PRODUCTS WITH PROVENANCE: DEVELOPING A SENSE OF PLACE IN PRODUCT DESIGN EDUCATION

Lyndon BUCKAston University, United Kingdom

ABSTRACT

What role does locale play in shaping design identity? How do designers see their own sense of place made manifest in their work? How can we encourage a sense of localism in young designers? Product design is particularly susceptible to globalisation; its relationship with technology links it to greater homogenisation. The nature of trends and notions of "good design" engenders a sense of place and localised design identities, but by definition design is a solution, and solutions cannot be divorced from the problems they address, from their context. This is where sense of place comes in and why it is important; it roots design in its most fundamental reason for existing. Without a sense of place, design can look great, work well, be interesting and engaging, but it can't truly be effective. This paper considers student projects over a 15-year period that trace the development of a methodology where place of design, manufacture and use become key drivers for design outputs. By focusing on immediate surroundings, a series of design projects question the nature of local materials, people and society, through local industry, football teams (from Potters, Glovers and Hatters to Chairboys) and social history. The outcomes help to inform students of their surroundings and encourages them to explore and engage with the localities. A defined sense of localism helps to place them, to settle them into new homes and workspaces, and to understand the nature, history and context of their new areas.

Keywords: Localism, spimes, blockchain, product narratives, provenance, placemaking

1 INTRODUCTION

Developing a sense of localism in students through involvement with local industry, materials and society is not new or radical, but the use of spimes and blockchain technology to explore product data and use to consider new product narratives and scenarios of use is growing. Using product provenance to develop new ideas of product lifecycle and inform lifecycle analysis and circular design models, a range of student design and make projects were undertaken with local industries, exploring roles, use of local materials and expertise, and with international partners, considering how designers work with materials and techniques from distinct areas and societies. Students began to consider design miles as analogous to food miles, a form of product terroir, highlighting the role of localised production and distributed manufacturing such as maker spaces and micro factories. Project outcomes show particular emphasis on how this approach allows students to consider product attachment, longevity, personality, narrative, and group affiliation to increase product longevity and alter user behaviours. How might a fuller understanding of material, user and product life stories change the way that we design products?

1.1 Background - football taxonomy

Importance of place is embedded in university DNA, not just traditional "red brick" institutions but also those formed to serve local industries. Many UK HEIs (Higher Education Institutions) evolved to train and upskill workers needed in and around the local area, with the workers in turn shaping the towns and cities that built up around them. This importance of trade is reflected in the names of many of the 736 football clubs that compete in the FA Cup [1]. Potters (Stoke City), Hatters (Luton Town) and Chairboys (Wycombe Wanderers, High Wycombe) all reflect more about local industrial heritage than the name of the local university. Some HEI crests or logos may still reference from where they evolved, in particular those that developed to train local industrial apprentices, but this is increasingly rare, with

for example Buckinghamshire New University (High Wycombe) (BNU) removing in 2022 any reference in their crest to the local beech woods and furniture trades that made them famous [2].

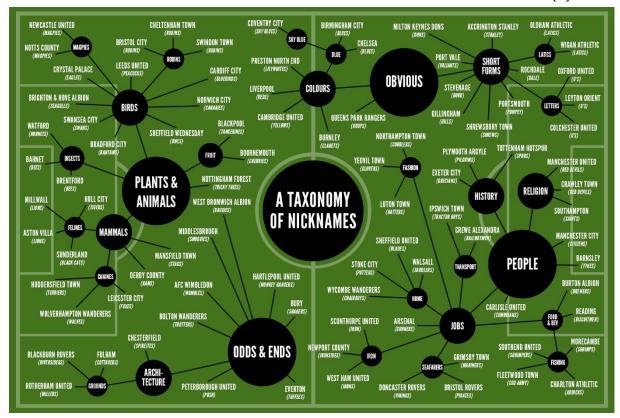


Figure 1. A Taxonomy of Nicknames – the informal fan names of English FA football clubs [1]

1.2 Spimes

Spimes [3] (a contraction of "space" and "time") are objects that can be tracked throughout their life, emerging through the convergence of technologies related to manufacturing processes, identification and location technologies. They are small, inexpensive means of remotely and uniquely identifying objects over short ranges such as RFID or long ranges such as GPS. Spimes allow us to track objects from concept to manufacture, ownership history, physical location, until eventual obsolescence and return to raw materials. If recorded, the lifetime of the object can be archived, audited and queried, raising awareness of materials, context and narrative of use. Spimes date back to 2004, when the US military demanded all of its suppliers attach Radio Frequency ID tags (RFID or "arphids") to military goods to aid with inventory and logistics. How will spimes allow designers to produce products with provenance, and how will this affect engineering and product design, and the way that we teach them?

