



Season 6 Episode 16 — Alabama Crops Team’s Brazil Recap

September 18, 2026

Announcer:

The Alabama Crops Report Podcast, your trusted information source for Alabama agriculture.

Eros Francisco

Yes. So this is going to be a fun podcast. Not technical. One can be technical, but just an impression of our trip to Brazil early in March. Last month. Me. David. Doctor Brown and Chandler, we went down to Brazil with some farmers from Alabama. And we visited a lot of different fields down there. So we started the week visiting sugar cane, citrus, and then we moved up to state and we saw cotton, corn, soybeans harvest.

Eros Francisco

Then we went to the Mato Gorso state and we visited Mag operations, giant fields, but also small farmers and how they are dealing with all the farming challenges that we are dealing today. And and commodity prices and high inputs and all that, and how they are struggling to survive in that environment. So the idea was just to bring these impressions to, to you, listener and, and share with you.

Eros Francisco

Perhaps we can, bring some information or some comments that may be useful to you in your reality. So just to kick off the conversation here, I would like to see, your impressions from Brazil the first time you went right. So, Doctor Brown and David.

Steve Brown

Yeah. It's very obvious. That Brazilian agriculture crop production in Brazil is massive and very intense. We saw that in sugar cane. We saw it in cotton. We saw it in corn and soybeans. It was it was eye opening to see just the vastness of the fields. And I even get got a chuckle that up to the pavement of the roads at times they planted soybeans within about a foot, so they right away production as well.

Steve Brown

So everything was massive and very, very intense.

Eros Francisco

Do you have anything that pop out like impressing you or.

Steve Brown

Well, one thing that was, I don't know that I expected. We landed in Sao Paulo and then we went to Brasilia, and I probably can't say the other names properly, but we saw some metropolitan areas that were absolutely huge. And, and then we get out into the, to the rural areas if we could say that. And then the agriculture is massive.

Steve Brown

One thing I had heard, but I thought was being solved and maybe it is being solved, they still have some infrastructure challenges for bringing materials from ports to the farmer, and taking the farmers products to the ports to where they're going to export. So that was a little surprising to me and a hurdle that they have. And one of the other hurdles I saw was, again, I said, I used the word intense.

Steve Brown

They're pouring it on when we talk about fertilizer, when we talk about pest control, they have a lot of issues because it's year round production. And so all that creates a lot of challenges for them. And again, I'm of miles from home. But I said how is this sustainable given the current commodity prices. And at the end, I want to share one last comment I had at our very, very, very last stop at the leather goods store.

Steve Brown

I've talked to a farmer there, but I'll save that.

Eros Francisco

Yeah. Hold that for the last just to give the listeners a impression or perspective. You said year round production, right. So just to bring it to context. We are talking about start planting soybeans in September, followed by corn as maize, corn as a second crop or even cotton as a second crop, planted in January, February and taken to August or even September to harvest cotton.

Eros Francisco

Again. So we are talking about no winter nesting anything. It's a green bridge. From soybean to corn to cotton. So all the pests, all diseases. Everything is there. So there's no to break down the cycle. So that's the challenge that they face in under tropical conditions. Now David, go ahead. Doctor.

Steve Brown

We saw soybean harvest in a big way. I'll probably eight combines running in one field. As many trucks as they could move in and out. We saw soybeans being harvested. We saw soybeans in the 4 or 5 leaf stage. And we saw cotton in the 4 or 5. These stage all the way to maybe knee high and corn just being planted.

Steve Brown

All of it was all at the same time. That was shocking.

Eros Francisco

How about you, David? Did you bring anything back?

David Russell

I would just echo, you know, Steve's comment about the sheer scale of agriculture in general. You know, as a Mississippi native, you know, I grew up seeing the Mississippi Delta, you know, so that size operation, you know, wasn't surprising to me, but to stand in a location and not see any fence line or field edge or, you know, fence row or wood line edge for as long as you could see or even ride down the road several miles and still not see any woods.

David Russell

But it'd be nothing but cotton corner soybean fields for miles. That was pretty eye opening. And just the sheer, the sheer scale and just the what impressed me was when we meet with these growers and even private industry, just they've got in their production operation, they've got the global market mindset and what they're growing and what they're doing on the farm.

