

## EIT Food Fight Podcast - Episode 3 - Should producers be responsible.mp3

**Matt Eastland** [00:00:05] Welcome, everybody. This is The Food Fight.

**Lukxmi Balathasan** [00:00:10] EIT Food's live podcast recording a Seeds and Chips Food Innovation Summit in Milan.

**Matt Eastland** [00:00:14] My name is Matt Eastland.

**Lukxmi Balathasan** [00:00:15] And I'm Lukxmi Balathasan.

**Matt Eastland** [00:00:17] And we both work for EIT Food, who are an organization who's building an innovative community to improve food together.

**Lukxmi Balathasan** [00:00:26] So throughout the podcast series, we'll be looking at the key challenges facing our food system. And the theme that we want to discuss today is whose responsibility is it to make sure that we eat healthy food?

**Matt Eastland** [00:00:38] This is obviously a really, really important topic. You know, we have 2 billion people globally who are currently overweight. Global prevalence of diabetes has doubled in the past 30 years. Over 50 percent of European citizens today are overweight. And then by 2050, half of mankind is going to be overweight. So a really, really big, important topic that we're talking about today.

**Lukxmi Balathasan** [00:01:03] So before we kick off with our panellists here today, can I just get a show of hands from the audience? So how many of you in the past week or so have eaten something that, you know, is probably not very good for you, but you just couldn't help your cravings?

**Matt Eastland** [00:01:20] Look at that. (Lots of hands in the air)

**Lukxmi Balathasan** [00:01:21] OK. That's not very surprising, is it?

**Matt Eastland** [00:01:24] Okay, but follow up question. So of those people who ate something, they know they shouldn't have eaten, but they wanted to anyway, how many people would have gone for a healthy option if the option was available? Come on, be honest. Okay. So about 10 people out of the whole audience, pretty shocking, but it's good you're all human.

**Lukxmi Balathasan** [00:01:46] So it sounds like we don't really want the healthy options. We just want that delicious option. Interesting. So we're going to try and dig a little bit deeper into our eating habits. So the first session we're going to be looking at the issue from the lens of food producers.

**Matt Eastland** [00:01:59] So our first guest on the panel we have Alexandre Bastos, who is the director of science and technology for the Flavours Division of Givaudan. Givaudan, are leading the globe in the creation and manufacture of flavours and fragrances. Hello, Alexandre.

**Lukxmi Balathasan** [00:02:15] And to discuss with us today from a food tech startup perspective, we have Eshchar Ben-Shitrit, the founder and CEO of Redefine Meat. It's a

startup that is using advanced technologies to print plant based meat alternatives. So Eschar, we met before. He was a participant and one of our winners of 2018 EIT Food Accelerator Network. It's good to see you again. Thank you very much for being here.

**Eschar Ben-Shitrit (Redefine Meat)** [00:02:35] Thank you. Happy to be here. I'm a lawyer and I have an MBA, so I don't know anything about healthy eating.

**Lukxmi Balathasan** [00:02:40] But you're a consumer.

**Eschar Ben-Shitrit (Redefine Meat)** [00:02:41] But now I'm facing with a problem, developing a food tech company where I need to face these challenges everyday.

**Matt Eastland** [00:02:46] Great. And finally, but not by any means least, we have our own Lorena Savani. Lorena is a food engineer by trade. She's got 15 years experience in the food industry and she now manages EIT Food's Innovation Project portfolio that very much specifically focussing on health and nutrition. Hello, Lorena, and welcome, everybody to the food fight.

**Lukxmi Balathasan** [00:03:10] So before we get going with the really heavy questions, I'd just like to start with the personal questions. So what's your secret guilty food pleasure? The thing that, you know, you shouldn't be eating, but you do anyway.

**Alexandre Bastos (Givaudan)** [00:03:22] Panna Cotta

**Lukxmi Balathasan** [00:03:24] Panna Cotta, OK.

**Alexandre Bastos (Givaudan)** [00:03:24] As I'm in Italy. I love it. That's my secret one.

**Lukxmi Balathasan** [00:03:28] What about you Eschar?

**Eschar Ben-Shitrit (Redefine Meat)** [00:03:29] We have in Israel this new product, which is as common white chocolate. And when I open a package, I eat the whole package.

