Transcript
Cultural in Crisis – Preservation by Design
Episode 2 – Bridging the Gap: Uniting Heritage Craft Skills with Digital Technologies

Glenn Adamson: Donn, it’s a great pleasure to be here with you at the Victoria & Albert Museum.

Donn Holohan: It’s nice to be here.

GA: We’re, actually, together because we have an association to a project at another museum here in London, the Design Museum. I’m the curator for the Beazley Designs of the Year. This is the tenth anniversary of that series, and we’re very happy to have one of your projects short-listed for that Award and Exhibition Program. So, it’s called, The Wind and Rain Bridge. Could you just start off by telling, well, me, and the listeners at home about it?

DH: Yes, sure, The Wind and Rain Bridge, is the first in a series of projects that we have been involved with in rural China. It began as a reconstruction project through a community organization based in Fujian, where the project is based, who approached the University, because we had been engaged in other projects throughout the Provinces of Hunan, Yunnan, these kind of areas, doing post-earthquake, post flood reconstruction.

They wanted to build a profile, sort of, help it to engage with the community in their area and begin to think about how they could tackle problems of reconstruction and also urbanization from the rural to the urban in China. So, that’s how the project began.

When we arrived there we found that the main issue, the main focus, was not a problem of village reconstruction, but more of a loss of an intangible cultural heritage. China is kind of going through a funny phase where they’re moving very, very rapidly from a rural society to an urban society, and that process has been going on for the last 30 or 40 years. But it’s really accelerated over the last 20.

GA: So, you have a situation where there’s a real generation gap opening up, where there are older folks who are staying in the rural environment, and then you have the younger generations that are moving to the city in great numbers?

DH: Precisely that. And, part of the problem with that is, well - a problem and an opportunity – is that people go to the city, and they make their lives in the city, but most of the income is sent back to the village to reconstruct a village, or to reconstruct an idealised village, or what it might be. So, over the last 20 or 30 years we’ve seen a pseudo-normative construction begin to take place, which is the concrete – reinforced concrete, steel construction methodologies which are centralised in cities.

And, obviously, this means an erosion of the traditional ways of working. So, these normative construction methodologies were only used in the last 40, 50 years. Previously, all of the construction in China was earthen. It was wood, it was brick, it
was ceramics, and all locally sourced, and the trades and crafts that are associated with those were local, and linked to the ecology.

GA: So, what’s being built in the rural environments now? You’re describing it as ‘pseudo-normative’, I really like that term, but I imagine that it doesn’t look like concrete modernist blocks as you might have had in the Soviet Union in 1950s, and 60s. But, it also has the weird overlay of nostalgia.

DH: Sure. Well, it does, and it doesn’t. And what I feel it looks a bit like, or it is directly derived from is, sort of, s modern domino kind of construction, with the concrete frame, and then infill panels of brick, or cladding. And, that’s become very much the construction methodology across China.

And, what we’ve seen then because of this is that construction methodology, that all of the trades, the very precise and regional trades, and crafts have basically just evaporated - because these are oral histories, which are passed from master to apprentice and they’re so delicate that it just takes one generation, and those trades evaporate or they become dispersed, you know.

GA: So, your concern is not, primarily, then with the look of the architecture, or possibly even its social functionality. But, actually, with the production narratives, and the experience of the builders that lie behind it, and the loss of cultural know-how, really, that happens when the artisans are asked to completely change the way that approach building.

DH: Sure, yes, I think it’s not that precise, I think that the traditions and trades across China are linked to wider ecology in which they build, where they source the materials, how they build. And, they’re also linked to farming traditions, they have the occupation of the parents who have used those buildings. How they’re designed, it’s a kind of a holistic, sort of, process. Which, the modern, sort of, the modern buildings, the prefabricated, generalised structures tend to not acknowledge this link to the culture, a link to the material ecology, and links to the traditions that bore those.

So, for us it’s like it’s a synergy, it’s synthesis of architecture as opposed to a singular link to just an idea of construction methodology.

GA: So, when we look at a building, well, built in China, or anywhere else, we should think of it not only as that object that’s in front of us, but also the various chains of production that led up to its construction that really made it possible.

DH: Precisely.

