Jason Lopez (00:06):

This has been a Christmas ritual for nearly 80 years.

Child 1 (00:10):

One of these...

Child 2 (00:10):

And one of these...

Mother (00:10):

What do you do next? Look at there's a picture, there's number one,

Jason Lopez (00:17):

A child discovers Legos for the first time.

Child 2 (00:26):

I wanna do it.

Father (00:26):

Well, you can help.

Child 1 (00:26):

I think it's supposed to be blue

Jason Lopez (00:27):

If you've ever wondered about the company Lego...

David Gram (00:30):

It's an interesting company because it's placed out in absolutely nowhere, rural area of Denmark, and you have this massive headquarter with more than four or 5,000 people showing up every day. And many of them being highly creative, international designers and engineers. And so one of the things that you quickly notice at Lego is that there's bricks everywhere in every meeting room there's bricks. And even in meetings among executives, you will have them sitting and fiddling with the bricks and building stuff. And I think that playfulness is something you experience across the company that it's all right to play.

Jason Lopez (01:02):

It wasn't always this way. In the 1970s and 80s Lego had reached every corner of the world.

David Gram (01:08):

Then in the 90s, what happens was that the top line was still pretty good, but the bottom line was going under every second year and the company was losing money.

Jason Lopez (01:16):

David Gram is the co-founder and partner of the strategic innovation company, Diplomatic Rebels, which was conceived based on his work with Lego and its Future Lab department. He says there was a feeling that the plastic brick maybe was obsolete with the rise of video games and computers. Maybe kids just thought Legos weren't cool anymore.

David Gram (01:40):

The company started diversifying itself into a number of different things, which had nothing to do with the company was all about.

Jason Lopez (01:46):

In 2003, Lego almost went bankrupt. Creditors went to the company's owners, the Christiansen family to talk about winding it down, but the family resolved to bring it back.

David Gram (01:58):

So the founders said, we need to stick to the brick and get back to the core and understand who we really are. And the first thing they did was to really develop the mission of the company. Now, what is it that we are all about and is that we are about inspiring and developing the builders of tomorrow. The second thing was to understand what is the core DNA that should be in any Lego experience. So we have this formula. It doesn't mean that the brick has to be in it, but it is what that brick symbolizes. And it's something we call system in play because really what we understood was that the brick is not just a toy. It's not just a product, it's a platform. So this was a big realization for the company. And I believe it's one of the reasons why the company today is among the most powerful brands in the world.

Jason Lopez (02:43):

Lego got its started in 1932 when Ole Christiansen began making wooden toys in the town of Billand Denmark. The name Lego was coined two years later from a Danish word "play well" or "le godt," in Danish

Jason Lopez (03:01):

In the 1940s Christiansen started making toys from plastic and hit upon the idea for Automatic Binding Bricks. After some trial and error in the development of the bricks by the 1960s, the company settled on ABS plastic, which is what Lego bricks are still made of today. Gram says after the company nearly went bankrupt, it recognized that those plastic bricks are more than meets the eye.

David Gram (03:28):

In the brick business is a core business, there's a lot of innovation happening, actually. In fact, legal has more than 400 unique skews products are launched every year. About 80% of the portfolio are changed every year. It's like the fashion industry. On the second level, we have innovation labs, not just one big R & D lab, but multiple innovation labs across the value chain. And then we have Lego ventures as the third level. It's anchored outside the main business in the holding company is completely off the balance sheet and invests strategically in startups, but it also builds new startups based on ideas coming from the ecosystem. And the approach to this is thinking big, but starting really small.

Jason Lopez (04:12):

Perhaps one of the obvious innovations in toys is putting computers in them. Lego has collaborated with high tech companies, such as Intel and Google and with organizations like NASA.

David Gram (04:24):

So what happens when toys and powered with artificial intelligence? So they can actually learn and think based on the interaction with the child. And then if you add robotics, now the toys can actually behave, move the way that the kids would expect them to. And if you add voice and speech, now the children can have conversation with the toys. And if you then connect all the toys to the internet of things, the toys can actually start playing with each other. So when the child leaves the bedroom, the toys will still be playing. It'll be like toy story, come to life, right? And on top of that, you can add augmented mixed reality, so now the child connects the physically see the stuff they imagine happening right in front of them in the physical world. So all this has got to definitely to change the toy industry entirely. And for someone who's really, really good at injection molding, that's a big thing that we need to take seriously.

Jason Lopez (05:11):

It's easy to assume Lego must be all in on information technologies infused in their toys to capture the hearts and minds of kids, as well as the pocket books of their parents. But if you look at the work the company does to understand its users, Lego's motto "only the best is good." Enough is a driver behind inquiries into child creativity in may of 2020, the Lego Foundation published "Assessing Creativity: A Palette of Possibilities," featuring essays by researchers and scholars of child development. Gram says the world of toy making has more dimensions than just getting a child's attention. It's also about how toys affect that attention.

David Gram (05:52):

All these things can do great things for kids. No doubt it can empower their creativity and can create awesome things, but it can also do the opposite. It can take away the creativity. It can remove any need for imagination. Basically hook them up to the matrix where they're just passively consuming, awesome content. That's basically pacifying them. They don't need to be creative because there are no cracks or gaps in what they're experiencing that they need to fill out. So there's a moral responsibility here for a company like Lego, but for any company in any industry to say, how do we make sure that these technologies actually deliver long-term value for users?

Jason Lopez (06:31):

Lego does in-home studies with families to understand how things go in households, how kids spend their time, how they play. These understandings don't necessarily tie right back into the next toy design. Lego innovation operates a bit like a tech startup creating opportunity zones to prototype ideas, often working with partners and on an open platform. It's a strategic venture where R and D is not enough. Things need to launch and actually get tried out.

David Gram (07:02):

So to get it right, the first time aim to iterate, and it's easier said than done. Everybody wants to get it right. It's in our nature. So how do we cultivate this more child is way of playing and learning. And it's about also how to measure performance. This needs to be more like a startup as something that's maturing over time and growing.

Jason Lopez (07:22):

The mindset of the company reflects both that of one of the world's most revered brands as if it were in Silicon Valley, but with its values still fixed to a small town in the Danish countryside where a woodworker invented a simple quality toy for children.

David Gram (07:39):

The future core capability that any company needs to adopt and cultivate is that of being able to experiment and explore new territory and it sort of shadows into then the personal as well with the amount of changes happening in the world. The amount of new stuff that we constantly need to relate to is only one way to go about it. And that is to be curious and playful and experimental about it and not be afraid of failing, not be afraid of looking foolish or not being right the first time, but just enjoy the fact that life is wonderful and it's constantly changing.

Jason Lopez (08:11):

And playing with Legos is emblematic of that.

David Gram (08:14):

It is absolutely. And the system is such that you can do anything with the bricks and they'll connect in multiple ways and there's no right and wrong.

Jason Lopez (08:24):

David Gram is the co-founder and partner of diplomatic rebels based in Copenhagen. It's a firm that helps other companies with strategic innovation. He was the Senior Innovation Director of Lego's Creative Play Lab, as well as an entrepreneur in residence at the toy company. I'm Jason Lopez, thank you for listening. Tech barometer is an audio podcast of The Forecast. Why don't you check it out at theforecastbynutanix.com? Not only are there podcasts on other tech topics, but articles and, and you can subscribe to get the latest forecast reports in your inbox. That's the forecastbynutanix.com.