David Russell

They're not in a closed loop. You know, they've got this global mindset of where their crops are going, what ports they're delivering to and where that's going globally. I mean, as we talk in the US about, our biggest commodities and imports and exports, you know, Brazil is always a big player there. But to see that firsthand as we visit individual farms.

David Russell

Both private and in large scale operations. That was that was neat to see. The food was fantastic. I it goes without saying. Really appreciated the meals even at the breakfast. You know, that beat any of the best Holiday Inns around here, hands down. No matter where we stay. We ate really well.

David Russell

Thanks. Eros, turning us on to some good spots.

Eros Francisco

So I bought you a Chandler because I know you were married to a Brazilian and you have been to Brazil before, but you have never been to Mato Grosso, so I guess. Right. So that was the first time.

Chandler Gruener

Yeah. So that's the difference for me, is like, I've been San Paolo for three months once doing an internship during my PhD. And so I kind of learned a lot about the agriculture down there. And, you know, it's a little bit different from San Paolo moving up to Mato Grosso and Goiás; they're two different states up there.

Chandler Gruener

They're kind of like the frontier of a lot of the agriculture in Brazil. And so it's kind of like the forefront. And that's kind of one of the takeaways that, you know, maybe I didn't really think about is how large, like they mentioned, like the fields just get even bigger up there. And it's kind of like reminds me of when we go out west, when we start going to North Dakota and South Dakota kind of operations, very huge.

Chandler Gruener

No fence rows like fields as far as the eye can see. So that's kind of a change you don't really think about. And then also the fact that when you get into that native vegetation, the requirement for native vegetation and kind of understanding it and then what native vegetation means from there, a lot of times we think of Brazil, we don't think about they have savannas.

Chandler Gruener

So when we're up in Mato Grosso state and a lot of the state, we were areas we were visiting, it's like a savanna region where it's, you know, some trees and some grasses, and they have that native, you know, 20, 30% of the farm in that area. And so it's kind of cool to see that in the area.

Chandler Gruener

And then we've seen these little footprints. I didn't know what these footprints were. We were walking around and I was like, man, all of a sudden we seen these birds. I didn't know emus lived in Brazil. And so that was one thing that was kind of new, and it kind of take away from me. It was kind of cool to see, but apparently don't really bother the plants.

Chandler Gruener

They're just out there eating insects. So it's kind of a not really a pest, just this thing that's wandering around out there.

Steve Brown

I didn't see Doug, though.

Eros Francisco

Yeah. So, let me go a little bit into technical details just to, get your impressions on this. Doctor Brown, as a former cotton specialist for Auburn University, we saw a lot of cotton fields over there. And they are they are building a different plant. Right. Can you comment on that?

Steve Brown

Well, we didn't see anything close to harvest, and that's one of the things I had expected to see, you know, going down in March and there six months difference. Well they're not six months difference. They're not on the same calendars. We are. You talked about that while ago. I, saw fields almost devoid of insects, but I know they've been sprayed aggressively.

Steve Brown

Some of the earliest, some of the first fields we went into, I saw some white flies there because I again, I believe they've been very aggressive in terms of insect management. When you do that, when you fight this and that, you can create some issues such as whiteflies, spider mites and so forth may not be the white fly that we deal with here in the US.

Steve Brown

But there it was. But fruit retention was extremely high. I we there was one field that had significant square loss, but everything else the square retention was near 95 plus percent. So one thing I never got straight is, is what Brazilian farmers, what they talked about in terms of, you know, they talked about bags or is that right.

Eros Francisco

Is that that's for grains okay. Yes. Six Kilo bags okay.

Steve Brown

Okay. Well I also we tried to translate that into cotton yields. And I never got exactly calibrated. But from what I understood their cotton eels were extremely good. Yeah I would say they're corn heels were fair at best. Their sole being used were okay but not spectacular. But cotton their yields were spectacular I don't know, are they telling us on a per year basis or a per crop basis.

Eros Francisco

If it is cotton is per crop okay. Okay. Which is per year. Yeah. And I can't translate a little bit of the cotton yield. I if I recall correctly, we were seeing like 3000 pounds or 2500 pounds.

Steve Brown

I was thinking it was number 22, 2200, 2300. That's exceptional. That's really strong. Very, very good. No question.

Eros Francisco

About what? About the plant population. Remember their planting more.

