

# Defining urban graphic heritage for economic development in the UK and China

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What new perspectives can graphic design contribute to design for heritage? This paper provides answers to this question by confirming the meaning of heritage and the value of research in the context of a vibrant and evolving creative industries in the United Kingdom and China. Heritage has become an important topic for research in recent decades, and now features as a priority area with research councils. Increasingly, it is framed as cultural heritage, but the meaning of culture is unclear. In outlining the challenges associated with rapid urban development in China, and the importance of design, planning and heritage, a framework for analysing urban graphic heritage is proffered alongside empirical research from the United Kingdom and China. Despite its importance being overlooked in heritage discourse as well as contemporary reviews of the creative industries, graphic design is shown to provide a unique overarching perspective for the design challenges associated with the human experience of urban heritage.

**Keywords:** *China, heritage, graphic design, creative industries*

## 1 Introduction

The consideration of graphic design as a cultural object in cultural heritage has gained in prominence through the recent staging of the conference 'Graphic Design as Cultural Object: History, Heritage and Mediation in the Digital Age' (<http://www.museologiadesign.it/gdco-conference-2018/>). This highlighted the role of graphic design objects in the name of 'preservation, interpretation, mediation and circulation' for scholars, researchers, practitioners and students interested in the fields of graphic design history, design and design culture, communication sciences, advertising studies, archival and museum studies and practice, graphic design and interaction design.

In this paper we set out a framework for integrating an understanding graphic design as fundamental in the relationship between design and heritage. This is contextualised against the recent importance of prosperity and growth of the so-called creative economy in the

United Kingdom (UK) and China, and the aspirations for future collaborative research and innovation partnerships between the two countries.

First, we outline the research focus by examining the meaning of heritage, the recent emergence of heritage in arts and humanities research, the evolution of the creative industries, the role of the UK in supporting the development of creative industries strategies in China, and the importance of graphic design as a creative industries practice in what might be called 'urban graphic heritage'. Building on this, the paper provides some research context with a short introduction to urban development in China, a focus on Shanghai's status as a designated 'City of Design', before emphasising that urban planning must be more acquainted with design and design literacy for the benefit of heritage management. Finally, we show how graphic design can be used to provide a distinct perspective on heritage, for establishing what has been referred to in 'systemics' as 'essential relationships' and 'critical connections' (Nelson and Stolterman 2012: 57–91) between heritage, the creative economy and development, for the representation of urban heritage.

## **2 Research focus**

In this section we clarify what is meant by heritage, how heritage and research is currently aligned, and the importance of graphic design to the creative industries.

### **2.1 What is heritage?**

A first, universal, definition of heritage is attributed by Vecco (2010) to the International Charter of Venice in 1964, for the purpose of conservation and restoration of monuments and sites:

Imbued with a message from the past, the historic monuments of generations of people remain to the present day as living witnesses of their age-old traditions. People are becoming more and more conscious of the unity of human values and regard ancient monuments as a common heritage. The common responsibility to safeguard them for future generations is recognized. It is our duty to hand them on in the full richness of their authenticity is found (Vecco 2010: 322).

Since 1964, heritage has come to stand for much more than monuments and sites. Now, and generally speaking, heritage is understood to be the inheritance of 'property', either from the perspective of what is or what might be inherited. Property in this sense relates to something tangible, intangible or natural. For example: a building, a trait, an attribute, or an aspect of nature. In short, such properties are valued objects, qualities or environments inherited from previous generations.

Examples of tangible and intangible heritage are, typically, the preservation of buildings, or a spoken language. For instance, in the UK, historic buildings are protected by the Government and may not be demolished, extended, or altered, without permission from the local planning authority. Similarly, a spoken language may be protected by law, as is the case in the UK whereby in one of its constituent countries, Wales, the Welsh language is given equal prominence to English language in the management of public affairs. The point is accentuated when considering that approximately 60 million people in the UK speak English, whereas much less than one million people speak Welsh.

In essence, tangible heritage is commonly understood to define, for example, historical sites, buildings, monuments, objects in museums, artefacts and archives, whereas intangible

heritage may be comprised of customs, sports, music, dance, folklore, crafts, skills, and knowledge. Natural heritage is often thought about in relation to waterways, landscapes, woodlands, bogs, uplands, native wildlife, insects, plants, trees, birds and animals. This paper is mostly concerned with tangible heritage and the objects that constitute the urban environment.