GA: And, it’s like a feedback system, where the fact of that building being made is also having, kind of, aftershocks to the economy; to do with raw materials, to do with other factory situations, to do with labour force. So, a lot of implications arising out of the architectural decision-making processes.

DH: Exactly, I think China is an incredible place to practice architecture, simply because of the speed at which it is developing, and the way in which it is developing. So, it has
gone from this very critical regional approach to construction, and then its links to the, as you say, the more holistic ecology, economy, sustainability, both social and environmental. And, it’s moved to this other model, sort of, more European-American centralised model of construction, - which strips away all of those aspects, in favour of a construction which does not engage with those issues. Do you know what I mean?

And the difficulty with that is that it has effects and ramifications which are borderless. So, basically, for China to continue building in the way it does has serious implications for the rest of the region, and indeed, the rest of the world. When you think about embodied energy, think about the way the buildings are constructed, you know, there’s tons of statistics out there - that have just gone out of my head – but about the amount of concrete that’s being used and poured and the amount of emissions that this equates to.

Like, all of these are real, global issues, and China is at a tipping point in a way. And, it’s okay for us to look back with a lens of, you know, ‘we can’t develop in this way’, or ‘there’s another way to develop it’. And, for those people who are going through the development stage, we have to find ways and means of building, which allow them to modernise, and yet bring with them the cultural and sustainable practices. So, that’s kind of where the genus of the project is.

GA: One of the things that most blew my mind on this point recently was an article that I read about the global sand shortage. So, apparently, we’re running out of sand.

DH: Seriously, yes that’s true.

GA: Which is an incredible thing to think of, but, apparently sand of a particular grade which is required for making concrete is, actually, becoming scarcer and scarcer, and more, and more expensive. Principally, because of the Chinese building boom, but that affects sand production in the Middle East, and everywhere else.

DH: Yes.

GA: So, I guess this all brings us back around, Donn, to The Wind and Rain Bridge. So, what does that project contribute to the situation you’re describing?

DH: Well, it’s difficult. Yes, the project looks at a particular trading craft, which itself is just a way of highlighting the sensitivity that those trades and crafts have. Both to the wider ecology, and the social structures in which they are practiced. So, we worked with a very small community of craftsman, about four or five carpenters, which have the very last exponents of their craft in the village. And, it’s a large village.

And, these guys are getting old, the head carpenter is 85. So, these are trades which are very sophisticated, and what’s holding them back, what we felt was holding them back, were issues of complexity. And, also issues of cost. So, we talked about this area a lot in our previous discussion before this interview; the idea about how we make these trades and crafts competitive and utilitarian.
So, how do we offer an alternative to building? And, the way that we try to do that is through technology; through a distributive approach to manufacturing. So, how can we equip local craftsmen with the tools to conquer the complexity that’s inherent in the joint, in the traditional timber construction, which you don’t find in concrete or steel construction, prefabricated construction systems, which are much simpler, much easier, and much more accessible in a lot of ways, to people who are building their own houses.

And, many of these houses are self-built, that’s important. So, The Wind and Rain Bridge, is an expression of that. Its how can we take a very complex tradition of building, which is the timber house construction of the people, and then transform it through technology into a simple, systematized, distributed, manufactured approach. Which ties into their local economy and which allows these guys to continue to practice their craft.

Then also this offers a real ecological alternative to what’s being constructed. So, The Wind and Rain Bridge, is just an expression of that. And, as I said, there’s a number of ways we could have made this bridge simpler, or, you know, spanned that distance in another way, which would have been, probably, more time effective. But, this was really about training us and the carpenters in a new way of working, and hopefully, that would have wider impact later on.

GA:  Donn, can I ask you about the form of the bridge.

DH:  Yes.

GA:  So, you’re describing it really beautifully from the point of view of its making.

DH:  Yes.

GA:  But, it’s also just aesthetically an incredibly arresting, and unusual object, so it steps up and up and up. And, has this graceful gesture that it makes across its span, and it travels through steps, each of which is made through what looks to me like quite a specific joinery system.

DH:  Sure.

GA:  So, can you just say a little bit about why the bridge looks like it does?