Steve Brown

They told us some numbers; I thought they were. They ever estimated them a little bit. They were probably they thought they were in their 40,000 range. I think they were a little lower than that. I think they were in the 30, 30 to 35, maybe 35 was where they were plants per acre, not a per hectare.

Eros Francisco

But remember that they want that plant to hold a 13, 15 bowls each different than here. Yes.

Steve Brown

They, do contend with the bow weevil. And I think we heard correctly, they are as we used to be, very aggressive. They have to be aggressive to fight the but we will. So they're spraying at least 15 times per acre. And that's one of the points I big picture points that I came in with. They from a weed management standpoint, from an insect management standpoint, they've got to be very, very concerned about resistance because they're doing so much so often.

Steve Brown

And it's year round exposure to a different pesticide product. So resistance has got to be something big in their future.

Eros Francisco

Well, you remember that one of the stops we had, the farmer mentioned that he had sprayed 8-6 times to control corn worms because the BT technology is not working anymore.

Steve Brown

Yeah, they've lost the BT technology for worm control. But we went to your friends farm and we saw corn in the 1 to 2 leaf stage, and he had sprayed it twice for stink bugs. And that again, that was shocking to me.

Eros Francisco

So what about, weed perspective? David, you just see anything that is different from here?

David Russell

Well, beside the sheer scale, they still have the same we problems that we faced. So that was kind of eye opening. Goose grass and pigweed. I don't know if you're going to ask me for a Portuguese name later, but Pat and Pat. Galena is that goose grass paddy.

Eros Francisco

Gallina.

David Russell

All right. I was close enough. Goose grass. Yeah. So we fight that all the time here and there seeing resistance. Steve, to your point. They're between crops. And another surprising point was that they lost the use of paraquat, I think three years ago because of federal regulations. And so they don't have that tool anymore to reset the crop, if you will.

David Russell

You know, between crops with such a long growing season, they can't start clean. And so they relying on those other nonselective namely glyphosate. So overuse of glyphosate and glyphosate tolerant crops, you know, obviously are going to have problems there. And so that was pretty eye opening to see that those two big high profile weeds are there as well.

Steve Brown

Didn't we also see tropical spider wart.

David Russell

Yeah we did. Yep. Yep. That's a big one. Federal noxious weed here they.

Eros Francisco

Chandler, you remember we visited the last farm that we visited was intercropping livestock with rural crops. Right. And the benefit of that in the soil management and the soil fertility and the carbon sequestration, all of that. So how did you see that?

Chandler Gruener

Yeah, that was interesting to see that last stop there, because they would have livestock. And so just for perspective of the cycles, they would have livestock going across. And they have like a signal grass or something for it to graze on. And then after that they could rotate into a soybean crop and stuff. And it was pretty hilly hillside there.

Chandler Gruener

And I was like, man, that's intense to get a combine up and down. But they were managing to do so. So it's kind of interesting because they're able to, you know, as that soybeans, you know, they harvested off and then they put the signal grass back out there. And then they go into a couple of years before they'll go back to that soybean again.

Chandler Gruener

And then cows are sitting there eating their depositing back down the manures and stuff like that and keeping a lot of that nutrients in the soil. And that was something that was pretty common theme throughout is like in that couple of months, they would have off no matter what the farm was, they would have for a couple months or a couple of years, whatever time that soil wasn't, you know, being used by a crop, they would actually go out there and put a cover crop like a sun.

Chandler Gruener

Hemp was a pretty common one. We'd see we'd see some other grains and stuff like that. So they were covering their soils to avoid the erosion. Because erosion is a big issue down there. That can be a problem. Also creates a green bridge, but it also it's a necessary thing to them to keep that soil in place and to help protect it.

Chandler Gruener

But yeah, the utilization of that livestock really helped, you know, cycle the soil and actually improve the soil over time. And they're probably helping their yields a lot of times because they're able to reduce down the fertilizers and stuff like that.

Eros Francisco

And do you see any potential for that kind of system here in Alabama.

Chandler Gruener

So the thing down there is I kind of some of the challenges I see here in Alabama would be we don't have a lot of the fence rows we used to have down there. They still have some of the fence rows. And then as we've seen some of the farms there, they had, you know, the cowboys riding the horses going around and actually making sure the cows are kind of staying in the area they're supposed to be here.

