

“Cultivating change: vertical farming in London’s Royal Docks” Podcast Transcript – LFA Building Sounds

Eliza:

Hello and welcome to Building Sounds, the monthly podcast brought to you by the London Festival of Architecture. I'm your host, Eliza Grosvenor, Head of Programme at the festival. In the last episode, we explored the impact that temporary built projects can have on shaping London’s public realm. Joined by the designers of two of our 2023 commissions, we discussed how these interventions can be testing grounds for innovative ideas about the city and have a lasting impact on the city long after their period of installation. This month we're joined by First and Dan – who will introduce themselves in just a moment – to discuss a current vertical farming project in the Royal Docks, one that we were lucky to hear about as part of the festival programme this year. We'll be chatting about how sustainable agricultural solutions can be integrated into the city's landscape and architecture, and discussing how projects like this tie into London's net zero ambitions, and how they can convert underused spaces into meaningful assets for the city and its local communities. To start with, it would be great if you could both introduce yourselves and give us a bit of your background.

First:

I am First, an architect and entrepreneur. I work primarily in placemaking and destination strategy. I also founded HER Coffee in Hackney back in 2011. Currently I am developing the vertical farm project with This is Projekt and I’m also a creative strategist at Spacelab_.

Dan:

And I'm Dan Bridge. I'm the Programme Director of the Royal Docks team and have been managing the regeneration and redevelopment of the Royal Docks for about the last five years.

Eliza:

Amazing. And we're here to talk about an exciting new venture that you're working on, which is around vertical farming and new ways of using space in the Royal Docks. Could you give us an overview of what the project is and how you've been working with Projekt?

First:

The vertical farming project is our ambition to create a farm-to-fork concept right in the heart of London. The project will be fully circular. This is where you come and eat from incredible local food vendors that will be cooking on site, you will come and shop fresh produce from the farm shop, you also can learn how to grow food through our vertical farming and also our learning and training programmes. There will be a space that we run workshops and skill trainings around vertical farming.

Eliza:

And before we dive into all the details and what that looks like, there'll be a lot of people who are very unfamiliar with what vertical farming is, how we can reuse buildings that have had a particular use for so long. What is vertical farming?

First:

So, with the vertical farming, I don't want to scare people so much in term of the technicality of the actual project itself. So if we refer it more as urban farming, that might be a bit more familiar. And in London, you're probably familiar with quite a few urban farms or city farms across London already. And where the project has come about, I think it was just looking at urban food growing and how we can integrate these activities that are quite crucial and important to the city and integrate that as a part of the built environment to become one of the fabrics of the city. Because often when we design the city or develop a certain area or spaces for food growing, it tends to be segregated from how we approach the design. Even green space, somehow food growing tends to belong to rural areas. And as we know with the cost-of-living crisis and climate change, it's now about time to actually start looking at the urban food growing.

Eliza:

How does that fit into what you are exploring at the moment?

First:

I'll give you a bit of background of where this project has actually come from. So me personally, I'm quite obsessed with abandoned spaces, void spaces and in-between spaces. I look at, for example, the gap between two high-rise buildings and I can see those vertical void spaces that potentially could be utilised for something quite functional and quite useful and try to think what would be the best fit or the best intervention for that space. And I think with the climate crisis, we just started to recognise that the threat of the climate change is crucial and it's become quite threatening to people – especially the residents who live in these tower blocks. So I started looking at infrastructure or other interventions that have a bit more functionality that could create more biodiversity for the areas. And then it just came from integrating green infrastructure for the building up to evolve into vertical farming across London. I think we have quite a lot of potential sites and vertical farms don't need a lot of space.

Eliza:

And you just touched on the fact that this is not just a one-off project and one-off need that's there. Dan, I don't know how much this fits into the wider work that you have in the Docks and how you see this happening on a slightly bigger scale.