Heritage, both tangible and intangible, in relation to the urban environment, has recently gained in global prominence with the publication by United Nations of the New Urban Agenda ([www.habitat3.org](http://www.habitat3.org)), something also referred to as Habitat III. Within this document, heritage is directly linked to a number of important environmental themes: 'sustainable urban development', 'social inclusion', 'poverty', 'inclusiveness', 'prosperity', 'opportunity', 'planning', 'management', and 'urban spatial development'. In Habitat III, heritage is mentioned in terms of 'natural and cultural heritage', 'cultural heritage and local resources', 'performing arts and heritage conservation activities', 'preserving cultural heritage', 'cultural heritage and landscapes', and 'cultural heritage for sustainable urban development'. In this context, a contemporary understanding of heritage requires a grasp of the 'cultural' in relation to heritage.

In this scenario, 'Culture' and 'heritage' are closely linked to the extent that discussion about tangible and intangible heritage is increasingly framed as 'cultural heritage'. However, notwithstanding the difficulty associated with the word 'culture' (Williams 1988 [1976]), a concern for the safeguarding of cultural artefacts is an ancient idea that first became a legal matter for the protection of monuments and works of art in fifteenth-century Europe (Blake 2000). For some time now it has been understood that, more than monuments and works of art, culture may refer to 'intellectual, spiritual and aesthetic development, ... a particular way of life, whether of a people, a period, a group, or humanity in general, ... [or] the works and practices of intellectual and especially artistic activity' (Williams 1988 [1976]: 87–93). It would therefore be reasonable to assume cultural heritage to be inheritance associated with this three-part understanding of culture. That said, the diverse nature of cultural heritage is a complex matter. In essence, '... cultural heritage consists of manifestations of human life which represent a particular view of life and witness the history and validity of that view' (Prott and O'Keefe 1992: 307). Contemporary definitions of culture now make explicit the relationship between heritage and culture, and the importance of culture in the purpose and consumption of heritage: 'Heritage is a version of the past received through objects and display, representations and engagements, spectacular locations and events, memories and commemorations, and the preparation of places for cultural purposes and consumption' (Waterton and Watson 2015: 1).

Cultural heritage, then, is seemingly a flexible idea related mostly to the tangible and intangible, and natural things when they are considered sufficiently important to people for the purpose of preservation and inheritance.

## **2.2 Heritage and Research**

Heritage has been an important focus for research during the past three decades, through what has been referred to as 'heritage studies' (Waterton and Watson 2015: 1). Furthermore, it has recently become a key area for research funding in the arts and humanities in the UK. For example, in the UK, the Arts and Humanities Research Council Strategy (AHRC) for 2013–2018 gave priority 'to enhancing partnership working in design, heritage, the exploitation of digital technologies and the museum, galleries and performing arts sectors'

(Anon 2013: 24). AHRC has positioned their commitment to heritage as something that contributes to the so-called 'creative economy', placing heritage alongside design, the creative arts, museums, libraries, galleries, publication, performing arts sectors. Furthermore, heritage is explicit in two of the themes outlined in the AHRC strategy: the *Care for the Future* theme, which aspired to the generation of 'new understanding of the relationship between the past and the future and how we transmit and question of heritage'; and *Connected Communities*, in relation to multidisciplinary research linkages between as 'key areas such as design, digital and heritage (2013: 15). Specifically, AHRC aspire to facilitate arts and humanities research to enhance business performance in creative, cultural and heritage sectors through research. This commitment to heritage is continuing to flourish in the UK through a commitment to 'the art, literature and history of the UK and of other countries around the world' (Anon 2018).

### **2.3 'Cultural industries' and 'creative industries'**

Difficulty with the meaning of the word culture has been noted above. However, this is a complex matter in what has become known as the 'cultural industries'. Cultural industries is a contested term because of the different interpretations of 'culture'. Its origin is the plural equivalent of what had become known in the mid-twentieth century as 'The Culture Industry', which came to prominence in the work of Theodor Adorno and Max Horkheimer in the 1940s. Then, as the result of industrial commodification, culture industry referred to the diminished status of culture as a high form of artistic expression through human creativity (Hesmondhalgh 2002: 15). Over time, 'cultural industries' came to more accurately represent the complex variety of cultural production, in recognition of the opportunities associated with the commodification of culture (2002: 16).