Chandler Gruener

The reality of it probably looks more like the radio collars and stuff like that. And how's that? Technology is becoming more and more available and a little bit more affordable here in the US. I see that as probably the integrative stuff for here in the US is using the radio collars, setting the fences up to rotationally graze that way instead of using cowboys to move them across the field.

Chandler Gruener

But it wasn't neat to see the cowboys actually working the cows and actually moving them.

David Russell

Yeah, I like that concept. The rotation between grain crops and, forages. You know, just consider the markets now where grain prices are basically through the floor, where beef prices are super high and all time high. And so being able to have the infrastructure to utilize that is big. And I, I would love to see that start to take a foothold here.

David Russell

But as you said, it's the infrastructure that I think we need more than anything else to integrate those two.

Steve Brown

I liked how the Brazilian farmer, the cattle ranch that we went to, how they used their fencing, they didn't use barbed wire. They were using, what do you call it? Hardwire. Straight.

Eros Francisco

Yeah. Straight. Hard. Yeah.

Steve Brown

And it was drilled through the post. It wasn't stapled on that. That was very interesting. I thought.

Eros Francisco

Yeah, that's how they do it.

David Russell

Although I would be hesitant, you know, thinking about the grass they were using the area that is a signal grass. So for any of you listening that's familiar with broadleaf signal grass or any subspecies of those grasses, that's what they're using. But a lot of biomass and pretty good forage quality potential out of that. I just I've seen that too many times as a weed here.

David Russell

I don't know how it's not a weed in subsequent crops there. Just like the Italian ryegrass topic that we're always harping on here. You know, I wouldn't recommend us or our growers use ryegrass as a cover crop if they're planning on going to corn or soybean next year, but they're making it work in their system, using cattle to graze it out, or maybe chemical termination to reset that field for a new crop.

David Russell

It's pretty fast.

Eros Francisco

Round up is still working.

David Russell

Yeah. Yeah it is.

Steve Brown

I know a fence and you may want to cut this off.

Eros Francisco

Don't worry.

Steve Brown

I thought that particular farmer was a cattle farmer who also grew soybeans on the side. The other folks we saw, they were crop farmers. But this guy was a cattle farmer first. And he grew the soybeans as well.

Eros Francisco

That's correct.

Steve Brown

Okay.

Chandler Gruener

But yeah, another like management thing that we've seen, kind of like the intensive management we're talking about is like the use of biologicals and stuff like that. There's a high, high use of biologicals down there, not only from, you know, nematode fighting agents to, you know, nutrients and stuff like that. We're talking about intensive pest management. A lot of times in that tank or in other tanks, they're mixing in them biologicals for different items.

Chandler Gruener

And so that high use of that, high adoption of that, and that's kind of something that we see a little bit different here. I'm sure a lot of the fertilizer sides, driven by the ease of movement of that's a little bit easier, it's a little bit smaller quantities because the fertilizer, they got to truck it in. So when we got to Mato Grosso.

Chandler Gruener

You're a long way from an ocean. So they're trucking it in. There's not rail car. It's all that semis. And so that's a lot of cost. You know just like in the US when we have high high movement of traffic. You know I was in North Dakota for a little while. We use the rail. And the rail made it affordable.

Chandler Gruener

But they don't have that rail to make it. If they had to pay for trucking, it'd be very expensive, very hard to grow a crop. And so they're able to, you know, take advantage of them biologicals to get the most other fertilizer and also help take up as much nutrients as possible, then also fight some of these pests, like we're talking about through like the amount of sides and stuff like that that are biological products.

Chandler Gruener

And I think that's a area I see here in the US that, you know, it's growing, expanding. We're learning a lot, but I see them as really advancing it and being one of the forefront of it.

Eros Francisco

Well, in the final comment I would bring up is, they are struggling as well, right? So every farmer nowadays is struggling with commodity prices and the cost of inputs. So it's not a different world. It's a different world. Regarding weather and soil and past conditions, but basically the same price. So everyone is struggling to make a living out of farming.

Eros Francisco

So we've got to be very efficient on what you do and how you do it. But anyways. I don't want to be too specific on, on agronomic, information, but go ahead, Doctor Brown.

Steve Brown

At our last stop, we were. You don't want me to talk about that?