DH:  Sure, absolutely. So, one of the other interesting things about working in China is the fact that they have an incredible resource of vernacular architecture, which is just so diverse, and so complex, and so specific to each region. So, the Fujian, the province that we work in, and the area around it is well known because it’s a very mountainous area. There’s a lot of rivers, and there’s a lot of crossings - well, there were a lot of crossings - and they made incredibly elaborate bridges. So The Wind and Rain Bridge, the title comes from a direct translation of a particular vernacular typology, which is why it’s called The Wind and Rain Bridge.
These bridges were generally placed towards the entrance, or the opening of a village - where people would enter and exit through. And, they became more and more elaborate. They became places for gatherings, for dwellings and even markets took place there. There are temples, a lot of them have temples inside, and so they became these incredibly civic structures.

GA: And, they’re always covered, so you’re protected from the wind and rain, yes?
DH: Exactly, they’re covered – they’re protected from the sun, they’re protected from the rain, and the wind. And in doing that you’ve created a community space at a crossing, at a point into that threshold, into the village. Which is incredibly interesting typology and incredibly unique, I thought, and actually it’s something which with the onset of the concrete road and the rail system has just been completely eradicated.

So, these types of buildings do not really exist, only in memory or in historical preservation, or preserved sites. So, it was a desire to look at that typology, to see what it could offer, and to kind of reinvestigate how we can mesh the technical building sites with a more socially engaged architecture.

So, the bridge has depths, as you say, and that’s only really a product of the site that’s within. So, this particular bridge serves about 30 to 40 acres of farmland, which can only be accessed across this bridge, and where people will generally bring the produce across and back to the village. And, in doing that, they often stop, they pause, the sit, they smoke, they relax. You know, it’s a place, and its great to see that happening.

So, they begin to engage. That’s another reason why I think that this type of structure and this way of thinking - in terms of the synthesis of things – and bringing the historical sociocultural element into the project. And, it’s so important because this is what makes a project last. This is what engages people with the project. And, yes, we could have done the bridge in a number of easier, simpler ways but the fact that we’ve made aesthetic choices, that we’ve made areas to sit, to rest etc. and the bridge actual flares out as it goes into the farmland, and then compresses you as you go back to the village.

So, you get a feeling of crossing a threshold. You get a feeling of space, and you’re protected. I think that also engages the imagination of the people. So, we’re trying to engage with the technical aspects of actually building and creating models of construction. But, also, we’re trying to engage people’s imagination to show that the cultural side is equally important in this process.

GA: Was there a bridge there already that you were replacing, that had failed, and you, you know, needed to provide a new way for people to get across, or was it more a case of a long standing need that hadn’t been fulfilled?
DH: There was a bridge there that was built about 25 or 30 years ago, which was basically a concrete plinth, which was built to replace an old wooden covered bridge. So, what we’re doing is stepping back, I guess, two generations to reinvestigate the original covered bridge. And the route that it’s on is actually one that’s becoming more and
more defunct. As the village itself is making a transition from a rural agricultural position to a more touristic, and I don’t know, ‘tertiary’ existence.

So, what we’re trying to do is bring back the old routes that circled the village, that circled the farmland, as a way to engage with the site. To allow people who visit the site to experience the village in another way. And, then also to look again at how it’s made. The bridge that replaced the traditional wooden bridge, which just fell down due to disrepair and a basic lack of manpower; a lack of skills to keep it in place, because, a part of these wooden bridges, is that when they’re built they need to be regenerated.

So, it’s a consistent process of repairing, cleaning, oiling, changing elements, fixing elements. So, it’s not something that you just put there, it becomes a duty of the village to maintain this, which is, I thought, a very interesting aspect - for something possibly off topic. So the concrete bridge that was replaced there was incredibly utilitarian, very cheap, but when we had this incredibly strong flooding in 2014, they just toppled over. It didn’t have the ability to move, or to adapt to the rising water, and the moving soil.

GA: It seems like there are so many examples of that, where you have these analogue, traditional technologies that have been in place for centuries, that are actually quite good at weathering, in this case, literally, weathering change, and events. And, in the 20th Century, those were often replaced, or displaced by modern technologies that seemed at the time to be superior...

DH: Yes.

GA: But, actually, because those technologies were often dropped in from a distance, or attached to a one-time funding scheme. Or, were, literally, materially not as sound as they were thought to be when they were first put up, and one thinks here, of concrete block architecture in general, which turns out to be very poor at withstanding weather conditions, water incursion, and so on.