**Lukxmi Balathasan** [00:03:37] How big is a package?

**Eschar Ben-Shitrit (Redefine Meat)** [00:03:40] One hundred gram, but it's almost 60 percent sugar.

**Lukxmi Balathasan** [00:03:44] Delicious.

**Lorena Savani (EIT Food)** [00:03:44] Nutella. I have to admit, I love Nutella. If I buy a cup of Nutella I eat with a spoon.

**Matt Eastland** [00:03:52] The whole thing?

**Lorena Savani (EIT Food)** [00:03:53] All the time. So I try to avoid that.

**Matt Eastland** [00:03:56] So, Alexandre, just picking up on these guilty pleasures. Givaudan, you guys are experts in sort of flavours and fragrances. So what is it about these sort of guilty pleasure foods that makes our taste buds go crazy?

**Alexandre Bastos (Givaudan)** [00:04:10] So we were talking about panna cotta and panna cotta recipe, you have quite some sugar going on in there. And then if you reduce the sugar, then you have a whole complex matrix that you need to manage. Right? So the mouthful is not the same. The experience for the consumer is not the same. And this is very much like where we work together with a startup, which is DouxMatok. The way I describe, you know, their technologies, [00:04:36]like they have monetised sugar. [1.9s] Right, which is still sugar. The taste experience goes beyond just the sweetness. You have the mouth feel. You have the aroma. You have a lot of things going on. And this is where Givaudan comes, knowing the consumer, knowing the taste. And, you know, you try to provide exactly the same experience as they had in the product that they knew before. And that's what we want to do. And, you know, coming back to the. And we believe this is our responsibility, right? Because we are after the consumer. We need to give them delightful experiences. But we really look into that like as a holistic view, not just looking at one aspect and that works in savoury, so we are working with Eschar that works in the sweet part. So we are working with DouxMatok. And this is where the flavours technology would play a role because we'll try to compensate, you know, that elimination of part of the one ingredient that you have in that formulation.

**Lukxmi Balathasan** [00:05:37] So I guess really talking about food and flavours and tastes, you know Eschar your industry is a really exciting time right now. Just last week Beyond Meat had a really great debut on the Nasdaq and that really showed to us that consumers really are looking for alternatives to actual meat products but, you know, veggie burgers have been on the market for some time now. What do you think is happening with these alternative meats that's actually transforming what consumers want?

**Eschar Ben-Shitrit (Redefine Meat)** [00:06:01] So I look at myself as the best consumer for alternative meat because I love meat and I don't eat it. And nobody craves lentil and mushroom burger. Right? You crave something juicy, something rich, something that has fat that you will feel it in your mouth for the rest of the day. And companies understood that because we have an amazing company in Israel doing veggie burgers for years. They never had a red veggie burger. So just making something that people that like meat crave is a game changing concept. And it's a game changer in many other things. But it's tasty. It's not necessarily meat, but it's tasty and it's rich. And it makes you feel bad after you eat it because you ate something wrong. And when you eat a hamburger, you don't eat it for the nutrition. You eat it for the guilty pleasure. And you ask, did you eat something that wasn't good for you? If you eat something and you enjoy it, it's good for you. Maybe it's not good for your health. And Beyond Burger and Impossible Burger, what we're doing is good for you. It satisfies you. It's not clean label, but you want more of that.

**Lukxmi Balathasan** [00:07:02] And I guess one of the things I've sort of picked up is really about flavour. Right. You seem to be ticking the boxes. You're offering something that's a healthy alternative, but it's not taking away taste. Can you kind of give us some insights on how you've been able to manage to do this?

**Eschar Ben-Shitrit (Redefine Meat)** [00:07:15] So it's a good point and we've managed to do it by the help of Givaudan. But when I started the company, I talked with the people from the food industry and they told me if the product is not tasty, then nobody will eat. The technology and taste is a very complicated system, but it's something you cannot compromise on. So you need to find a way to have an experience that incorporates the taste in the right way. But the taste is not a single thing. When people think about taste they think it's a single thing. But taste is related to the texture of many other things. And as long as you can come close to meat with delivering this complex experience, the taste

improves. And that's one of our advantages. We have this system that delivers taste in the right way, that delivers juiciness in the right way. And all of the things that make it taste better. If you compromise on taste, what's the point?