Dan:

Yeah, so I mean I think food has had a very significant impact on the development and history and landscape of the Royal Docks ever since it was conceived. Perhaps lots of people don't know, but foodstuffs was one of the biggest products that came in and through the Royal Docks and actually some of our biggest listed historic buildings are Millennium Mills, which was the flower mill and Compressor House at Royal Albert Dock, which was actually a compressor house. It was effectively a massive Victorian building was built as a fridge to host vegetables before they went on ships to keep them fresh. And even today the economy is very significantly food-based, so we have Tate & Lyle as one of our biggest employers, which brings in huge amounts of sugarcane from all over the world to turn into sugar. We have companies like Bühler who developed sorting machines for food and agriproducts.

And actually since I've been doing this role, we've been approached by a number of organisations, including First and Projekt, to think about how do we incorporate urban food growing into this amazing landscape. And that is in with some of the large existing spaces for meanwhile projects – as First talks about – but also people have put forward really interesting ideas and proposals for how do we use our significant amount of water space potentially for floating greenhouses and those sorts of things. So it's very much thinking about it from a meanwhile use perspective, but also thinking about how can we incorporate some of this activity into longer-term land and water use in the area.

Food and beverage is a really significant priority for us in the Royal Docks team and it works on lots of different levels. So we're very aware being in a deprived borough that there's quite significant issues around food access and food poverty and making sure that we're thinking about how we provide good high-quality food for local residents is really important.

But we're also really interested in how this fits with – this is one of the exciting things about First's proposal – thinking about the food and beverage offer from a consumption point of view in this space. So there is an ever-growing and better-improving quality food and beverage offer, but it's still not where we'd quite like it to be. And I think this idea of growing and consuming some of the food with chefs from all parts of the world, using produce that's grown in the Docks is a really interesting and exciting thing to do. I think that also it can be really powerful, and again, one of the other really exciting things about First and Projekt's proposal is the educational

opportunities that the project presents. So we do lots of work with local young people. Newham is the youngest borough in London; the youngest, most diverse borough in London. So having spaces where we can work with local young people to bring them and explain to them the science behind food production, I think has huge potential as well from an educational point of view.

Eliza:

There's a term that keeps coming up that I just want to make sure that listeners understand because I think it's a term that can sometimes be a little bit confusing exactly what it is, which is 'meanwhile spaces', what did this mean?

Dan:

So in the docks we have somewhere in the region of about 80 acres of undeveloped land and some of them are very large development sites and that development is on site, but realistically it will take 15 years for the whole site to be completed. And so we have a lot of empty land that we want to put into productive use while other elements of those sites are being delivered. And we do really interesting projects like we're working with Broadwick Live on Silver Works Islands to have festival spaces on big open sites, but we are fortunate enough to have a number of quite interesting post-industrial buildings, some of which will remain. So one of the projects that we're working on with Projekt is The Factory, which is part of the Tate and Lyle estate, which is some amazing collection of warehouses on the western end of the Tate and Lyle Estate.

And that's not a housing redevelopment site, so that could potentially be a long-term, meanwhile project, there's at least a 10-year lease on that. But there are other sites which again, one that First is looking at with Projekt, which is perhaps the most favoured one where there's some really cool 1950s riverside warehouse spaces that are part of a much bigger development of Thameside West but are likely not to be needed to be demolished for a period of 8 to 10 years. And so thinking about how do we activate, create businesses, develop sustainability, provide potential long-term occupation into those permanent buildings is really, really important. And actually, I mean the site that First's looking at which I probs can't say too much about at the moment is an absolutely phenomenal riverside site. And so it would be an absolute crime not to be able to get that space and site open to the public for the next 5 to 10 years just because it's such an exceptional site with incredible views in an amazing building. So again, I think the component of First's project, which is about the consumption of food education, of food exploration. You know, what this isn't is big closed off warehouses with lots of green stuff growing in them that nobody goes into very much. I think First's project is about having these as open spaces and delivering the produce, but really having them as big open brand type pavilions for urban and vertical farming to really push the agenda.