Actually, what you find is that the progressive narratives of the 20th Century were completely backwards, and that, maybe, unsurprisingly, the very long period of accumulation of human know-how that went into these older structures, is actually, highly superior over the long run. So, what you’re doing in this bridge, is really to leap back over that period of modernisation, go back to something that isn’t that tried and tested, but also approach it in a way that’s – that’s optimised for the 21st Century.

And, that brings me to a question, maybe, more broadly about your practice, which is the role of the digital, and technologies that actually haven’t existed for a very long time, and how you’re using those as a way of engaging these artisanal communities?

DH: I think you brought up a lot of really essential parts of this project there, more eloquently than I. I think the process that we’re going through is exactly that; where we see these vernacular processes as treasure troves of information. Basically, we’re not trying to be reverential. We’re not trying to look back nostalgically almost, and
save these typologies. Instead, we’re looking for their – I hate to say, design intelligence. But, some other phrase which is close to this, but we’re looking for those essential qualities, which are useful.

And, then we try to find out why they have failed. And, generally, not all the time, but in many cases, it’s purely economic. There’s a tipping point, as soon as something becomes cheaper, an alternative methodology seems to be favoured. So, if we look at light weight steel fabrication, which is also something that is used a lot in the village; this is cheaper than building in wood. So, this is why it is favoured over the older types of construction even though it has failings.

And, what the digital tool helps us to do is to conquer this complexity. So, when we look at the traditional type of building we try and extrapolate the essential quality; what makes it important, what makes it durable, what makes it, sort of, useful, why is it useful? Then we apply that, sort of, we use a digital tool to, figure out how to do that in an easier, simpler way.

So the bridge, for example, uses a dovetail housing joint, which the carpenters use to span longer distances. They basically tie two beams together. But, this is a three-dimensional dovetail, which is quite technical to do so it’s very difficult for them to do, and they’ve refrained from doing it a lot because it’s expensive, there’s a lot of man hours involved in cutting these very precise joints.

A lot of the time involved in that is in marking out these joints and defining where they go. And, also, then triangulating the structure. The assemblies can get complex very, very quickly. So, what we did with the digital tools was to again extrapolate the essential qualities, find what that joint was doing. Then to digitise it, parametrise it, and then use robotics, and CNC equipment to produce a range of jigs and tools, which we could then give to the carpenter, which augments their hand process. So, really to augment it as opposed to a change in construction methodology. If that makes any sense.

GA: Yes, so it’s sort of like in a standard wood shop, let’s say, in the 1950s you would be running your lumber through a plainer to get it to be flat on both sides, and consistent thickness. So, the raw material would often be processed by machine, and then hand crafted take over from there.

DH: Exactly.

GA: And, what you’re doing is expanding the toolkit of preparatory stages, so that when the artisan is actually spending time and effort their knowledge is really being put to best use in creating value.

DH: Because, these craftsmen have inherent knowledge about the material itself, and they know how to perform, so they know how to cut it. The tools are, actually, incredibly beautiful, and well designed. Like, the way that they’ve evolved, and I always go back to this, idea of intelligent design versus evolutionary design. And I feel like the modern construction methodologies in steel and concrete, and these prefabricated elements
are intelligent design, where we’ve looked at the problem and we’ve tried to come up with a solution.

But, because the issues are so complex it becomes almost impossible to factor in all the issues and problems, and to produce something that’s going to be functional, useful and long lasting.

GA: I feel like -yes, I was just going to say, I feel like there’s a real disjunction that’s happened in the 21st Century, between the public perception of technological advancement which could be exemplified by an iPhone. So, this small frictionless, apparently very simple object that’s almost like a designed suppository for the culture that does anything. Supposedly has all of these different functions, and seems like magic, we don’t understand how it works, we can’t repair it. When it does break we have to throw it out and buy another one, which, of course, is exactly what Apple wants us to do.

And, against that, you have something like carpenters tools in a traditional Chinese context, which have so much material intelligence built into it.

DH: Absolutely, yes.

GA: And, yet, we tend to think of that as a, kind of, bygone historical mode of operation.

DH: Absolutely.

