

## Transcription - Paul Cuatrecasas Part 1

Welcome back, I'm Kim Baillie, she's Fulyana Orsborn and this is Inside Exec. This week we are joined by Paul Cuatrecasas from London and Paul's going to talk, amongst other things, about his new book but particularly about disrupting industry and disrupting it with IT. So thank you for joining us Paul. I know it's early morning for you, but we do appreciate it. Thank you Kim, glad to be here.

Let's start out with the first question that we sent you to think about. Do you see that there is more threat in service industries or product industries? Yes at the moment the disruption, the threat, is happening across all industries, services and product. However we've already seen significant threat over the last 20 years in photography and newspapers and broadcasting. And most of that to date has been in what's become digital industries or more services industries. What we're starting to see of course now, is industry 4.0 and we're seeing robotics, 3D printing, AI machine learning applied to the product industry and manufacturing with incredible pace and speed. It's not so fast yet but companies can't keep up in terms of manufacturing products and selling them like they normally do. But it is starting to have a real impact. So it's an interesting question, I would have to go in to the individual industries, but if we just took one, which is one I often talk quite a lot about because it can seem obvious to some people if they think about it, is food. Food as a product rather than a service although there are many services attached to food. What we're seeing in the food industry, now, is a disruption of every part of the value chain within the food ecosystem from the farm, all the way to the fork. So in terms of the farm disruption, we're seeing beyond meat being possible food. So, plant-based proteins, we're going to see that continuing to plant based fish and lab fish, we caught aquaculture and also lab-meat where there are many, many companies, raising raising capital to offer those products in the next few years. And so we're going to have a world, 10 years from now, earlier than that, 5-6 years from now in which more and more of the meat and food that we eat is not grown in the farm or doesn't come from animals that we have to breed and feed and kill and then transport for our food. It's going to come from a lab. That's a game-changer, it's like going from the horse and cart to the automobile. Then along the way from getting that food into the home or into more people's mouths effectively, there are all types of new ways of delivering that food or getting that food to someone and we've seen some of that in the pandemic with more food delivery, even meal kits, having cloudkitchens now emerge. The transportation will move from humans that drive vans with petrol or diesel to self-driven vans that are electric and also to drones which we will see. It's not going to happen overnight but the convenience will increase to the point where you know I think in the

not-too-distant future perhaps up to half the people will start to order food rather than cook it themselves because it'll end up being cheaper easier, taste better and frankly a lot more convenient.

Just in terms of that are we talking about industry and all of these innovations that are happening, is there then a bottleneck with legislation? Not necessarily. So on things like drones, they have been approved in the US, they've had FAA approval, Amazon just got approval a few months ago. So that's starting to happen. On the food front, it's the FDA in the US and that often tends to set the standard for other parts of the world in terms of getting approval. The FDA has approved or is close to approving, I should say, one of the lab food companies. It might take a bit longer with a few of the others but it's going to happen. It's just like anything else, the science, you give it enough time and you give it the right minds and enough money, it'll find a way. And none of this is necessarily having to break the laws of physics. It's something that is doable. It just takes takes time. So regulatory approval is often a barrier in many of these cases but it's just a matter of time. And I remember in the early days of SpaceX, in fact I was working on a deal where we had to go visit SpaceX in Washington D.C., probably 10 years ago and they had not yet launched a rocket. There was a long process for them to get approval from the Civil Aviation Authority is where it started, all the way through to whatever approvals you need to launch rockets in space. And look at them today, just a matter of time, dedication, perseverance, focus. This like you have with any entrepreneurial company and you get there in the end.

You talked about the food, so what we're eating is going to be different and produced differently, what did you call the cloud thing? Lab meat and lab fish, aquaculture, some people also say cellular fish. Right and you said something about we order through the cloud? I guess you could call these cloud kitchens or ghost kitchens. They're just emerging now, in fact our firm produces a monthly intelligence briefing and next month is going to be on cloud kitchens. And so, yeah, these kind of started, didn't start with the pandemic, they accelerated with the pandemic but restaurants can use their kitchen or grow the size of their kitchen, including insourcing cooks to cook meals for either other restaurants that are shutting down or for other brands or create an own brand. There's some really interesting models out there. There's one in Malaysia that has raised significant venture capital money now and they are really doing some interesting things. They are now using their own brand. They have all kinds recipes. I mean I don't know how many, probably a thousand different recipes and it's high-quality food, tastes good, they've located their kitchens strategically close to population areas so that you can get the food to the house or flat or whoever has

ordered it within 10 or 15 minutes and they're able to do that at a lower cost than going to the restaurant. So we're just already seeing a lot of very interesting models emerge. And it's all ordered through your mobile phone.