**Matt Eastland** [00:08:03] And Lorena, I mean, are you seeing a shift towards sort of healthy, focussed innovations? And what are the key trends that our partners are working on right now in this space?

**Lorena Savani (EIT Food)** [00:08:12] Everything starts with the metabolic syndrome issue. That is a pandemic issue all over the world. For those that doesn't know what is a syndrome metabolic issue, we have increased on insulin resistance. So we have a lot of diabetes. So this is due to the processed food that we have been providing into our consumers. And these processed food has a lot of sugars. We have a level of saturated trans fatty acid and then conservancy. So we have preservatives and additives. So those are not very, those are harmful for our health. And a lot of innovations and projects of innovation that are coming on are really working towards what Givaudan is doing, what Eschar is doing as well on meat replaces and finding solutions to reduce their sugar content in our products. And also to make more real food so that the people is eating less processed foods. So now we are going backwards. So before these industries were looking to make more processed food with longer shelf lives, there is a lot of preservatives and additives and now we're going backwards because consumers are realizing, they are getting aware and this is what the current innovations is happening. So not only on making healthy foods, which we're talking about, the sugar, the trans fatty acid, alternative sources of proteins, but also we need to educate people. So, for example, also in EIT Food, we are working a lot on personalized nutrition. So that is really working towards what are the needs of each individual person, because it's not only, each individual person has a different needs based on their genetic also. So this is a lot of innovation going on as well. Personalized nutrition is very important.

**Lukxmi Balathasan** [00:09:52] So some of the projects you're working on with EIT Food innovation, have any of these been tested on consumers? What's been the reaction?

**Alexandre Bastos (Givaudan)** [00:10:00] The project I mentioned before with DouxMatok. Yeah. We tested with consumers. We had like, great, fantastic results. You know, we have technology that, we can deliver some. And we have and we know how the consumers like. We did all the tests. And then here you have someone else bringing something that they also know what is there for the consumer. And a great story with this project, you know, on EIT Food with DouxMatok where we were working on the cookies is that we see the one Givaudan technology plus one DouxMatok technology is really equal to three, right? So if we were working on our own, you know, like trying to achieve some results, we could get into like a certain level, DouxMatok the same. But when we work together in this case with this trial's like a food manufacturer in Israel and their cookies, their recipe, we really got like a very good response. So the results from the consumer was very good.

**Matt Eastland** [00:10:57] And I like to stay on this actually with the consumer. So I actually have a question from a consumer. We were in a panel with them and we were talking about food and trust and who people trust. And there was a guy in the panel. He literally just said, why doesn't food just work? I buy an iPhone. I take it out of the box. It works. And I said to him, what do you mean? He says, well, basically, I don't think it should be my responsibility. I don't want to have to make healthy choices. Food should just be healthy.

It's not for me. So, Alex, based on what you said before, I guess, would you agree with that?

**Alexandre Bastos (Givaudan)** [00:11:30] Yeah, 1000 percent. Yes, definitely. You know, we talked about this big trends, right. So the consumer wants that everything around food is sustainable. Is circular, is natural. And they want this to be healthy for them and even deliver more than just like kill their hunger. And everything should taste, great taste. It's a very difficult challenge because if you put really them together and you think about them, it's almost, you know, like a short blanket. Right. You pull here, then you have problems there. I fully agree. It's something we need to deliver. We need to bring this healthy food and options to the consumers. And definitely we are engaged in this.

**Matt Eastland** [00:12:15] Okay. And Eschar, do you agree?

**Eschar Ben-Shitrit (Redefine Meat)** [00:12:17] In theory, I agree. But we all have the same iPhone and food that we eat is not a single product. And the problem is that what is healthy for me is different than what is healthy for Alexandre. And what I perceive as healthy is different than what Alexandre perceives as healthy. So we need a different food system that can support this statement and we need a different way of looking at food. And the problem is, when you think about it, I am a person that will never compromise on taste for health. So if you can have nutrition delivered to me in a very efficient way, like some companies are trying to do, and it's not tasty, it still doesn't work. So it's such a complex discussion and it's very hard to answer it in the context that we all eat different food and we all have different needs. And especially when we understand now how personal it is to make it work. And certainly what we're trying to do is allow for a new technology that takes one step to all the future of personalization of food. But even though that we are thinking about it, we know that with our project it would take 30 years until we have a 3D printer that brings your tasty, personalized nutrition, balanced and clean label and unprocessed food. And maybe our grandkids on Mars will have this.

