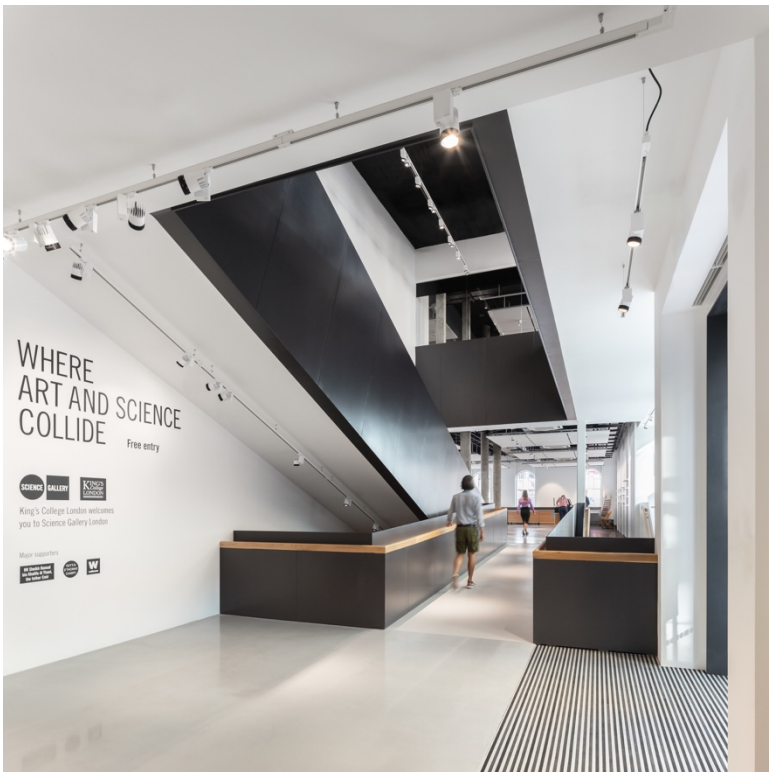
Gregory Shannon: Architect

Greg Shannon BA(Hons) Dip BRS Dip Arch RIBA co-founded LTS Architects in 1996 and was sole Director of the practice until January 2016 when Anna Woodeson joined the company[1]. Together they lead the studio's design direction whilst managing projects across the public, cultural, healthcare, education and residential sectors.

Greg studied at Cardiff University, Oxford Brookes and South Bank University, becoming a Chartered Architect in 1996. He won the national Otis Student Competition and was nominated for the RIBA silver medal. Alongside managing the practice and running projects Greg also teaches interior design at Manchester Metropolitan University and is an external examiner for Liverpool University. He has been a guest critic, and unit leader for a number of design and architectural schools in both the UK and the USA, including Rhode Island School of Design, Cardiff Metropolitan University, Manchester Metropolitan University, Westminster University, Bartlett School of Architecture (University College London) and the Royal College of Art. Greg maintains involvement in all projects from conception to completion and believes in a truly hands-on approach to work within the LTS studio. Having been appointed by King's College London to design the new Science Gallery London situated within the Grade II listed Boland House, part of the original Guy's Hospital, Greg led the team charged with unlocking the potential of the site and delivering a landmark building[2].



The Science Gallery London Main Entrance: © Photograph Peter Landers

Q: Do architects create their own challenges?

G: You constantly challenge yourself. If you take the design brief- we are designing the temple at the moment and there is a shopping list of functions it has to accommodate. Now in a half an hour you could arrange a series of compartments which fulfil that brief- a temple hall, kitchen, car park, landscaping- you could put them together; any one could actually if you work out how big they are, you could fit them together. So, you could come up with a functionable solution in no time at all. But that doesn't take you anywhere near far enough in terms of a solution. I think it's the difference between making something that's poetic and something more prosaic. You know when something has an idea at the centre of it and it's taking it to a conclusion rather than a shopping list of events.

Q: Does that mean there are different options at that point that you can choose from?

G: Absolutely. We've been through about fifteen different options in just one project of how to arrange the components of a temple on one particular site, all of which would have met the client's functionable objectives but none of them sit quite right because you know there is more- that relationship is not quite right, how does that work with the wider context, the street? There's a ton of things you are constantly cross referencing across each other. You are always trading off or balancing advantages: one thing will work well which will have an impact on some other aspect of the scheme that doesn't work so well: for example, you might put the temple in the right place but then the landscape is facing the wrong way because it's the wrong orientation. Then you say the orientation is more important and you start to have a little wrestle between different elements of the scheme. Eventually if you work at them hard enough, if you question them hard enough, things gravitate towards the right place. If don't question it, no, they've got no chance.