That sounds awesome and to me it sounds too futuristic but you're saying it's not so far-fetched. Do you see then going to a restaurant to enjoy your meal, is that changing? Is that going to be less of or different? I don't think that will ever change because we're human. As long as we stay human, social, we'll always want to do that. Pretty fundamental to the human being. What I do think is we're going to have a little bit more entertainment in restaurants. I also think we'll have little bit more entertainment required indoors, in going shopping, especially grocery shopping, because they'll be more more ways of, if not having the groceries delivered to us that we want, and that's going to be very interesting area, but we'll even have ways of meals being prepared, preparing our own meals very easily. That's going to change. So the question is, why would you go to a grocery store? I haven't mentioned virtual reality shopping which exists today but it's early days. Once we have 5G on a massive scale we're going to see virtual reality shopping, I believe, take off. You won't need these big heavy glasses but we can essentially, instead of having the two-dimensional online shopping now where we're clicking the things we want to put in a basket, we can put on our hopefully very thin glasses, maybe one day soon it can be contact lenses, and we go on to the virtual grocery store and we have an experience. We can see friends. We can see celebrities, musicians doing acts, as we're picking up our Diet Coke or milk or bread. We can throw it into the basket. We can throw it 30 ft and see if we make it in or not, have fun with it and check that basket out just like we do today but with a virtual experience. I think that's going to become good enough that people just won't feel the need to go at all, not very frequently.

The other development in grocery shopping is automatic check out. We see that with Amazon Go, which is really rolling out in the US. There's also check out technologies. There are other companies that are offering this, it's just a lot of changes but the restaurant experience itself I don't think is going to go away, no. Sounds very exciting actually. I think it is. We'll send you to Dubai where you can go to the restaurant that's is all automated and the little robot comes in and serves you the coffee. There are already quite a few of those in China and Japan where you walk into restaurants and you're served by robots.

In terms of those industries, we seeing industries that are under threat from interruption, from that disruption, are there industries that are going to benefit? Yes, I think ultimately, most industries will benefit. For companies to benefit,

within that industry, they're going to have to become fully technology-enabled if not become technology companies themselves. I read an article recently, someone claiming that all companies will have to become fintech, financial technology company, simply because of the way that their customers are paying, making payments and using funds, is all done through some technology enabled platform. I think that's a little bit far-fetched, but the point is that every industry, every industry, is being disrupted because it's all an ecosystem. If we go back to the horse and cart going to the automobile, it changed in entire ecosystem, that had been built around the horse and cart for, I don't know, couple hundred years and then within 25 years, the market share of the horse and cart went from 95% to 5%, completely replaced by the automobile, and the automobile created an entire new ecosystem, components, suppliers, and you know, all the steel companies, the tyre companies and wheels, and you name it. The GDP factor or the size of the industry, I forget the exact numbers but something like that 1899 the horse and cart market was 150 million dollars but by 1925 the automotive market was worth several billion. And so that is the kind of thing that can happen, is that the overall GDP level increases because of this new thing.

If you look at the introduction to smartphone, these developments are very deflationary. I haven't run the numbers, but I watched the most recent Apple launch, the iPhone 12 5G which has lidar scanning and augmented reality. I mean it's it's really quite amazing. I think most people will see how amazing it is once they have one in a few weeks but the technology in that iPhone 12 Pro, if we wind the clock back to 1990 or 1985, would cost hundreds of thousands of dollars, if not millions of dollars and you can have one of those in your pocket for \$1,500. It's quite amazing. And so this is the deflationary effect of technology. At the same time we think about the deflationary effect of the smartphone, it's created new industries, right? It's helped create Uber for example, which has got a market cap of around fifty or sixty billion, it's helped to create Airbnb. These are just apps, these are ecosystems. And then when you think about something like Uber, one of the reasons why investors are intrigued by Uber long-term, is that there's not an expectation that the model will stay as it is for another twenty years. There is an expectation that those automobiles will become more efficient, they'll be electric and they won't be driven by humans, they will be auto driven. And so the business model of Uber, which, you know, it's a big factor is that the human driver, that goes away. And so literally, all you have is a software platform that is orchestrating self-driving, electric vehicles that are transporting people and goods and food by the way with UberEats. So it's all changing. Every industry has to become a technology industry, it already is.