1.3 Blockchain technology

London-based, Czech designer Martina Spetlova integrates *Provenance* blockchain technology into her clothes, insisting "it's more about stories," cutting through the technical jargon and focusing on the benefit to consumers. Blockchains are a trusted system to make supply chains more transparent, and gain consumer trust by allowing them to see where their purchase comes from. Spetlova packages the information into a wash-proof chip stored inside the clothing which can be scanned with a phone to unlock a link detailing the clothing's journey. The link can also be shared online as a way to provide this information for consumers who are curious. "Unless you really want to know, you don't need to know that this zip has been delivered from YKK to Martina's studio on that day, but it's more about working with communities where you can read about where they're based, you can read their story, see pictures, it's a little bit more of an emotional attachment to the pieces," explains Spetlova [4]. Having so much brand information so easily available on the shop floor without the need for sales assistants to remember it all will appeal to both sellers and buyers, it's a far more advanced, detailed and trustworthy alternative to a "made in" label. The consumer can be connected with the designer directly for repairs and they can add themselves into the chain to show the next stages of the product's life. This part becomes even more interesting if the product is passed on to multiple users and it makes the future of

authenticating vintage products potentially a lot easier. Blockchains are largely focused on problem solving, of verifying goods and certifying sustainable supply chains but they also allow users to engage directly with the story behind the product, and to become part of the product narrative.



Figure 2. Martina Spetlova: M-Woven fabric; Selfridges display, London; blockchain fashion label [4]

1.4 Low fidelity methods

Spimes and blockchain allow designers new ways to integrate technology into their products and allow users to trace the provenance of their purchases. Spetlova's scannable chips give a digital life story of materials, sourcing and processing, allowing storytelling and embedded narrative which helps to build consumer, producer and supplier trust. But there are many other ways that designers can draw influence from their locality, from the materials that surround them, and from local history, people and industry. Over a 15-year period a range of design and make projects were conducted with Product and Furniture Design students at BNU which has a long history of engagement with local High Wycombe materials and industry. These projects were devised to allow students to understand more about the local area, but also to think more deeply around the issues of provenance, narrative and sense of place.

2 CASE STUDY 1: GEOFFREY FISHER

Geoffrey Fisher's products first sold in an East London concept store and are now found throughout Europe and America, but they are firmly rooted in his hometown of High Wycombe, UK. By working with unseasoned wood straight from local trees, using foraged and gathered or sustainably coppiced wood, Fisher uses traditional materials and methods to produce contemporary, commercial product designs with strong links to where they were grown and made. Fisher facilitated design and make projects with second year students, beginning with sourcing of timber and seeking inspiration in the natural forms of the wood. He believes the process of making can stimulate on sensory, intellectual and physical levels, and also makes us think about sustainability and ethical sales and production. By using greenwood, the level of practical skills of the makers are less important, and the wood is more forgiving, thereby encouraging greater levels of experimentation and engagement from students. As well as increasing students' appreciation of local area and a sustainable local material, these projects introduced the variety and properties of local timber species, "it's always at the back of my mind that I'm making something that could end up in the hands of another person on the other side of the world, which will connect them with the maker and place" [5]. There are often unforeseen benefits from such industrial collaborations – a local brush maker sourced wood for their handles from the local furniture industry, but since it's decline they imported their timber from abroad. They now produce a range of contemporary brushes using Fisher's local foraged timber. Students showed high levels of engagement with the projects, leading to collaborations with Fisher for internships, projects and post-graduation.



Figure 3. Geoffrey Fisher - product labels with sense of terroir; local material sources; production [5]

2.1 Furniture Magpies

An example of a successful collaboration with Fisher is Furniture Magpies, a furniture design and make workshop specialising in upcycling, started by two MA Furniture Design graduates from BNU, Nessa Doran O'Reilly from Ireland and Sua Lee from Korea. Starting with local found materials rather than grown timber they realised that furniture is often discarded so there is plenty of objects, parts and materials to reuse. Nessa and Sua's diverse backgrounds helped them appreciate the need for a sense of place and belonging in their work, they offer alternatives to mass-produced products, specialising in regenerating old furniture to meet customer requirements. They create one-off and limited-edition pieces, breathing new life into discarded items. "We don't believe in good furniture going to landfill when it can be redesigned into a piece that people can love all over again. Our work strives to retain the character and story of the furniture we use, allowing the user an insight into their item's original identity" explains O'Reilly [6]. Being based in a town renowned for furniture making they have many customers who own locally made furniture, and many with strong family ties to the furniture industry, thus reinforcing the sense of attachment to the pieces. Due to the nature of reusing existing furniture and reclaimed materials, consumers can be confident that pieces are unique and individual. Magpies work has been exhibited at TENT, London Design Festival, Milan Furniture Fair, Anthropology New York and Singapore. Lee went on to study for her PhD in 2019 looking at the reuse of waste furniture materials [7] and runs a furniture business, and O'Reilly balances running her craft furniture business in Ireland with teaching craft skills and television presenting on BBC and Channel 4 in the UK.