**Lorena Savani (EIT Food)** [00:13:29] I agree with you. I mean, I think also each person has a different genetic and the way that we metabolize the food. So maybe a person that is eating more meat every week has a higher cholesterol than others that are eating the same amount. So it's very important that we educate people.

**Matt Eastland** [00:13:48] So I think I've got a question here for everyone. Should the food industry compromise on profits to innovate for like a healthier future? Or can we actually create a system where people are making enough money and everybody's healthy? So is there a trade off, I guess is the question.

**Alexandre Bastos (Givaudan)** [00:14:05] To me, the question is scalability. And this is something that we definitely do in many different projects we work on. As I said, like Givaudan, we are like an IP factory, right. A patent factory. And like new technologies that we create, and we introduce in the marketplace, at the beginning we definitely have to be more open, you know, because we'll have some ways that we need to put the product in the market, get traction so that the volumes come. And then, you know, we get back to like, you know, a price that the consumer will pay. And that will make, let's say, good profit of it. So I think that's the way I see. When introducing new technology, you have to be smart about how you do that. And that's kind of the daily life of a startup. Right. When you are bringing something, they have, you know, some things that they need to give up. Right. But then at some point when the technology is out there and you have enough volumes, then you can, you know, adequate to, what you want to do. So I think that's the

way I have seen with the startups and the way we have seen with any technology introduction.

**Eschar Ben-Shitrit (Redefine Meat)** [00:15:15] So speaking as a startup, we need to find a way to make money and we want to save the planet and we want to improve people's nutrition. But we can only do it if we have a viable business. But I think looking at food companies, big food companies, what about the government? So actually governments are still subsidizing unhealthy eating and it's much easier. But for me, from my small perspective, big companies need to do what consumers want them to do and to make money in order to keep doing that. And it's very hard to put health before profits when you're a business. They're not doing it to make you eat tasty food. They're doing it to make money. The way of making money at Givaudan is to make tasty food. We make alternative meat to make money in order to improve the planet. Profits are important.

**Lorena Savani (EIT Food)** [00:15:57] I agree. I mean, everything is about scalability. So in the beginning, you need to have a lot of money invested to new technologies. And then, of course, until you're going to have this scalability, you can lower the price. So I think that has to be some kind of a support at the beginning to be able to get this kind of democratization for everybody to be able to get a healthier diet, to be able to buy healthier food.

**Lukxmi Balathasan** [00:16:23] So sort of following on from that, and you said, you know, it's hard to balance profit with making healthier food more accessible and available. But do you think we're moving towards that? You know, the question I asked you initially now, what's your guilty food pleasure? Do you think we'll ever get to a point where actually the question is, what's your unhealthy guilty food pleasure, that you can have your cake and eat it, too? How do you feel? Do you feel like there is a movement towards that? That we can make profits because we're producing delicious healthy food?

**Alexandre Bastos (Givaudan)** [00:16:51] I don't think we'll have to compromise on profit. Definitely not. And even, you know, coming back to like the technology introduction. Right. Let's take the case of Beyond Meat. It's more expensive than, you know, a normal hamburger. But people are willing to pay that. Right. But some people, they can not pay for it. I'm sure the Beyond Meat guys are definitely looking for a way to scale and then get the price down so they have more profit. So I don't think it's like either or. There is a system. I agree with Eschar. It's not just about the corporates. I think there are other enablers there. But definitely, you know, there is a way to manage this.

**Matt Eastland** [00:17:34] Can I just stay on the future for a second? So to all of you, you know what, what do you think the future of food looks like? What are you most excited about? But also, what do you think we need to fight a lot harder for?