Q: Do you challenge yourself by trying something you haven't done before?

G: Yes. I think architects are often tougher critics of their work than clients, quite often. You might get to a situation where your clients happy but you are going 'it's not good enough'. So you have satisfied your client in as much as 'yes that's seems great; get on with the next stage.' But actually, you know it's not good enough, so you spend your own time making it good enough and then going through the trouble of re-presenting it to your client whose already happy, to make him a bit happier. And then you can see it. In our construction industry you have many people that can create buildings, architects being one of them. Architects are less and less leaders of construction projects. If you have a construction project that's not led by an architect but by a building surveyor or a quantity surveyor or a project manager or a technician, then they are going to get to a solution in an hour because they are not trying to find something else in it. They are just trying to find a solution that is buildable, pragmatic, somewhere near a budget. But if you start talking about beauty or poetry…

Q: When you say finding that "something else", is that something aesthetically pleasing- the beauty, the poetry, what does that really mean?

G: It's hard to explain but there's something in a project that just clicks when you get the components in the right place and the right relationship to each other. It's not just an aesthetical concern although that's part of it because there is some judgement about taste. You start at the beginning of a project that you can get to something that's going to make you happy, make your client happy. You've got it in your head- you don't know what it looks like but you know it when you see it and until you've seen it you can't rest, and you keep fighting it. And I would say that's what I would determine are real architects versus people who are just journeymen. You can't rest until you've found a solution that you think is good enough. I say it's not a great business strategy but perhaps it is because you actually produce buildings that are worth having and other people want them.

Q: Is that the kind of thing people sometimes refer to as an architect's signature work?

G: When I said that when you start a project you've got an idea of where this might end up but you can't quite visualise it, that end point would be different for different sorts of architects. A Norman Foster would be looking for a simplicity, an all-encompassing tent. Their concerns are different to begin with so their end points are different. But the thing that links all those architects which might end up with aesthetically very different things is the need for the search rather than settle on something too quickly. It doesn't matter how experienced you are you can't do it quickly. There are periods of creativity, gestation, anxiety. If it all comes too quickly, and this does happen, you start again because it's never going to be good enough. There's a famous architect Tadeo Ando from Japan who won't give a time span to his clients; he says it will be ready when it's ready. He works on projects intensely, then lets them gestate and comes back to them, moves them around a bit, builds another model. It's a time thing: if you are looking hard enough at all the things that affect a great building, you can't just knock them out.

Q: Is that how it was at the beginning?

G: I think what happens is as you get older, the blind alleys get a bit shorter and you get rid of your mistakes a bit quicker. Probably the most joyful thing in the profession of being an architect is when you click something, another turn and a whole series of things fall into place and it works. You go home smiling for hours and hours. And then you might get back to it the next day and think oh it's not as good as I thought! And then you get to those points when you find you've got something that is defendable to yourself, to your client, to the world, the communities that use buildings. You feel *utterly* confident in it. When you don't get to that point and you put up in a public consultation or meeting a client, you can't always articulate what's wrong with it but you know because you don't feel confident enough. When you feel confident, you can take anyone with you.The trouble is when you are younger, you hold on to mistakes too long. There's something that starts a project that really interests you and you get all that right but then you lay some complexity on top of it, you test it and it doesn't quite work but you are not brave enough to get rid of it because you think that's the centre of your scheme. You try to explain it to students like it being a rocket booster- it's the big thing that takes you out of gravity but then you've got to let it go and then you've got something else to take you to the next bit. It's not ever starting again which is what you have to explain to students.

Every project an architect does is a prototype. Big or small, you are bringing components and materials together for the very first time- they haven't been put together in that same arrangement, in that location with that set of relationships. There are a lot of little junctions and interfaces and it's impossible not to learn as you go through that design process as you work in different climates, different boroughs, different ground conditions with different design teams, different clients. That's the pre-construction, the conceptual stage, the working with builders phase, the realisation - that's what constitutes your experience and makes you better for the next one.…But the more important point is what I think makes a really good architect is someone who can start the thinking with a felt tip and some tracing paper and be there at the end. They have the experience through the conceptual phase, through the tendering phases, through the on-site phase and the hand over phases that you learn. You have lots of practices that might be good at the conceptual stuff, like academics and tutors who are very good at conceptual thinking. But actually, that transition from the conceptual to how you build on site is a mystery to them. The actual link through all of those phases, taking an experience here and looping it around so it's more circular; so, in the next project you go 'that conceptual diagram in the actualisation was too ambitious'. It is seeing project from start to finish- architects that only ever draw stuff or architects who only ever build stuff, don't ever do really beautiful stuff because you have to understand all of those phases.