Figure 4. Furniture Magpies: Lovely legs; Hang on to your Drawers; DesignHouse journal editorial [6]

3 CASE STUDY 2: HIGH WYCOMBE CHAIR ARCH

Futurecity, a leading London cultural placemaking consultancy, were appointed by Berkeley Homes to develop, curate and manage public realm art commissions for a new development in High Wycombe [8]. Futurecity's motto "People. Culture. Place" and their experience of creating a creative narrative for places across the world made them ideal partners. Masterclasses in Sitting was a 3-part project lead by Andreas Lang from art and architecture practice publicworks. For the first part, Take a Seat with Us, design students from BNU built ten unique seats for residents of Wycombe celebrating special places for sitting in the local area. The second, A Chair for Arching was a triptych of talks on chair history, chair bodging and celebratory arches in Wycombe. The project culminated in a specially designed, community built temporary chair arch for the development in Wycombe Marsh. Three different chairs were designed, CNC cut and assembled through public construction workshops held on site. Once assembled these chairs interlocked using simple timber dowel and bolt fixings to be configured into a celebratory Chair Arch (the motif of High Wycombe), it remained for two weeks before being disassembled and the chairs distributed amongst the students and volunteers who built them. 'The Last Chair Arch' was Inspired by High Wycombe's rich history as a centre for furniture production and was a temporary public art piece which stood between furniture, architecture and art. Being developed in collaboration with residents, furniture makers and design students from BNU, pupils from local schools and public participants, it was seen as a way of unlocking the power and potential of space and pride in a location. Futurecity's cultural partnerships aim to make great places that bring brand association through authentic, world leading, sustainable culture and knit them into a place's DNA [8], and these provide an excellent model for producing great products with provenance.



Figure 5. Scale study for High Wycombe chair arch; A Chair for Arching; The Last Chair Arch [7]

4 CASE STUDY 3: TAIWANIA

In Taiwan, the ancient Taiwania Cryptomerioides is an endangered cypress tree that grows up to 50m [9]. The wood is highly prized, being soft yet durable and heavily scented, and is used extensively for sacred temples and coffins. Its rarity and slow growth make it scarce, giving it legal protection in Taiwan and China. In an effort to increase its sustainable use in small household products the Forestry Research Institute Taiwan and Taiwan Ministry of Education approached National Taipei University of Technology (NTUT) and BNU for a joint UK/Taiwan Design Camp. The project was intended to show how the sustainable use of Taiwania could be encouraged through the design of responsibly designed products made using traditional, local skills in Taipei that highlight the particular properties of the wood, show respect for the tree and for the local customs and regard for this sacred wood. Students from both institutions were lectured on the tree, local customs and beliefs, the properties of the wood, and its significance within local communities, and the two groups then designed and produced their prototypes in their respective universities before bringing them together for a joint exhibition in Taipei. There were noticeable differences in the outputs of the two student groups, with the NTUT students displaying a greater sense of respect for material, and a distinct appreciation of pride and place that the UK students did not demonstrate. In the final lecture to prepare the students for the project, a definition of good design was suggested, a manifesto for the project. Good design: narrative; place; humour; thought; materiality; care; responsibility; love; pride; judgement; magic.



Figure 6. Project outcomes of the UK/Taiwan Design Camp exhibited in Taipei; Taiwania tree [9]

This outcome, whereby local students demonstrate a deeper sense of understanding of place, narrative and locale than the remote students, was discussed by Harlow et al [10] where designers responded to challenges from the EU H2020 *WATERSPOUTT* project by designing ceramic water containers for communities in developing countries. The design outcomes, while technically feasible, demonstrated simplistic and naïve matches to the specific requirements of the local users. Designers embedded within the communities unsurprisingly had a much clearer sense of the narrative of use, user and place.

5 FUTURE WORK

Ongoing and future work in this area includes a KTP on blockchains technology, a future Taiwan/UK design collaboration, and a British Council funded project on wheelchair design in UK/Mozambique.