By the beginning of the twenty-first century, the core of cultural industries encompassed a number of clearly defined sectors. These included: advertising and marketing, broadcasting, film, internet, music, print and electronic publishing, video and computer games. These sectors were integral to what had then become known in Europe as the 'creative industries', also encompassing more 'craft-based' activity such as 'jewellery making, fashion, furniture design and household objects and so on' (2002: 12–14).

The creative industries provide the basis for what AHRC refer to as the creative economy, and in 2013 the United Nations recognised the sector's global importance:

The creative economy is not only one of the most rapidly growing sectors of the world economy, but also a highly transformative one in terms of income generation, job creation and export earnings ... when the creative sector becomes part of an overall development and growth strategy, it can contribute to the revitalization of the national economy where hybrid and dynamic economic and cultural exchanges occur and innovation is nurtured. But this is not all. Investing in culture and the creative sector as a driver of social development can also lead to results that contribute to the overall wellbeing of communities, individual self-esteem and quality of life, dialogue and cohesion. (UN Report on Creative Economy 2013, cited in Bazalgette 2017)

An independent review of the Creative Industries sector (Bazalgette 2017) in the UK in 2017, and the sector's contribution to the creative economy, identified nine sub-sectors:

Advertising and marketing; Architecture; Crafts; Design; Film, TV and radio; IT, Software and Computer services; Museums, Galleries and Libraries; Music, Performing and Visual Arts;



and Publishing. In this sector overview there is a clear link to the earlier definition of the core activity of the cultural industries, the most notable difference being the additional reference to architecture, crafts and design, as well as the mention of video and computer games as creative pursuits. The inclusion of Architecture is to be expected, as is craft based activities such as the aforementioned jewellery, fashion, and furniture. However, in this revised listing, design refers only to the creative occupations and specialised activities of product design, fashion design and graphic design, as noted in the report 'Creative Industries: Focus on Employment, also published by the UK Government (Anon 2016: 26).

In further recognition that the creative industries sector is fervently expanding globally, and becoming increasingly important for the future, Bazalgette (2017) cites the UK's support for the development of Creative Industries strategies in Brazil, Mexico, Kenya, China, Vietnam, Japan, Korea, Nigeria, South Africa, Egypt and Turkey. Significant to the arguments outlined in this paper, "China's Five Year Plan has as a central theme the need to move from 'Made in China' to 'Designed in China'" (Bazalgette 2017: 13). By comparison, in the UK, the creative industries generate £91.8bn per year ([www.thecreativeindustries.co.uk](http://www.thecreativeindustries.co.uk)). In China, recent estimates suggest the creative industries are worth 2,723.5 billion CNY (approx. £305.27bn) (Anon 2017), but the industry is much less mature having only been recognised since 2004 (Keane 2009), and is often referred to as the cultural and creative industries sector.

If, as noted earlier, graphic design is overlooked in the way heritage functions, the importance of graphic design to the creative industries cannot be underestimated. For example, since the mid-1980s graphic design has been the most prominent aspect of creative industries practice (Julier 2014). It is, therefore, reasonable to speculate that as the creative industries in China prosper, so will graphic design. Any desire to link design with heritage, therefore, will benefit from a close understanding of the relationship between graphic design and heritage. This research is thus concerned with the delineation of urban graphic heritage to confront the cultural heritage challenges set out in Habitat III.

### **3 Research context**

In this section we touch on the recent rapid urbanization in China, before introducing Shanghai's embracing of culture, creativity and design and the challenges of urban planning in relation to design.