Q: Do you as an individual not just as part of a team, reflect in the making and how does that change the original concept?

G: Your experience is tested to its greatest extent when a project's live and getting built on site because you have a team of people- a guy with a hammer - and you've got a problem in front of you and it needs to be solved. If it's not solved it costs someone money and time. If you have taken a project from that very first stage, you understand what's important about the idea and what is sacrificial. So, you can make ideas which reinforce the first conceptual thinking. That's when you really earn your money I think; it's the really expensive time, it's when you can't put a student architect in that situation because you can be so exposed. A bricklayer knows more about bricks than you do, a concrete guy knows more about concrete, a roofer knows about roofs- you've got to know a bit about all of those things and channel all the different avenues the solution to the problem could go that reinforces how you started the project. Or you could just get steam-rolled and you just give it all away.

Q: In the execution of a project are you working with drawings all the time?

G: Quite often the problem you are trying to resolve is when what was drawn is for various reasons not deliverable- not buildable. It could be something like the existing conditions were not as imagined or some of the product choices weren't available or there's a sequencing issue. You are no longer looking at the drawings. The drawings represent an intent, a set of instructions but you are looking at something physical, 20 foot underground or on a roof where two junctions are not working. You are looking at actual things on a site or you are in a workshop a factory looking at specific junctions that didn't materialise in the way you'd imagined they could. You are problem solving in live time with experts. It can be a very creative bit of processing because you are using proper experts who know how to weld things and put metal together. And there is you with your intent and a set of drawings trying to find a solution that makes everybody happy.

Q: Are there examples you could talk about from the Science Gallery project?

G: There is one- a typical thing. We dug a theatre into the ground; this is in an existing building which is five storeys high so in order to make a lecture theatre we had to take out all the columns, dig down and re-support four floors above us. Structurally that can be done: you put some very large beams across so where the weight was coming down into the ground previously, it comes onto a large series of beams. You can calculate very precisely how deep those beams have to be. That was all done and was all fine. The beams turn up on site and- how do you get beams into a building, through Georgian windows? At some point along the way, the methodology of that had been considered but they wouldn't fit. Meanwhile you have to prop up an entire building. In the end we came up with a solution that involved making window openings that were going to be modified later in the project- it was solvable. You probably could have got ahead of that one but when you look at the complexity of some projects, you are talking many thousands of decisions. The design team in the Science Gallery had 15 disciplines involved at least which could amount to 100 different consultants.

Q: About the Science Gallery, could you give an overview of the starting point and how it developed? Reflecting on it now what would you say about the process?

G: The Science Gallery is an idea that began in Trinity College Dublin. It was an idea to bring academic scientific research out of the laboratories and into the public realm. And as part of that journey to introduce artists to interact with different themes and create live exhibitions three or four a year that are made by the universities with artists, poets, sculptors for public display mediated by students. There are seven science galleries around the world so the content rotates internationally. What does a building need to do to accommodate that? It needs to be very flexible because you cannot predict the contents from month to month. There are lots of access issues about multiple events happening simultaneously: you might have a lecture at one end of the building, dining at the other end, some retail somewhere in between and a show that weaves between all of those events starting and stopping at different times of the day. You have acoustic issues that are the consequences of those different events, traffic flows of people, different servicing demands.

So what it all boils down to is you have to have a very robust, flexible building that is serviceable, mostly from the top in our case. You can drop anything down anywhere, fixing points, water, power, all of those things- very flexible, movable lighting. In this case, we were involved right from the very first conversation. We were involved in which building would best suit this type of brief. They had a notion of where it could exist. Then you ask how big does the science gallery have to be? And that is not a very easy question to answer. It's not as big as the last one because the conditions at Trinity College are entirely different. Kings College, the host for this science gallery are five or six times bigger than Trinity College. It's London, everything is different. We had to work out how big it needs to be and that's something to do with the physical activities but of course it is to do with the money. In this particular case, Kings College campus is shared in a chaotic complex historical way between the hospital and the college. Sometimes you think you are working on a university building and they turn out to be trust buildings and vice versa. It leads to a lot of political dialogue which takes a long, long time outside the design process which has a different trajectory. You have uncertainty- are we allowed to build on our neighbour's bit of ground? If we build on the left and give them a bit on the right etc. It was dozens of those kinds of conversations.

Q: What were the most creative things you were able to do with that space?