First:

Just to add on from what Dan just mentioned, the site that we currently have, yes it is a meanwhile use, but we would like to see the potential of this type of scheme to become more of the long-term and become a part of the planning in the future. Because there's one project, the largest farming in Europe in Paris, they're using the rooftop, I think they have about 14,000 square metres to grow food and they manage to basically contribute to 5% of the city consumption in Paris from one particular site, which I think that's really, really exciting. Really, really exciting. And it's only just on the outskirts of Paris – still within the Paris parameter. And I think projects as that new Paris, it just really exciting to just show that the city also had the potential to produce its own food. It might not be at the commercial scale because obviously we are not going to turn city to be a farmland. That's not the purpose of the city itself. But as we know that now people facing the food crisis and also the accessibility of fresh food is become really hard and tough for people, especially low-income families. And we have the opportunity to actually do that and be able to provide that to them. And I think be able to do it at your doorstep, it gives so much benefit to the community themselves because they'd be able to come and learn how you grow the food in such a scale.

Eliza:

There's something that it really can genuinely help solve some of the problems that are existing, whether it's on a personal, individual human level, whether it's on a more local identity and future idea. It really feels like it's a conversation starter as well to prompt people to rethink the city, rethink the Docks. Well, and I'm just thinking you've mentioned Paris. Was there any other places or projects that you've been inspired by and that particularly for the processes and the ways of thinking for this project in the Royal Docks?

First:

There are quite a few actually, but not the vertical farming as such. More of the farm-to-forks concepts. In Amsterdam you have about three restaurants that have their own garden. So they produce their own food, grow their own vegetables and use the farm-to-table concept and also open up to people to come and see how they're growing in their produce. But that's purely restaurant and hospitality. So there's a lack of other elements that we would like to actually showcase within this project because I think as soon as you start growing food and use a new technology with the vertical farm using hydroponics, there's a new technology involved means that it's actually opened up to new skills. And when the technology involved with agriculture and a new way of doing things, I think it's a bit more attractive also to young people as well. I think to become an urban farmer could be something quite attractive for young people in the future going forward. And as we all know, the economy around hospitality, it's also quite a big one. So the project offer this opportunity for those people to actually come and learn how to grow food and also can grow and learn how

to cook and train in hospitality as well. So that's quite a holistic element to what we are trying to achieve here.

Eliza:

Super interesting. But I'm also thinking at the same time, that's quite a lot. What is it that you need to make this happen?

Dan:

So I mean think this is, we had a bit of a discussion about meanwhile use and permanent use and one of the challenges that we've had, we've done some really interesting and exciting and had some real successes with meanwhile use projects. But the challenges about how you do these things in meanwhile use projects is how do you have a sufficient amount of time to fund, run, build up a reputation and deliver these projects. And actually my sense is that something of this scale and this with ambition probably is going to need a space that is around for, I don't know looking at First, but I think it feels to me given the level of investments and stuff that would be needed, you're probably really looking at a 10-year business plan to make this a success and for it to develop traction. And so one of the things that we've tried very hard to do with meanwhile projects that we've supported in the Docks is to make sure that they're catalysts or that there's things for them to move on or move into which are much more permanent.

And I think First is hoping to develop this project in partnership with the organisation called Projekt, who we have funded using good growth money to develop some really interesting creative workspace in a couple of buildings across the Docks. And the model that we've had with them is that they've actually now been able to lease long-term commercial space. And so they're taking businesses and organisations through some of the short-term meanwhile use space. And as those need to be redeveloped or other things happen into them, they're moving them into the permanent space. So it creates this virtuous cycle. And I think in the conversations that we're having with First and Nick on this project, it's really thinking about what is that longer term cycle so that this isn't a case of just doing something on a building site for two years that will then disappear. It's thinking about how do we actually develop something here that becomes a sustainable business that can be located in space longer term.