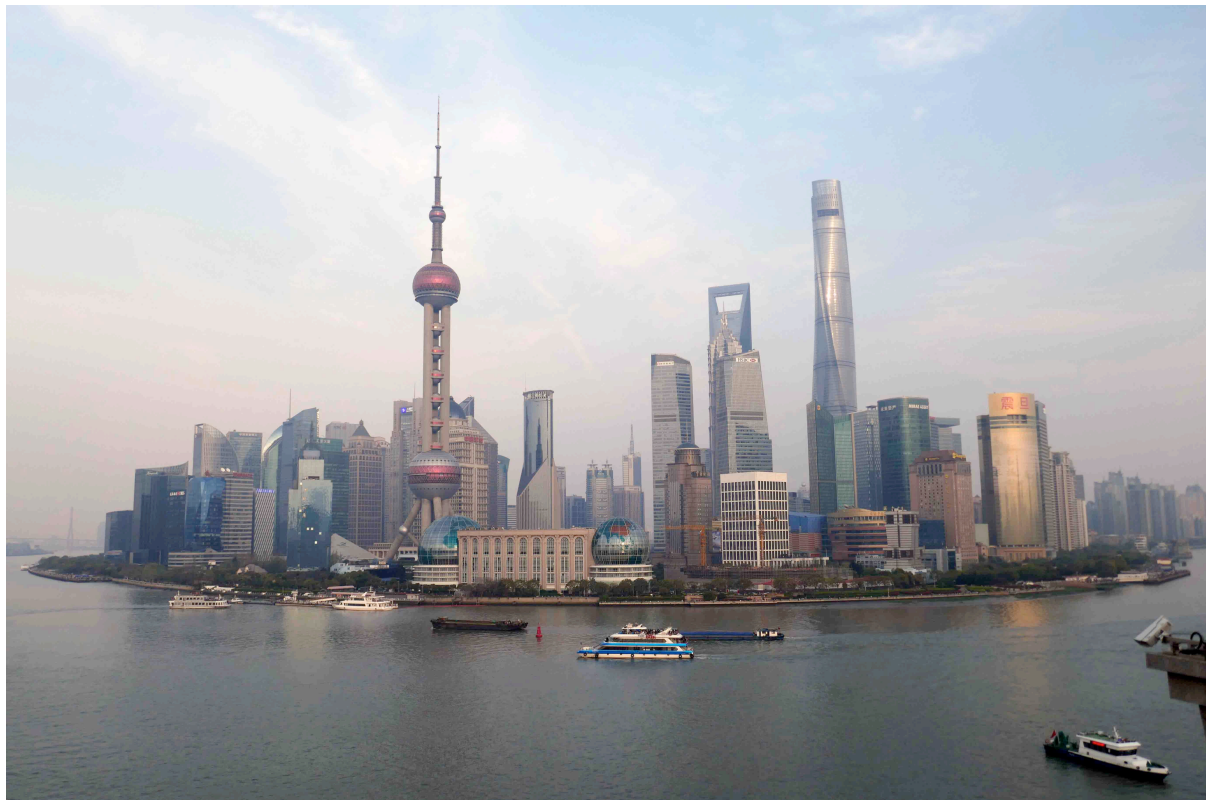
#### **3.1 Rapid urban development in China**

Since the 1970s China has experienced rapid urbanization. Its towns and cities have experienced explosive growth as hundreds of new districts, cities, towns and neighbourhoods have been created to accommodate the hundreds of millions of Chinese migrating from rural to urban environments. New infrastructure and buildings, as well as the renovation of existing stock superseded earlier Soviet planning practices (Xue et al. 2011: 209) that dominated Chinese city development since 1949, had resulted in the relative stagnation of Chinese cities. During this time cities such as Shanghai became overpopulated and underdeveloped.

China's urban modernization policies after the so-called 'open-door policy' in 1978, when the country moved towards more active participation in world markets, hastened urban development but with physical, economic and social consequences. Old harbours and factories closed, traditional forms of manufacturing contracted, local shops and traditional

businesses were lost due to competition from supermarkets and shopping malls, old houses demolished and displaced communities were forced to move to the outskirts of the cities. Consequently, local communities have been unable to adapt and respond and many local customs and heritage has also vanished. More than a decade ago it was reported that people in China are ‘increasingly concerned about the lack of character displayed by new large-scale developments, not only in new satellite towns, but also in Shanghai’s historical centre (Chen 2005: 237).’

For example, in Shanghai’s, Lujiazui is a prominent example of new urban development and one of the country’s most ambitious examples of urban development and economic transformation. Lujiazui typifies the spirit of China’s urban age and is not only described as a good example of urban design but is also credited as one of the first urban design developments in China (Xue et al. 2011: 232). Designed predominantly by European architects and reminiscent of a globalized architectural style, Lujiazui’s hybrid architecture reflects individualism, modernity and tradition (Lang 2005). See Figure 1. However, whilst this new metropolis is resplendent, critics suggest it lacks any references to its former local identity (Chen 2005). The conflict between global modernity and local distinctiveness is exemplified in Lujiazui and symptomatic of the current urban development challenges in China, and the need for sustainable development that balances environmental sustainability, economic efficiency and social need. Lujiazui is said to have been a project driven not only by market-driven imperatives but also ‘by the aspirations of a people as represented by their government officials’ (Lang 2005). However, the lack of concern in Lujiazui for the old in the face of the new – a characteristic of China’s urban development in general – suggests government officials have not appropriately represented local interest.