When you go into big corporations to help them become more profitable and to

keep them away from being extinct, as you say in your book, if you come across where there's some resistance in some corners of the executive team, how do you deal with that? Oh, Fulyana, how are you asking that question? We never see that. Some people might think that all sounds good in theory but it can't work here. I mean I'm laughing because we see it nine times out of 10, if not 95 times out of a hundred. There's always resistance. I can't think, I'm struggling to think of a case out of the 350-400 companies we've been dealing with one way or another, where there has not been resistance. Resistance is everywhere. There's a natural immune system, typically you'll find it in middle management, that rejects anything new, technology or not. They reject new people, new ideas, software. So that's the nature of the beast, right? I think, actually, you've hit the nail on the head. That is the greatest challenge companies have. How do they manage the speed, it's not so much the change. We've always had change but it's the pace of change. One of the more interesting developments that I don't think I expected when we started this journey advising large nontech corporates on how to avoid being distracted out of existence, I didn't expect to see the impact on talent. So, the result of companies not being able to adapt to the new stellar rating digital world is that they will lose, or they're at risk of losing, some of their best people who do see and they're very aware. These are very smart capable talented people. They see what's going on. They read the news, they have friends, contacts, they are frankly, talking to a lot of the tech companies about commercial partnerships or as a customer and these tech companies could be a supplier. So they know, they know what's going on and they're increasingly getting calls from recruiters and others to either join a big tech company or even a small RBC backed company in which they can earn options and warrants and be part of a growth story. They're being coaxed away. They're also in some cases being coaxed away by competitors who are committed to this path and are taking risk and that to me is possibly the greatest threat of all for these large companies because as we accelerate into this new world, we don't need more people, or bodies, as I put them. We have this measure, we call it body value. We don't need more people to grow but we need people who are a better fit and who are designed into our new unit, the company that we're going into the next five or ten years and who can also design our offering, our platform, our system, our value chain that uses fewer humans. So the people are becoming more and more important because they're designing a company that has fewer people. And if we lose those people, then we're really challenged just because we don't have that same capability. But by losing those people we're also struggling to recruit the new talent that we need to recruit who have the skills and experience that we need. And I really think it's one of the greatest threats, because once a company starts losing that talent, or maybe it's not lost but they just hang out. They become unmotivated and they feel like their ideas

are not being accepted and they're not being listened to and they're a victim of the immune system themselves, and it's almost the same effect, if not worse, frankly, than leaving. It has a real impact on these companies being able to recruit the talent they need. So people don't often talk much about that when I talk about digital transformation and disruption in technology, but it's all about the people. I mean tech companies are people companies. They're mainly coding software and they are designing chips. And those chips are systems, they're systems on a chip and those chips are designed with software and integrated. And that's all people. It's not about the actual product of oil or gas or timber or metals or hard core products, not that any of those things aren't important, it's just that when it comes to technology, it's all about the people, and it's not about even the product they're developing because the people can very quickly adjust that product, pivot as we say, to address the right market and the right customers. So it's all about people and you're either losing people or they're not excited by what you the company, are doing then it's really a problem.

It's a big incentive for the resisters to know that you are going to be worse off by resisting rather than looking after themselves and moving forward with than others even. Yeah, the good news is many companies have these executive who really believe in what the company can achieve. And so they often tend to be cheer leaders and influencers and leaders and they'll often take bold risks and they'll often stand up and be the champion. And those tend to be our clients, we have clients who see it, they want to be a company that does well and they're able to persuade their colleagues in an imperical way, you know, using facts and using evidence and case studies and that works. It doesn't always work, but it often does. And thanks that those people are around. Sometimes they make it, you know, sometimes they're rejected and that's the risk. They take that, it's the nature of business is taking risk. So we try to help those executives, the ones who really do want to make an impact and they want to bring on board their colleagues. It typically happens at the executive committee level and then moves down a level from there, but we help them in any way we can to bring evidence and then we focus on the impact, on the things that matter. The things that matter to these companes, of course, are revenue growth, market share, ability to launch new products, or enhance the customer experience, pricing, increasing gross margins, how can we reduce the cost of sale and make things more efficient, how can we do it with fewer people. Those things are important. I call them more optimization and efficiencies rather than transformation but you have to start somewhere and I think don't you can start off with transformation because it doesn't mean a lot to people. You have to start with some baby stuff sometime.

That's where we'll take a break in this very fascinating discussion with Paul Cuatrecasas. Join us for Part 2, for now I'm Kim Baillie, she's Fulyana Orsborn and this is Inside Exec.