GA: And, we don’t notice the fact that, actually, the carpenter’s tool has just as much material intelligence in it as the iPhone. And, in fact, the very nature of it as a purpose built, one use tool, an instrument that’s exactly optimised to do one thing, probably places greater demands on it from a certain perspective, and this other thing that is so omni-flexible.

DH: Yes. But, I find it really interesting, as I said, the evolutionary design of these tools. And you’re absolutely right, I think people disdain the sophistication of these traditional tools when, actually, when you look at them, the knowledge that’s inbuilt into just this [inaudible] which is it has to be tempered in the right way, the steel has to be the right structure. It has to be honed, and sharpened, and has to be treated in a certain way for it to work.

It has to be the right weight, it has to fit in the hand of user, multiple users, and be able to do so much, do you know what I mean? It’s tool which allows you to do a huge variety of tasks. You know, it seems simple, but it’s not really simple, I mean, and that knowledge is often glossed over in favour of, as you say, a desire to follow the high technology of art here.

But, you’re absolutely right and I think there’s something really interesting in how we look at those tools, and how we can use them. And, you know, how we can begin to optimise them, and that’s what we’re trying to do. So, we’re basically trying to evolve the tool further, not to replace the system that exists. I don’t think we’re innovating in that way, we’re just following a long chain of evolutionary design, where we look at
the tool and see how it can be even more refined and changed to make it suitable for a new task, or a new set of...

GA: Yes, you know, that raises another question for me, which is about the relationship between symbolic and practical features in the bridge. And, this is something that we’ve thought a lot about in the Beazley Designs on the Year Show, in which the project is featured. That there are many designs that seem symbolic, but actually turn out to be quite practical. And, one example of that would be the refugee flag that was designed by, Yara Said, who herself was a refugee from Damascus.

And, she had created this flag for the stateless, working with a group called Refugee Nation, that originally was basically just an emblem. But, then once it was accepted, and she won the design competition, and it started to get a lot of media attention, they were able to create a small business whereby refugees living in Amsterdam, where she is now located, were employed making the flags.

DH: Amazing.

GA: And, selling them to provide an income. And, there are many examples of this, where these really compelling designs, to me, are the ones that fluctuate between the symbolic and the pragmatic. And, I guess, it would be true of the bridge as well, in the sense that if this whole region is aiming now for a more touristic base to its economy, rather than traditional agriculture.

It’s like the bridge does have to, obviously, stay up.

DH: [Laugh] yes.

GA: [inaudible/crosstalk] so it needs to be functional in that sense, and also functional in the sense of empowering this local artisanal work force. And, it also needs to be functional in a softer sense of, looking right. And actually fitting in to this aspirational touristic economy.

DH: Sure. Yes, I think that’s a developmental issue, I think that’s key. The problem working in these communities is that we often tend to idealise their lifestyles. These people have hard lives and I can’t stress it enough. And they do not have the same value set that we do. What they are looking for is what we have, in a way, in the West. And, I say that very poorly, in terms of quality of life, and they’re reaching for emblems, like the iPhone symbols, really, more than anything else, of wealth and of progress.

So, you have to tread a very thin line where being conservative, and we’re looking at the past, and how that can inform the future. But, we also have to very carefully look at the future development and the area. We have to find a way for these people to move their economy forward. And, and I think tourism is a really important part of that, potentially. But, the way in which tourism is practised, especially in rural China, is quite extreme.

It’s like the McDonald’s tourism I guess, it’s these developments out - in fact, what tends to happen, is that these developments become self-defeating, because local
people invest in them, and often take out large loans and mortgages to pay for a development infrastructure...

GA: Oh, I see.

DH: And, then they often can’t support that within the village. And, then they’re forced to migrate out, which further makes this rather – I don’t know - further makes it more difficult, is the word I guess for it, they diverge just to sustain themselves. It’s an issue of sustainability. So, the bridge, I guess you’re right; it’s trying to look forward to a future where we can marry technology and history together, in a way that allows for the development to happen, but is not stultifying their development.

It’s not a historicist or a nostalgic approach from a Western lens, a Western Architectural lens. We’re not looking through it, and saying - telling them - how they should want to live, or how they should develop. So, the bridge is – the important part of the bridge, is that, its not the bridge itself. So, you’re absolutely right, even though it’s a very specific material intervention which just has to work and function as architecture, in the way that it reacts to the site and the way it engages with the social and other issues.