Eros Francisco

This is a fun fact.

Steve Brown

This is a fact that just what you said.

Eros Francisco

Okay.

Steve Brown

Our group was buying leather goods because Brazil is famous for their leather. And there was a young man holding his baby, and his wife was buying stuff. Well, he and he recognized we were Americans. And he had he was a Brazilian farmer. He was probably maybe tenors age, maybe 30 ish, early 30s at the most. And he said he said, he said he was a farmer.

Steve Brown

And he told me his headquarters was about six miles away. We were in a big metro area. I can't remember the city, but then they had other locations. But I said, how do you know, we're under tremendous. Our farmers are under tremendous pressure. And he said, well, this past year was a was a break even year for us too.

Steve Brown

So he kind of that that was a a amen to what you said about it's a challenge there too with current commodity prices.

Eros Francisco

Yeah. That's right. Everybody is making a having a hard time to make a living. Okay, enough with the technique of the tour. Let's go to a fun fact. Okay, so what was the fun fact?

Steve Brown

Well, I got one other thing I have to say. You can cut me out if you want to. We visited two week, visited some large corporate farms, and they were very eager to portray themselves as stewards of the environment. And they were demonstrating good stewardship and their practices and their labor use. They were very upfront and vocal about that.

Steve Brown

And to us and I'm sure to their investment public.

Eros Francisco

Well, I'm going to make a comment on, on this and perhaps we can cut this part when I call for the fun facts and leave for later. Okay. So Brazil has a very strict, environmental regulations and nobody is aware of that. So farmers are dealing with a very strict regulation. And Chandler mentioned that in the beginning.

Eros Francisco

Depending on where you are in the country, you need to leave 20% of your property, 20% of your farm is untouched under natural vegetation. So you cannot farm those 20%. So that's already a restriction for the entire farming system, right? And as you progress north and get closer to the Amazon forest, that 20% increases to 50 and even 80%.

Eros Francisco

So imagine if you if you farm 100 acres, you can only farm 20 acres. So 80 acres needs to be intact. So that's one of the restrictions. And there are several other several other environmental restrictions related to chemical applications. To animals and bioactivity and all of that. So, it's not easy to farm in Brazil nowadays.

Eros Francisco

The costs are not related just to inputs. But if you if you calculate these 20% that you are not farming, you need to put this into your budget as well just to make the good use of the money. And compared to any other investments, if possible. So it's a different system.

Eros Francisco

Now let's go to the fun fact. So what is your fun fact from the trip?

Steve Brown

I thoroughly enjoyed interacting with the farmers that went with us. They it was we had a very diverse group and age and, and cropping systems, and I was just very fascinating to hear that. But one of our we had as, as David said, we had some great food at one place I set with some folks, I couldn't believe they could eat them.

David Russell

We went to some true Brazilian steakhouses.

Steve Brown

That, grilled pineapple. Oh my goodness.

David Russell

Even the truck stop or maybe down there wouldn't be referred to as a truck stop, but it's kind of what we refer to here. You know, these ag centers, if you will, that are surrounded by thousands of acres of farmland. You got these epicenters of business, right? That's kind of what stood out to me. When you get to these little small towns, it's one business after another on both sides of the street.

David Russell

Of all ag retailers and farm machinery businesses. You know, crop protection and, and seed companies. And so, man, if you've got a, a good restaurant in the middle of one of those towns, which is what we visited that day, I can't recall what town we were in, but man, we're looking up and seeing all these ag retailers with their little name tags.

David Russell

They're their business. Emblems on their shirts. And it was a lunch spot we stopped at. And there's still the waiter, waiters and waitstaff were still coming around with racks of beef, cutting it off for us for a lunchtime

meal, you know. So I walked away from that in the middle of the afternoon, just full to the gills and probably useless for the rest of the day.

David Russell

I couldn't eat there every day, but it was fantastic food. Coffee was great. Eros, thanks for taking us to a diversity, a very diverse, a number of places that we visited and the coffee plantation, family owned farm coffee Plantation was one of my favorites. Actually. Just finished that bag of beans, by the way.

Eros Francisco

Oh yeah. My I still have some if you want. They're done. So I forgot about the coffee farm that we visited in Goiás. And remember when back when the farmers start talking about his operation, which, by the way, is 2400 acres of coffee? And he was talking about coffee, and then he threw the number about his corn and soybean operation, like 80,000 acres.

