” Environmentalists, farmers, ranchers, investors, public policy people.

Ronnie Cummins:

Since the government seems to be – governments across the world seem to be lagging behind at this point, and still caught up in special interest, still caught up in politics as usual, business as usual, we're excited to see the financial sector starting to move. Some people are going to use these Natural Asset Stocks and Natural Asset Corporations just to greenwash themselves. There's going to be some fraud, just like there is in organic. But we also have the potential for a system that really works, that's really verifiable. We've got these new developments like blockchain that can conceivably be better than the type of organic certification we've had until now, because they can have more factors in their soil health, water usage, biodiversity, the wildlife survival, changing the climate, that can be verifiable. I'm very excited about the future here.

Dr. Joseph Mercola:

What have you done so far and what does the future hold, and what's the plan to implement it?

Ronnie Cummins:

We have started working with some of these global certifiers of regeneration. They call themselves carbon registries. We found that they're open to what we're talking about. They're used to dealing with systems. They want much bigger systems of land to certify than a bunch of small farmers together, until now. Like I said, they don't understand some of the plants in semi-arid areas of the world, but we're making headway. We found that there's a carbon registry out of Houston, Texas called B, as in the letter, BCarbon. We found that these folks are very interested in correcting the mistakes of carbon offsets and carbon emissions trading.

Ronnie Cummins:

They're a nonprofit. They have members of the oil industry on their board, but they don't like the fact that carbon credits have gotten a bad name, and justifiably so, because there's not a system out there. It's just like in the organic movement, we're trying to tell people there's certain type of

certification of organic, like biodynamic that are better at this point. But we don't want to throw out the whole idea of organic simply because there's people cheating and there's governments that are allowing this cheating. What we want to do is make it better.

Ronnie Cummins:

When a product says it's organic on the label, it really should be. Some of these new techniques like blockchain are going to help us do this, where you can go – like all of us, you go to a restaurant and you see salmon on the menu and you ask them, "Hey, is this farmed salmon or is this wild salmon?" And it would really be nice to be able to know before you even went in there.

Dr. Joseph Mercola:

That's a big challenge. I recall a few years ago, I was speaking at an event with Dr. Klinghardt. We went out to dinner afterwards with the other speakers. On the menu was organic salmon, so I said, "That's interesting." I asked the waiter, "What is this organic salmon?" Ostensibly the healthiest item on the menu. It turns out it was farm-raised Atlantic salmon. But there is no regulatory agency or penalties for lying on a menu, which is one of the comments you made earlier was the direction of having people cook more in their home, which I think is a very healthy process, because it's the rare restaurant that has healthy food. Yours was one of the only ones I was ever at where it was unbelievable. Unfortunately, it's not open now because of [inaudible 00:48:33]

Ronnie Cummins:

We moved it here. It's right down-

Dr. Joseph Mercola:

It's there now? You did? Okay, good.

Ronnie Cummins:

[crosstalk 00:48:37]

Dr. Joseph Mercola:

That was actually one of my favorite restaurants ever. It was phenomenal. It wasn't fancy or anything, but the food was the highest quality.

Ronnie Cummins:

Yes. We believe that, let's use our intelligence. There's some technology out there that we can use to our advantage, and we can guarantee that when something says organic, it's more nutritious. When something says organic, the animals were raised in a regenerative way, it was not raised as a monoculture and so on and so forth. I think we're going to see another level of certification. We already have it to some extent now. Regenerative and organic certification. But the problem is it's too expensive for most small farmers and most ranchers to be able to obtain this type of certification. [crosstalk 00:49:32]

Dr. Joseph Mercola:

Are you referring to the regenerative certification?

Ronnie Cummins:

Yeah.

Dr. Joseph Mercola:

Or organic or both?

Ronnie Cummins:

Both. There's a higher level, sort of like biodynamic certification. There's ROC, regenerative organic certification now. But the problem is, if you're a small farmer-

Dr. Joseph Mercola:

You can't afford it.

Ronnie Cummins:

-to get that type of certification, you can't afford to do it. It has to be partly subsidized, but just simpler. If you can fly a drone over the farm and it can tell you how much above ground biomass and carbon there is, and it can tell you the organic material in the soil, that's a heck of a lot cheaper. And you can't-

Dr. Joseph Mercola:

But that's not certifying if they're using chemical fertilizers or pesticides.