But, it’s more important in an almost a symbolic way, to make sure that there is another way to develop, which utilises local crafts and technology. And then one measures it, fuses it with other schools of disciplines of architecture and design that are happening around the world. And then tries to find a way to move forward, but in a different way than – and that’s really what we’re – we’re trying to achieve with both of the projects. Then going forward that’s something we’re trying to achieve with both the projects. Then going forward that’s something we’re trying to push and to self-start in the village.

The bridge is just one project, and then it’s followed by a second project, which is called The Sun Room, which is bamboo craft, and looked at bamboo weaving. We’re trying to develop specific projects which approach specific crafts. And, then our final push is towards what we’re calling a living museum, which is about creating projects within the village itself. So, we’ve now equipped the local people with a toolset, I guess is the way to sort of explain it.

A way of working, a methodology, by which they can look back, and look forward, and create an infrastructure which doesn’t impoverish them at the end of the day.

GA: So, one interesting thing there, is the fact of a long-term commitment to this one community. And, it’s often said that particularly European and American designers tend to drop into a community - parachuting in.

DH: Sure.

GA: Do one project, and then pat themselves on the back, and leave.

DH: Yes.
GA: And, I’m interested that you’re returning to the same place and working with the same people and really committing yourself to long-term improvement. What’s the reception been to this – I mean, maybe intervention is a fair word to use - after all you’re Irish and you’re based in Hong Kong, but then working even a further step removed, in rural China.

DH: Yes.

GA: So, what has the response been to your involvement there?

DH: It’s difficult to gauge, when you’re in the village it’s incredibly welcoming, people are incredibly supportive and they want to be involved with the work that’s going on. But, it’s hard to gauge how deep that engagement is, whether it’s something they’re doing as a hobby, or something that interests them. Or, if it’s actually it’s something they believe in. Because the reverse of that is apparent everywhere, so if new constructions throughout the village are just practical constructions, completely utilitarian, with no real connection – not a real direct connection - with their culture; I guess, that it’s imported. So, it’s hard to know.

I think that unless we can engage with them in a way which completely holistic, which offers them a really viable, alternative way to practice the development - because I think’s that’s a really key part of this - is that these developments that happen in these rural Chinese villages are self-built. They’re not systematised, there aren’t external construction companies or developers coming in and developing parts of the land. The village itself is community owned and the land is held in trust, basically, by the village itself.

So, they are very much in control of how developed their area is, and what’s interesting about that is that there is huge potential within that model to change how you would look forward. But, this tends not to happen. It tends to always go back to the pseudo normative construction, or the pseudo normative approach to building in the village, and that has a huge effect. Over the last two or three years I’ve been involved in the same area that has totally transformed. The village has been totally transformed. They’ve put in lighting, they’ve built, basically, an alternative village which is besides the old village, in which they actually live. And, the village itself has become almost a pastiche, almost like a theme park, and this is a development. And, so it’s hard to know when we came there first we tried to come in in an advisory level, and offered them alternatives to how they might develop the village, how they might look at other models. And the Wind and Rain Bridge was a way in which we could, sort of, exemplify that process.

And they have been really supportive with it, but it hasn’t as of yet, really, I feel, made a difference. I think, the problem is we need to find models; practical utilitarian models by which they can push it forth themselves. And the way to do that, I think, is only through self-start approach. They have to take ownership of these projects.
I still feel, very much, that they see the Wind and Rain Bridge, and they see the following project, the Sunroom Pavilion as University of Hong Kong projects; which just happen to be in the village that they’re living in. And I believe it’s been very positive, and it’s definitely – even in terms of engaging a new generation of people working within the village. So, with the second project, with the Sunroom Project we did, this is a trade which is even more on the brink than the carpentry, this bamboo weaving craft.

And, there is literally one practitioner left in the village and this guy is 95, and literally fell during the process of the construction. So, he’s no longer practicing. But, what we did get an opportunity to do was work with his grandson, and his family, and now they are trained in this craft and tradition. But, they’ve also seen a way in which it can potentially move forward, and this is something that they are doing. Self-starting themselves, now they’ve, sort of, creative their own bamboo weaving business on the back of this pavilion that we’ve made. And, that’s really positive to see.