G: It was quite a difficult site because it is peninsula which means it doesn't have a front and a back. We were determined that the front should be in the town side of the campus not in the gown side, so it was a huge shop window introduced into a heritage setting. That was quite a challenge. Also bringing lots of exhibits into a listed building is very complicated. The size of the exhibits needs a good lift. The actual site that was given to us in the end was a metre and a half off pavement level so in terms of access for anybody this was complicated.

We took over what had been used as a public carpark for the last 50 years and turned it into the last reclaimed Georgian square in London. That wasn't easy because no-one wanted to give up their parking spaces. One of the things I always come back to is… the idea that you move forward with in the project needs to be coherent and tough because so many things will erode it on the way. If you don't start with an idea that is complete and fully understood and justifiable, it will get eroded by budget, by planners, by client, by swathes of people. If you say 'no you can't move that because that doesn't work' but instead say 'we can accommodate that' you end up with a nothing project at the end.

Students when they present their work often say 'well I really like it' and I say that's not a great defence because I can just say 'I don t like it and then we don't have a conversation anymore. You could say you like it because of this, and by doing this you can do this…etc and then you've got an 'argument' you can defend. Some say 'narratives' that you try and defend. They are not innate, they are hard fought for. It's that process I was talking about earlier- about questioning every decision- you know 'why is that wall *here,* and not *here*?' 'Why is that ceiling set at this height and not this height?' You are constantly testing them and saying is that right or it is something I'm being wilful about? You are testing and testing.

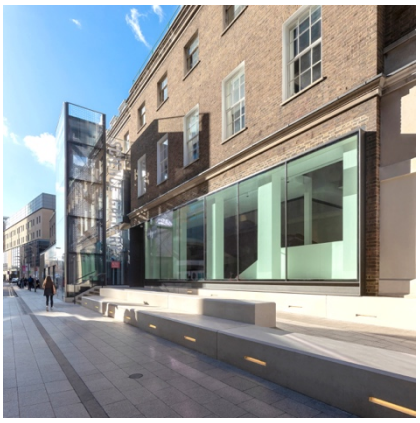
Q: That sounds like continual critiquing and evaluating what you are doing. I am interested in in the momenta when reflection takes place- or is it a continuous process?

G: It is continual. The problem with less experienced architects is they leave it in their own head too long; they try to resolve it in their own head and with their own hand. It can happen where we have design reviews in the office. We have clients' opinions, we have public consultations. It is tested externally and internally and the skilful architect can galvanise that opinion, listen to the things that make sense and imagine a series of ideas and re-present them.

Back to the Science Gallery, what was really fascinating about that was there were so many external consultees: so, we'd be talking to the gallery director and everything about the building was about making the perfect gallery; then we'd talk to a catering guy and everything the gallery guy said was irrelevant because he can't get his catering trolley through there etc; then you'd talk to the retail guy and everything's about retail talk to the theatre guy and it's the same… You have all these competing opinions about what the building is. Our job is to go 'how big is that opinion, how big should that idea be? How do you sell that idea being slightly reduced to one? You might design the perfect café, the perfect shop etc but put them all together and you'd have a lousy building.

You always get little surprises about how a building is used. All buildings are prophecies and you never quite get it right. That building is quite tricky because you are catering for six distinctly different events simultaneously. In order to understand how a theatre audience, a coach load of school kids and a different exhibition…Since it's been opened, all the different kinds of people I was describing earlier, despite buying into this buzzing vibrant platform for all these different collisions actually want to build walls around their domains. They are all talking about different walls. We had a big post meeting the other day and I said I don't understand where this is coming from. The point of all these things being in the same building is they are greater by their overlaps and not putting partitions around them: that's why they are in the same building. Yes, you are going to get a bit of noise pollution from here to here but that's the point…the compromises have to be the benefits.

Sometimes architects work out how the world *should* operate and get very annoyed about how people actually go about their business. There are examples where you can promote a different mode of behaviour but if you want to turn around nature that's quite tricky. Then architects bemoan the fact that people don't understand their spaces. All of that comes out of not having some dialogue or not wanting to listen to any feedback. Talking about the difference between artists and designers, we are not there to provide our exclusive vision of the world, we are there to add our experience into a series of problems that we can see a creative solution to. You could interpret what I'm saying as 'if you do your job properly you just test and analyse and it's about absorbing and reacting but somewhere in there you've got to have an 'attitude' to start with. All architects don't have the same attitude which why we end up with different buildings. I say I don't have much ego but I clearly have enough concern that I've got an attitude about where things ought to be, how we ought to end up.



The Science Gallery London: © Photograph Peter Landers

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[1] LTS Architects: https://www.lts-architects.co.uk

[2] https://www.lts-architects.co.uk/project/science-gallery-london/