**Alexandre Bastos (Givaudan)** [00:17:46] You know, I was just thinking about this example of personalization. I mean, there is still a lot of research to be done with the microbiome and how personal that is. And you know, how you can make that happen so that you have profit out of it. But it came to my mind, actually, another project we have with EIT Food, because today we see like personalization, you know, personalized nutrition, a lot about coaching and say, OK, you should eat this, this and that. At Givaudan, we felt like let's have an answer. Right? I need to get the product at the end. And at EIT Food, we have a project which is working beyond the personalization of food and going to the future, we would see this more. It's about hardware, right? It's about robotics. It's about products as well. It's about digital. And it's about like, you know, having like great experience. So it's

seen a way like that to take the manufacturing capabilities. And you put that closer to the consumer so that you have all the coaching happening, you know, all the recommendations. But at the end, you have a product right in front of you. So we were thinking and we are working on that kind of vending machine that's going to check who you are, you know, what you have done, what is your sport activities and diet and what you like, what you don't like. And then you have a baked product right there for you. I mean, that to me seems like science fiction, but we are actually working on that in an EIT Food project, kind of for a couple years. How many of those machines we can make, you know, all that scalability problem, but I think we'll see more of that. There is another startup working on beverages. Same way. Mixed fit. Same idea. So one we have a food. The other one, we have a drink. And I think this is gonna be something that we'll see more and more. Eschar, and this is one of the things why we work with them. Imagine that you print your plant based steak, but maybe I need more protein than he does. And if you are printing it, there you go. You can have more fat, less fat, and, you know, you can go on and on. So I think we should see more of that personalized nutrition food solution beyond the recommendation, but actually getting products in front of you. I hope we see that.

**Matt Eastland** [00:20:04] And, Eschar, is personalized nutrition, the thing that really excites you?

**Eschar Ben-Shitrit (Redefine Meat)** [00:20:07] Personally, no, but I think that in general the future would be better than the present because we will have more options and it means that we can choose what we want to eat. The problem is that I'm trying here to discuss with people about what is healthy about eating meat and what is unhealthy. I'm not an expert, but even experts give me seven different opinions. And how you get clarity and how you educate consumers to actually know how to deal with all of this selection? And is microbiome, real or not real? And do we need protein or do we have too much protein and is saturated fat, bad or good for you? I don't know yet. So how you deliver this method to a consumer that needs to buy something simple and eat it? This is a challenge, especially with new technologies emerging that are changing the game.

**Matt Eastland** [00:20:49] And Lorena, are you positive about the future?

**Lorena Savani (EIT Food)** [00:20:51] Yeah, I mean, I think that technology helps a lot. Personalized nutrition is getting bigger and bigger. It's true that we are still in early stages. So there is a lot of things that we still need to learn. Also, we are gonna have the technology, as I said, with the digitalization is increasing. We have a lot of apps available and we are working on many of those. Those applications are going to help. Having coach nutrition is that they're going to help educate, support the people on the path of getting them, understanding which are the requirements of each individual person. Health and food are very close. So this I think is what is the future looking at.

**Lukxmi Balathasan** [00:21:30] Thanks, everyone. I think that was a really interesting discussion. I'm going to open up to the audience. Does anybody have any burning questions they want to ask the panel?

**Audience member no.1** [00:21:38] Thank you. I think it was really interesting because the question of scalability came up once in a panel on biodiversity today, where someone asked how local does preserving biodiversity need to be? And it seems that what you're describing there is a more decentralized and diverse food system. So how would you see that happening? How do you see that? The fact that we are used to all consuming products that all look and taste the same? [00:22:05] Like the McDonalds model as

supposed to products [1.9s] that could be increasingly look different according to the place where you consume them. Is that something that would make sense as a business model to invest in? Or are we really attached to that kind of replication mode that each brand delivers the same quality taste, feel and look and feel and so on and so forth?

**Alexandre Bastos (Givaudan)** [00:22:27] You know, that idea that it's the same food everywhere is not true. Coming from a flavour company, we know the strawberry taste that people like in Argentina is completely different than the strawberry taste they like in Indonesia. That texture expectation that they have in one country is completely different than in another country. So there is already like, you know, adaptation in the food system, you know, because food is very local. And we need to understand, like, you know, how each consumer is looking for this. So there is already a way, you know, that we adapt our food system, you know, to local preferences, talking, you know, from a flavour standpoint, we see that every day. So the question is, can we expand this? Can we make it more personal? So I think there might be ways there. So I don't think today we have like a completely normalized process and system. And I think we can eventually expand.