And actually, one of the really exciting things about the Docks because of the mix of spaces that we have available and the types of permanent development that we're creating, it really is a really significant mix of really interesting exciting places, which is why I think the Docks is such an exciting project. We're not just developing standard office or workspace across the docks, we're developing commercial boatyards production spaces, creative production spaces. And I think food production is one of those areas where there's absolutely really some big

opportunities for us to think more about how do we incorporate that into the sort of long-term permanent landscape for the Docks.

First:

Yeah, exactly. I think in term of the concept itself of this style of project, it's really exciting and as I mentioned, we not only just focus on the food growing but more of the food experience. That's how we want to create a narrative around the project. So we bring in those more viable commercial revenue to attract hopefully funding and all the partners we going to have a restaurant, we are going to have a farm shop, food vendors, food store, food market within the actual scheme alongside the food growing and also have a learning training facility which offers so much for the area. And I think the Docks itself, as Dan just mentioned, the location and the borough is really exciting because the Docks also have amazing connection. You have City Airport, you already have the o2, you have so many destination that's already well established and to make to become another new destination leading by food experience. Not only just focusing on the food growing spaces, but actually the food experience that people can actually come eat the food and they might not be interested in the food growing at first, but soon you see the facility, you still have the opportunity to wander around, have a look how the vertical farming actually works. So it's just kind of really open I think. And it just makes the conversation between the actual project and the public more accessible. Food just connect people together in the simplest way and that's how we would like to do it.

Eliza:

And I think there's so much potential when you kind of take away some of the boundaries maybe that exist when you're thinking about something that's going be there for 10, 15, however many years to kind of experiment in a different way. But I wonder how much of that actually impacts what will happen once the lease comes up, once the 10/15 years have gone?

First:

As I mentioned, well the side that we are looking at least we potentially have another 10 years on that particular site. I think the crucial thing about this urban farm project is just really need to get it off the ground and maybe we don't have to achieve such a scale to start off with because when you work with the meanwhile space, you try to get things going quickly and cheaply and that's how you prove the concept as well. So you've done the business plan for the 10 years and I think with the 10 years we know that that site going to be secure at least for 10 years and it's gave us enough time to actually grow the business and prove the concept that this could work, this could work with the site and hopefully by the time after 4 or 5 years we have the models and the operational models and how it's run in place and we'd be able to grow out to the different sites. I think this is more of a longer term for this project. So my ambition is actually if we prove the concept that this project could potentially work,

hopefully in the future for London, for local authorities, to actually start thinking about urban food growing as a part of the plan.

Dan:

If people haven't been to the Royal Docs, it's really worth coming down. Have a look at our website, royaldocks.london. We have a whole host of different activities and events. We have quite a big cultural programme, open houses happening at the beginning of September, so you can come and have a look around a number of the buildings in the docks, including the new city hall if you've not already been. We've got some performance pieces as part of the Greenwich and Docklands International Festival on the water at the beginning of September. The buildings that I've referenced that projects are involved in the Factory Project and the Silver Building, again, have their own programme of events and it's really worth coming down and getting on the cable car and not being on it and having a look around the spaces of the docks and check it out.

Eliza:

And if anyone wants to follow the journey of this particular project or other work that you're both doing, where are the places they should go to look for that?

First:

Hopefully we will be able to publish the project or have a bit of appearance of the project online very soon, but we can't really reveal so much about it just yet. Just yet. Yeah, but make sure soon something will get into place and we'll be able to share. Hopefully we share that through the This is Projekt website.

Eliza:

I think that's all the time we have for today, a massive thanks to First and Dan talking about the wonderful projects and the wider ambitions in the Royal Docks. We'll be back with a new episode in October, kicking off our 2024 season and sharing our theme for 2024 Festival. Until then, if you like this episode, you can follow Building Sounds on Spotify, Apple Podcasts or wherever you find your favourite conversations. If you want to know about LFA more widely, why not give us a follow on Instagram, TikTok, Twitter or head to the LFA website. Keep up to date with all the latest news on competitions and how you can get involved year-round. That's londonfestivalofarchitecture.org. Until next time.