*Figure 1. Shanghai’s Lujiazui, viewed from a rooftop on the Bund (Source: Robert Harland 2019).*

In contrast, alternative approaches to regeneration have emerged with greater awareness for the physical and social consequences of urban development, such as the adaptive reuse of buildings, and more emphasis on preservation or building styles in the local vernacular. For example, Shanghai's Xintiandi neighbourhood is one of the earliest and most celebrated examples for the way development reflects the city's past, and the economic prosperity of modern life. See Figure 2. It is heralded as an example of development that integrates creative design with urban planning and construction development strategy. Both are highlighted as public/private development that foregrounds civil society and enhances Shanghai's status as a UNESCO 'City of Design'.

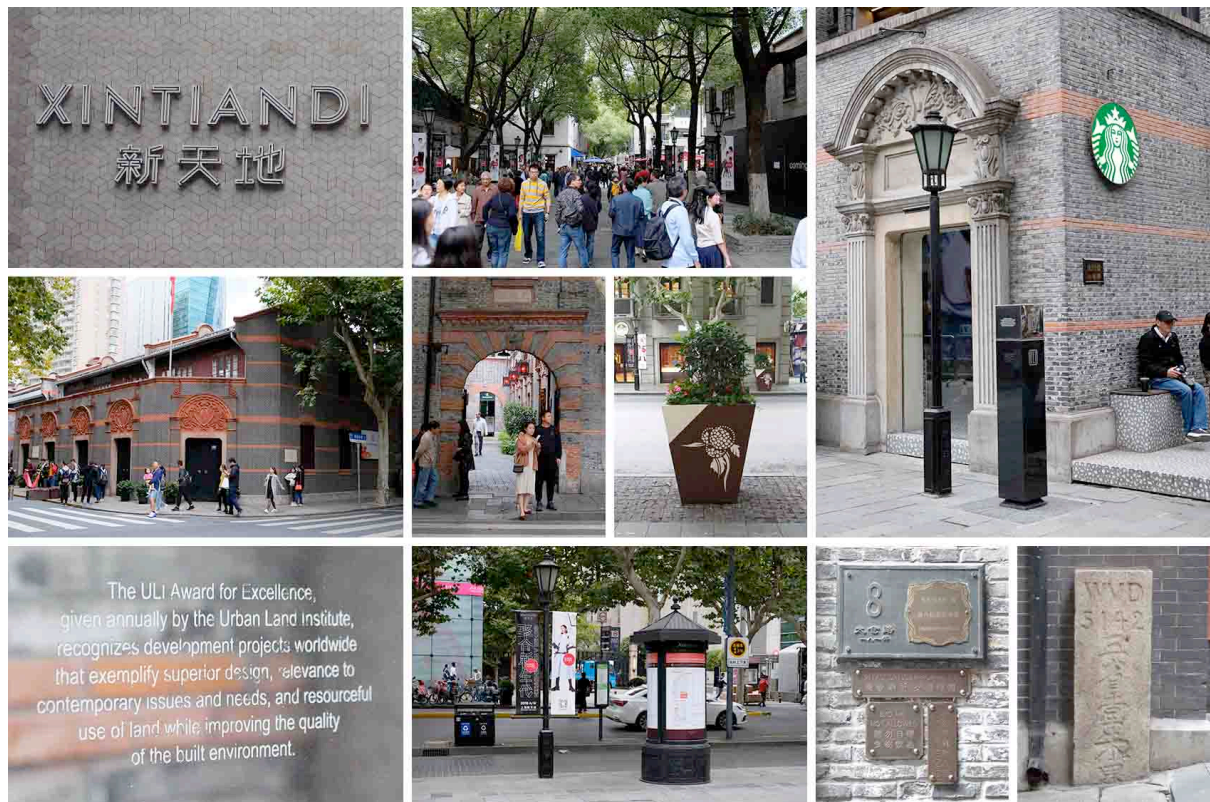


Figure 2. Shanghai's Xintiandi neighbourhood designed in the local vernacular (Source: Robert Harland 2018).