**Lukxmi Balathanan** [00:23:27] I think we have one question back there.

**Audience member no.2** [00:23:30] Yeah. Thank you for your input. I'm Christine from Foodways in Switzerland. We're actually a partner of EIT Climate KIC. I think it's great that we're talking about nutrition, but I also think for a consumer and based on the experiences that we have in Austria and Switzerland, in Germany, is that a consumer just makes one quick decision. And ideally that decision is both based on nutrition and sustainability. So I'd be curious for your thoughts and your experiences in terms of business models and digital tools and applications and such that ideally combine the two.

**Alexandre Bastos (Givaudan)** [00:24:05] Let's say in many ways it's already there, like with the apps. And here we have one of our friends from EIT Food that is kind of going after this space. There is a lot more to do. That connection on the health and nutrition is definitely like a big space. I go back to what Eschar said. We know that the main driver for [00:24:28]Reaper chasing food products [1.3s] is not nutrition, is not sustainability. It is taste. So in theory, we should go there. But it's really very complex to put them all together and attack this. We love it because it's a big challenge. But I think we have a lot more to do in this connection, you know, to bring nutrition, make it sustainable and at the end still deliver a great experience for the consumer. Otherwise, they buy it once and they will never buy it again.

**Lukxmi Balathanan** [00:25:01] And think we have one more question.

**Audience member no.3** [00:25:04] Hi. I think my question, it's for everyone. I want to know what healthy food means for each one of you. Because I believe that's what drives your thinking of what can I provide the consumers? That's just a simple question. What's healthy food for you?

**Eschar Ben-Shitrit (Redefine Meat)** [00:25:23] It's a very, very difficult answer. You said it's an easy answer. But I think that for me, I come from the Middle East and we are lucky because our diet is balanced. So we eat vegetables every day and we eat a lot of protein that doesn't need to come from animals. And this is why I can eat anything. And I don't think even for once about eating healthy, because the selection that they have, what we eat in our family dinners is well-balanced nutritionally. You know, a lot of fresh things, [00:25:52]high on iron because 'X' every day. [1.8s] So we don't think about food, is it

healthy or not? We think about it as food, as a way to connect each other. But there are other people around the world that food can kill them. So they think about food, what would not kill me? When we look at the food in general. So you ask the person on a question, but we need to look at the entire world. People in rich countries that eat only junk food and people in poor countries that try to have something to sustain them. For me, eating healthy is really about enjoying food. I have probably it's the lack of the nutrition and genes of eating whatever you want and not thinking about cholesterol and about too much carbohydrate because Israel has great food.

**Lorena Savani (EIT Food)** [00:26:32] Yeah for me. I mean, it's the same. I mean, it's really about a balanced diet. Okay. Anything, healthy ingredients. I'm from Spain. We eat a lot of olive oil, which is good and then we have a lot of fruits, salads, legumes as well. Lentils. So, yes, it's about proteins. I like meat. So but okay. I know that I have to eat meat in a moderate way. So it's really about having a healthy lifestyle as well. So you have to combine not only with a healthy diet, you don't have to be sedentary, you have to do exercise and try to eliminate as much as possible processed food and simple sugar. That's the worse thing. One of the things that I use to introduce a lot in my diet is whole grain bread, whole grain rice. So we don't eat white rice also is important that we understand that when you are eating whole grain products, you're not absorbing the totality of the calories that you are eating. So this is helping as well on the energy that you are having.

**Matt Eastland** [00:27:32] And finally, Alex, anything to add?

**Alexandre Bastos (Givaudan)** [00:27:34] Balance, right? I have a nutritionist at home. And that's what she keeps telling me. And probably like, you know, the worst case scenario of a husband of a nutritionist because, you know, I'm kind of searching and thinking about like different diets. And she's always like teaching me a lesson and it's always about being balanced. She said, your plate should be colourful. And I'm like, okay, I can deal with that. So I think it's really a balanced diet with the micronutrients that you need on a daily basis.

**Matt Eastland** [00:28:07] And that's a really good place to finish. So I'd just like to say thank you. Big round of applause. Thanks, everyone, so that was The Food Fight. If you'd like to know a little bit more about what we're doing, go to [eitfood.eu/podcast](http://eitfood.eu/podcast). Or if you want to get in touch, it's [podcast@eitfood.eu](mailto:podcast@eitfood.eu). Thank you very much.