Eros Francisco

So 24 acres of 2400 acres of coffee was just changes changing between all the his operation. But anyways, it was it was very interesting to see how a totally different crop surrounded by cotton, corn and soybeans is doing very well in that environment.

David Russell

Another point that I found pretty interesting. You know, I come from a forage and livestock background. But seeing the cattle down there, I first thought it was Brahman influence. But come to find out, it was. No. Laurie. Is that how you say the breed? Yeah, yeah.

Eros Francisco

There breed.

David Russell

Which I think is what the majority of Brazilian cattle.

Eros Francisco

95%.

David Russell

They look very similar to the Brahman we're familiar with. You know, the white, gray looking, full blooded Brahman cattle with a big hump on their back. Which another interesting fact. The humps on those beef cattle are pretty good as well.

Eros Francisco

That's my favorite cut, by the way.

David Russell

Is there a name for that?

Steve Brown

Call it cupping.

David Russell

Yeah, I don't know how to say that, but it was good how they recommend it.

Eros Francisco

What you.

Chandler Gruener

Yeah. Like, I don't know if I have a specific fun fact because I kind of agree with you guys on everything. There's like the food was good and like I've been to Brazil before and like my like we said, my wife is from there, my in-laws and stuff. So I've experienced a lot of food. But we got that change in that food, like the hump meat from the cow and never had that before.

Chandler Gruener

But that was really good. Getting spent time with farmers, not only from Alabama and getting learned about them and like seeing what they're concerned about, but then also hearing what the farmers were concerned down there and kind of seeing that interaction between both and then, you know, getting experience in business in more cities and kind of exploring some different areas that we hadn't seen, like getting to see the Savannah region.

Chandler Gruener

That was probably the funniest part to me, is like seeing some of that different land types than what we have. Being a soil scientist, seeing a little bit different types of soil than what I'm used to, and, you know, getting to explore, that's kind of my fun fact, I guess of sorts of getting to see that different soil.

David Russell

Last thing I, I can't thank you enough for. As a Brazilian native, you did a fantastic job putting the agenda together to let us see a diversity of cropping operations. I think we learned a lot. Steve's point, you know, I don't think I would have had the opportunity to get to know our growers if it weren't for this trip.

David Russell

So that facilitated a lot of conversation and new, new and kind of rebuilt relationships that we may not have had or may have already had, but kind of just strengthened those relationships with the growers of Alabama. And I've since been back on a couple of our growers farms, just to see their operations and, and to see their places.

David Russell

So, thank you. And then and then secondly, I realize that we're blessed as extension specialists to work at a place where we're supported, to go on trips like this, to not only learn, but to build those relationships and bring back to our growers here. So for the College of AG at Auburn and our extension service, I'm, very thankful for their support and at our groups and bridging those relationships with our growers across the state.

Eros Francisco

Absolutely. David and I, today we had the impressions from the specialists that took the trip and tour to Brazil. Perhaps I'm going to try to do this. Perhaps I'm going to go and interview the farmers that took the tour with us. There were eight farmers from Alabama. Everyone related to Alpha and I, I'd like to make a podcast with them and just to get their impressions, because then it's going to be how farmer look, another farmer struggling in a different environment, how to make money and how to make a profit out of farming.

Eros Francisco

So I would like to appreciate everyone here that participating in this episode. And I appreciate David, Doctor Brown and Chandler, for going in this tour with me. I had such a blessing. Time to be with you all and to get to know more of you and the farmers that went with us. And I'm planning another trip to Brazil next year.

Eros Francisco

So January we're going to have another group. And more people, more farmers from Alabama will have the chance to go down there and experience farming in Brazil firsthand. Okay.

Chandler Gruener

Sounds good. Thank you all for listening in to our lessons learned from this Brazil trip down there, and some different items we took away and things we're going to bring back here to Alabama and learn from and grow from. And thank you, all of our listeners. And if you have any questions, reach out to your extension agents or specialists.

Chandler Gruener

And once again, this is up in the Alabama Crop podcast, part of the Alabama Cooperative Extension.

Announcer:

The Alabama Crops Report is a production of the Alabama Cooperative Extension System.