6 DISCUSSION AND CONCLUSION

Jonathan Chapman and Peter Lloyd suggest [11] that design for attachment and trust is key to product longevity - that we as consumers develop product attachment through (amongst others): memories and longevity (nostalgia), pleasure and enjoyment, self-expression or support of self-identity, product personality and group affiliation. By making products that remind us of place, of belonging to a group or attaching us to a narrative behind an object, we are making things that we will keep for longer and use more sustainably. Spimes are information melded with sustainability, giving users comprehensive information about energy flows and materials that is documented, trackable, searchable and editable. They have the capacity to change our relationship to time, user, material and provenance of making and use. Designers with a sense of the role of narrative and place may hold the key to a sophisticated relationship with the products around us that we generally take for granted. In Spimes not Things Stead [12] identifies 7 key classifying design criteria for spime objects: context; sustainability; technology; temporality; synchronicity; wrangling; metahistory. Spimes and the related internet of things can open up a new raft of possibilities for designers, yet the technology can be cold, remote and dehumanising. By teaching these ideas through low fidelity methods such as in the case studies presented, it is hoped that others will become interested in this area and develop their understanding through further work. One third of UK consumers are "very concerned" regarding product origin (Sustainability, July 2018) and there is a growing interest in terroir - 80% of UK food consumers check origin before purchase. It doesn't take too big a leap of imagination to link food miles to product miles - if a typical meal in the USA travels 1500-2500 miles from farm to table and a typical Nike product travels 1200 miles from Ningbo via Shanghai to London then an inevitable move towards distributed manufacturing or cloud production will enable local social enterprise and personal manufacturing, and a greater sense of product place. Gordon Murray's iStream automotive production technology (istreamtechnology.co.uk) and Arrival (arrival.com) are lauded for their micro factories and distributed production while Morgan cars have been living this for over 110 years in their Malvern, UK works. Geoffrey Fisher's work demonstrates that minimal product miles and a sense of terroir can produce sustainable, commercial products which capture the consumer's imagination. By introducing the idea of product provenance, it is hoped that the designers of the near future can produce products with a clear and traceable reference to place, use and material, and in doing so can encourage a more sustainable model of manufacture, distribution and use. We can begin to move towards a manifesto of "good design" which is sustainable in every sense, where every product demonstrates a balanced narrative of place, humour, thought, materiality, care, responsibility, love, pride, judgement, and hopefully just a little dash of magic.

REFERENCES

- [1] Lubowitz E. *A taxonomy of English football club nicknames* (2016). https://www.unusualefforts.com/author/elizabeth-lubowitz/ [Accessed 2022, 7 March).
- [2] BNU Identity https://www.bucks.ac.uk/about-us/corporate-identity [Accessed 2022, 11 March].
- [3] Sterling B. Shaping Things, 2005 (Mediawork, The MIT Press, London).
- [4] Pinnock O. *Meet the First Fashion Designer to Adopt Provenance's Blockchain Service* Forbes July 25, 2018 [Accessed 2022, 7 March].
- [5] Fisher G. Catapults & Key Hooks, 2018 (Kyle Books, London).
- [6] Lee S. and Buck L. Sustainable Design Approaches Using Waste Furniture Materials for Design Students. Engineering & Product Design Education Conference 2020, Herning, Denmark.
- [7] Lee S. Sustainable Design Approaches to Reusing Waste Furniture Materials (2019) Unpublished PhD thesis, Coventry University, UK.
- [8] *Masterclasses in Sitting: The Last Chair Arch* https://futurecity.co.uk/portfolio/masterclasses-in-sitting-the-last-chair-arch/ (2015) [Accessed 2022, 13 March].
- [9] Thomas P., Wang C. and Li R. *Taiwania Cryptomerioides* (2019) [Accessed 2022, 7 March] https://threatendedconifers.rbge.org.uk/conifers/taiwania-cryptomerioides.
- [10] Harlow R. and Buck L. *Improvements in Water Intervention Projects through Product Design Methods*. Engineering & Product Design Education Conference 2019, University of Strathclyde.
- [11] Haines-Gadd M., Chapman J., Lloyd P., Mason J. and Aliakseyeu D. (2018) *Emotional Durability Design Nine A Tool for Product Longevity*, Sustainability 2018, 10(6), 1948.
- [12] Stead M., Coulton P. and Lindley J. Spimes Not Things. Creating a Design Manifesto for a Sustainable Internet of Things, The Design Journal 2019, 22:sup 1, 2133-2152.