And, I think that, if we can keep focus on this village, we’re looking at this village in particular because this impact, or the change that we need to see happening, is a slow process. It’s a slow engagement process. But, I think it’s possible, but there’s a lot of aspects that need to come together for that to happen.

GA: I guess there’s a temptation for designers, particularly, younger designers, perhaps, to focus on the sexier aspects of the occupation. So, you think about the aesthetics, or the symbolic, or innovative aspects of what you’re doing. But, the more - perhaps tedious - aspects, like developing a business model, and actually thinking about how those economic footprints are going to pan out over a long period of time. Perhaps designers come to that less readily.

But, increasingly, it does seem to me like the awareness of the hard dollars and cents side of things is becoming embedded in design education and design practice. But, I guess, it prompts maybe a step back in our conversation where we can think about the larger global situation, and you’re encountering one version of this. But, it seems like we’re at a point now in the early 21st Century where many communities are facing a, kind of, devil’s bargain, in the sense that there’s an option between either, deprivation, or ‘Disney-ification’.

So, either you become a theme park, pastiche, nostalgia trip of your own past. Or, you don’t play ball, and you just decline, and become depopulated. And, here again, I’m really thinking about communities that have a rural history, rather than cities which have their own issues, of course. But, particularly, artisanal based communities. So, we also might think about how we could develop larger scale strategies to support these artisanal redevelopments, and sustainability campaigns, and I wonder if you have any thoughts about that larger scale macroscopic set of issues.

DH: Well, yes, difficult. I think you’re talking about the institutional, strategic side of conservation - conservation, I guess is a word - or development. I think, from a Chinese
perspective and from a personal perspective it’s difficult to even see how that would happen, because of the rate at which the change is occurring in China.

As I said, we’ve been involved with this bridge, or this project for the last three years, and even within that three years we’ve seen incredibly fast development. You know; fifteen new houses, new road infrastructure, all of this stuff, and with that, eradication of potentials. So, whether or not, we don’t even have time to dwell on whether or not it’s the right move, or what strategy we should employ to help these communities. We’re at almost like a scramble just to retain the essential information, the essential qualities of what makes these crafts and traditions worth saving - or worth archiving in the first place, I guess.

It’s really difficult to, sort of, imagine what a macro response would be. I think it’s also maybe a mistake to think about it in those terms. Potentially, what we need is a micro individualised response to this sort of crisis we’re looking at; we engage with individual people, in individual villages, and we try and find solutions which are right for that particular area.

China is – and when we talk about China we have a tendency to think about it as a unified nation, whereas, really China is a hugely diverse population and set of cultures which could be easily equitable to Europe in terms of its set of countries and its set of towns and villages, in particular customs.

So, I think the only way to retackle it is on the ground. Now, a framework by which to work, which to engage, is definitely not a good idea. It’s better to have a set of rules by which each splinter cell could, sort of, ascribe to a set of principles. Perhaps, a way forward, but it is very difficult to imagine how that might happen.

GA: So, the goal would be not deprivation, not ‘disney-fication’, but diversification instead. So, you would be thinking about the locality of these resources, and trying to keep them in place. But simply helping them combat these adverse forces that threaten to make them, at least, in the short-term unsustainable, and I guess one of the things that I always try to remind people of when we’re talking about these craft traditions is that although they might seem expensive in the short term, in the long term they’re probably quite good value for money.

DH: Absolutely.

GA: Because they often have, for example, environmental footprints that are much more sustainable. So, in many cases we make these easy choices to opt for mass production, or what you’re describing as these pseudo-normative building practices, in preference to what seemed like slower, more skill intensive practices that require a lot of training, a lot of actual body effort.

DH: Yes.

GA: You know, literal expenditure of calories by the carpenters, or the bamboo weavers. But, in fact, if you look at the whole system, the whole production chain from the raw
materials out of the ground - or out of the forest - down to the building site, and then into the future in the life-cycle...

DH: Yes.

GA: ...of constructions, you would find that the artisanal practices are actually much, much more efficient.

DH: Absolutely.

GA: So, a lot of it is getting out of this short-termism mentality, and simply getting people to realise what’s actually happening, rather than the next two months, which is maybe what they’re thinking about.