Ronnie Cummins:

Oh, yeah. We don't have one of those drones yet, but I'm told that some of the very latest models here can detect amazing things in the soil.

Dr. Joseph Mercola:

I can imagine it's not the actual drone itself, but the sensors that are attaching to it, like the cameras with specific sensors that can detect those things.

Ronnie Cummins:

Yep. But none of this would matter if there weren't – the public, basically, what we've done over the last 30, 40 years in terms of public education, with certainly Mercola leading the way, is that everyday people now understand that organic, biodynamic, regenerative food is better for your health. Whether they can afford to buy it all the time is another matter. But we have educated the public to want better food. We've also educated the public to realize that farming does have a big impact on the environment. And if you care about clean water, for example, you better care about regenerative agriculture. If you care about animals, you better care about how factory farming is an abomination, and so on. We've created, I believe the potential market demand. We simply have to have the products available, and we have to stop these governments from subsidizing degenerate food and farming. The market has the potential to correct a lot of the problems out there if we'll work together to do that.

Dr. Joseph Mercola:

That's right. Which is what we're doing. The primary reason we're doing this interview today is to support regenerative agriculture and request your specific support, because I am certainly matching the funds that you're raising. But I'm sure people are curious to know what supporting this regenerative agriculture movement will look like, and what their funds would be directed towards. If you can expand on that, it would be great.

Ronnie Cummins:

Yeah. The real lack – most groups in the world that care about regenerative food and farming are strapped for cash. Literally, being able to pay their staff. For example, here we've got 50 people at this research farm in Mexico. Most of them are either graduate students from the agronomy schools that live here. We put them up. We provide housing. We pay them a wage. But it costs money to do this, and it costs money to the school buses that come in with the kids on them, and the small farmers who come in to see what we're doing. This is what we use our money for.

Ronnie Cummins:

OCA, in the U.S., we have always tried to be an international organization as well, and so part of the money we raise goes to our – we have one-staff person in Africa. We've got one in Southern France. We've got one in Australia. We've got one in Argentina. We don't have a lot of money for these overseas salaries, but we do have some. That's what we use it for.

Ronnie Cummins:

I spend half my time exposing the bad stuff. The pandemic for the last two years has been a major thing that we've had to write about, but we also – I have spend half my time on the positive solutions. You get frustrated after 50 years in the organic movement of asking the government to please stop allowing cheating of standards. Lo and behold, we're getting to the point where we're going to be able to measure a lot of these things scientifically and verify them. If USDA organic seal isn't enough, we'll have another seal that you can get behind.

Ronnie Cummins:

This day and age, you can know where each piece of meat came from, each fish, each vegetable, and so on and so forth. That's what we're going to have to move to, is there's nothing with organic, but we need organic standards that are truthful. Labeling – we have unfinished business in the U.S. because the government's special interests have blocked mandatory labeling of GMOs. They're not requiring labels on nanotechnology. They're lying about pesticide residues, and so on and so forth. We have to keep fighting that battle for truthful labeling and transparency, but we also – thank goodness, we're at a point where we're going to be able to have a better method, not only of farming, but of proving that this better method is being employed.

Dr. Joseph Mercola:

All right. That's terrific. You're doing great work there, because we know if you want to take control of your health, you have to have healthy food. It's probably the single most important element of the equation, and make the right choices, and staying away from these vegetable, these seed oils. Even though they're not GMO, even though you eat non-GMO seed oils like corn, soy, safflower, canola, it doesn't matter. They're really intrinsically bad for you. You want

to have not only high quality food, but food that's raised with regenerative components. You're doing a great work there to make sure that processes are facilitated. It's really intriguing that you're reaching out to the financial sector to take advantage and leverage that, to direct some of their funds into these projects. It's really exciting.

Dr. Joseph Mercola:

That's what we're seeking to help with your support, to get behind this and help make this regenerative agriculture movement more effective and pervasive and widespread, so that we can have the healthiest foods possible, and mitigate some of this environmental damage. Thank you for everything you're doing, Ronnie.

Ronnie Cummins:

Thank you.