### 3.2 Shanghai City of Design

In 2010 Shanghai became a UNESCO 'City of Design', joining the UNESCO 'Creative Cities Network'. Since then the city has promoted the creative design industry for the benefit of urban renewal, industry transformation, improving the lives of citizens, international exchange and cooperation, and sustainable urban development. Throughout 2013–16 Shanghai introduced policies to integrate creativity and culture at a local level through public-private partnerships that link creative design to the economic, social and cultural development of the city. A number of institutions and design centres have formed, and Fashion and Interior Design have featured prominently in these initiatives.

During 2016–20 Shanghai's plan is to accelerate the integration of culture, creativity and design towards achieving the United Nation's 2030 Agenda for Sustainable Development.

Three areas of regional focus for creative design will facilitate this: (1) Focus on creative design promoting cross-boundary integration development; (2) Focus on creative design space construction to optimize spatial layouts; (3) Focus on fostering favourable environment for creative design. Design-driven urban renewal is at the heart of this change agenda. Consequently, Shanghai 'City of Design' reflects the United Nations on-going desire to encourage urban planners to 'help cities use design' (UN-Habitat 2008: 108), and the more recent UN Habitat III New Urban Agenda commitment to planning and managing urban spatial development. This calls for training urban planners at national, sub-national and local levels to improve the capacity for Urban Planning and Design.

### **3.3 Design, planning and heritage**

As much of the urban development in China overlooks local traditions, this has led to a concern for more sustainable urban development that is socially responsible. Lujiazui and Xintiandi are proclaimed exemplars of design-driven urban renewal, but the former is said to be lacking in any sense of former local identity and is reminiscent of a globalized architectural style with its futuristic skyline. Hence, research that explores the relationship between design, planning and heritage is in need. But the wide-ranging nature of both design and planning mean that disciplinary focused responses are necessary.

The need to better understand the relationship between design and planning in China is also mirrored in the UK where there is a comparable necessity. In a recent review of the future of the built environment emphasis is placed on design quality and decision makers receiving training in design literacy (Farrells 2015: 163). This seeks to address the relationship between planning and design within a planning paradigm that has historically treated design either as a shallow veneer or something much more comprehensive in its social, economic, ecological impact, aesthetic influence and affect on people (Punter and Carmona 1996: 1–2). From this, it is clear there exists shared concern between UK and China about the relationship between design and the built environment.

In short, there is increased awareness in China of the detrimental effect of rapid growth and globalisation on the historic townscape heritage. 'Historic preservation, heritage conservation and urban regeneration are three different but interrelated practices that are increasingly being recognised as critical to the future of Chinese cities in the 21<sup>st</sup> century' (Xie and Heath 2018: 15). In such a scenario it stands to reason that there will be increased need to commemorate heritage through graphic forms of communication.

## **4 Research methods**

In this section we introduce graphic design as a framework for analysing urban graphic heritage before providing examples in the UK and China.

### **4.1 A framework for analysing urban graphic heritage**

As noted earlier, graphic design is one of the most well-known and established design disciplines within the creative industries, even though it was relatively unacknowledged in the formation of the so-called cultural industries. It is more fundamental to design than most recognise. For example, at the beginning of the twenty-first century, graphic design was recognised as one of four orders in design, which is said to span symbols (graphic design), things (industrial design), action (interaction design) and thought (environmental design) (Buchanan 2001: 3–23). Hence, the symbolic preoccupation of graphic design provides a space for rethinking and reconceiving the idea of design for heritage. This is more so



because the recognition that 'symbolism' is implicit in planning concerns in historic environments, especially in relation to conflicts between preserving the past and changing societal values (Nasser 2003: 467–8), suggesting that an 'orderly' approach to graphic design can provide new perspectives on urban heritage.

For the purpose of this research an understanding of graphic design is drawn from two sources. First, we draw from very recent research into graphic design as a creative industries practice, which determines that practitioners display competencies in brand visual identity, digital design, film and animation, packaging and point of sale, print and advertising, retail and environmental design (Dziobczenski and Person 2017). In support of this is a consistency of typography, illustration and photography, which has underpinned various attempts to define the field since the early 1990s (Dziobczenski and Person 2017; Livingston and Livingston 1992; van der Waarde 2009). Furthermore, the idea of 'graphic images', meaning 'pictures, statues and designs' (Mitchell 1986) provides an easy interpretation. All three are relevant here, with particular emphasis on design. Such so-called images often define public places and urban spaces.