DH: Absolutely, and I think it’s an educational issue at the end of the day, and that’s why we’re very keen to be in the village long-term. Because, what we’re trying to do is show that there are other options, it’s not just one, as you say ‘Disney-fication’ or the other, which is some sort of deprivation. There are other options, you can take the best of what you have and evolve that tradition as you always have, and actually, that’s the safer bet, as you say. That, you know, if you look short-term it’s terrifying.

Actually, if we continue to build in this way, or they try to continue to build in this way, that’s serious. Ramifications globally, and death certainly within China, which is already in an ecologically tenuous position. So, it’s difficult. I don’t know what the solution is to it. But, to pick up on your point, which is that these things are often more efficient, I think, that’s the nub of our work. You know, we’re trying to quantify what that is, I think.

And our goal is to develop a sort of a construction manual, or a set of protocols by which we can demonstrate that. I think that doesn’t really exist. Certainly, not a body of evidence that shows what you intuitively hold as – which I feel, from being on the ground, is the case, that these – that these local craft magicians have huge efficiencies inbuilt to them, in terms of its connection. It’s like physiology, it’s material, but also in the way that they are constructed is also, actually, quite low energy.

You forget that mechanisation is incredibly highly energy intensive, and the more mechanised it is the more energy and efficient it is. Cutting a joint by hand is extremely low energy in terms of calorie. And, if we’re in an energy economy and we’re trying to conserve energy, and we’re trying to find better ways to use energy then those systems, like intelligent systems overlaid on top of hand systems, seem to be the way to progress that. That’s our intuition, and these projects are helping us build a body of work which can describe that.

GA: You know, weirdly, the 21st Century might be exactly the right condition in which to find solutions. Because it’s often said, and this is originally with me, but we’re going from a manufacturing, or energy intensive economy, to an attention economy. So, the value is being created much more through the direction of simply paying attention, public awareness.
DH: Yes.

GA: And, that itself is coming to claim a much larger section of the economy, and so, in that set of conditions something that has the charisma of the Wind and Rain Bridge, might actually have a value far beyond its material footprint or whatever direct economical values it’s providing for that group of farmers, in that particular location. So, there’s a, sort of, cautious reason for optimism there.

DH: Well, I hope to say, I think it’s interesting what you were saying earlier about the symbol, and the material, and it’s funny that I always saw the bridge as a material response, and actually now that I think about it, the way it’s positioned is definitely more of a symbol. Do you know, I keep thinking now that we could have tackled the bridge in a number of more straight forward ways? But, the fact that we as a village of students, and a village of craftsmen, and collaborators came together to build this incredibly complex structure, which isn’t...

...It’s not an accolade. We overcame that, and we could show it could be done in a very short period of time and with very unskilled people. That in itself is I think - yes - could hopefully galvanise further projects it has helped to develop - and maybe, earlier, I was a little pessimistic as to how much of an impact the projects are having.

But, I feel they could, and I just hope that we can. It’s why the Beazley Awards is amazing, because it has such a wide-reaching platform, even the villagers are aware of this! So, over 9000 kilometres away, and they’re in a rural village in China, and they’re texting me saying, ‘congratulations on the nomination’. So, these have a huge impact that I don’t think that the architectural design community would really foresee. We often think that we’re just talking to ourselves in a vacuum, or echo chamber.

But, you know, it is having an impact, and I think the more that we can publicise these ways of working, and to show that it’s potentially viable, I think, the more we can have a real discussion about how we develop our rural areas and our urban areas.

GA: Well, that seems like a great place to leave it. Nice to end on a note of optimism there.

DH: Yes, that’s always good!

GA: Although, the challenges that we’re all facing together are real, but it sounds like at least we are facing them together. So artisanal, and academic, and Chinese, Irish, and certainly people from many different places, and coming at it from different positions; skilled, or unskilled, as architects, or carpenters. But, doing it altogether collaboratively. So, maybe, that is some kind of an answer.

DH: Great, Glenn thank you for having me.

GA: Well, it’s been great to talk to you here at the V&A, and I can’t wait to see the Sun Room, and the Living Museum, and everything you do next.

DH: That’s great, that you.
END OF AUDIO RECORDING