#### **4.2 Graphic design for urban heritage**

The relationship between graphic design and urban environment is not new. In the built environment there is an established tradition of graphic design being used to enhance ideas about urban heritage, reinforce local identity and convey meaning about places and spaces. The need for distinctive cultural or historical signifiers is commonplace in urban environments, and linked to internationally recognised standards. For example, the use of the colour brown to imply heritage and leisure is universally understood. Other examples of graphic objects are well known and immediately speak to heritage, such as the familiar blue heritage plaques that celebrate the London's famous residents. Some graphic solutions are part of wider systems that are also localised, such as the City of Westminster street nameplate that signifies London's theatre district within a territorial system that distinguished the city from adjoining boroughs in London. These are some of London's well-known heritage signifiers. In rare cases, a graphic object may become the heritage. For example, the Abbey Road pedestrian crossing in London, infamous as The Beatles' album of the same name: it qualifies as heritage because it is a government protected monument due to the cultural significance of The Beatles and their music. Further afield, regional cities are beginning to emphasize cultural themes to enhance their heritage credentials and attractiveness to visitors, such as Blackpool's Comedy Carpet, an award winning celebration of the town's comedic past. And many football teams now pay increasing attention to their past success, utilising heritage as an integrated part of stadium design. See Figure 3. This varied portrayal provides an indication of how graphic communication both commemorates heritage as well as being heritage.



Figure 3. A miscellaneous array of urban graphic objects. (Source: Author).

Shanghai is increasingly recognising the importance of architectural preservation by acknowledging iconic buildings through the display of commemorative wall plaques, its influential people through numerous statues, and displays internationally recognised signs that denote historical locations, as well as distinctive street furniture. See Figure 4. However, a significant difference in the portrayal of urban heritage between west and the east is that Shanghai heritage is written in two languages. This will not be discussed here, but will be a topic for future research.



Figure 4. A miscellaneous array of urban graphic objects in Shanghai. (Source: Author).

## 5 Research Contribution

It has been emphasised above that graphic design is an established and proven creative industries practice. Rapid urban development in China presents new opportunities to develop an integrative approach across the system of graphic communications that signify the visitor experience of urban heritage, in the twenty-first century, for what has been referred to as the 'experience economy' (Lupton 2017: 64–69). Graphic design is also an 'architectonic' practice (Buchanan 1989), well suited to the characteristics of the built environment professions of architecture, landscape architecture, city planning and civil engineering. We emphasise this aligned to what has been called the 'graphic treatment of the cityscape' (Julier 2014) through the various graphic objects that shape our understanding



of urban heritage. New knowledge and understanding about the products of graphic design in relation to design for urban heritage will help to establish the scope and scale at which urban graphic heritage impacts on townscapes in China and the UK. Thus, graphic design provides a unique overarching perspective for the design challenges associated with the human experience of urban heritage. Research about how graphic images complement the concept of urban heritage provides new perspectives and original insights into analyzing the ways graphic design interacts with urban design for the benefit of urban heritage, providing an answer to the question: What new perspectives can graphic design contribute to design for heritage?

## 6 Conclusion

The products of graphic design are relatively inexpensive by comparison to the products of built environment professions such as architecture, landscape architecture, city planning or civil engineering. However, graphic design provides significant potential for addressing the heritage concerns associated with urban development and regeneration in China. 'As cities in China strive to be competitive and attractive on the world stage, their decaying historical urban fabrics are being transformed into vibrant places through historical-cultural-led urban regeneration, however, the impact of their rapid development has escaped serious scrutiny' (Xie and Heath 2018). Social regeneration, technological innovation, and resource integration is a driving force for change in China, and is highly supported by the Chinese government. The synergy of industry, academia and research, and integration of resources from these different contexts provides a framework for urban development, and heritage is one sector that stands to benefit.

This paper has introduced how graphic design provides a distinct perspective on design for urban heritage. The research addresses the interests of a variety of fields engaged with the future of global cities, and the methods for understanding their complexity. This includes, but is not limited to architecture, landscape architecture, city planning, civil engineering, urban studies, history of art, architecture and design, design studies, urban geography, graphic design and the creative industries. Specifically, research into the role of graphic design for urban heritage is intended to benefit academics and practitioners working in graphic design, urban design and heritage, for the benefit of both the UK and China.

## 7 References

- Anon. (2013). *The Human World: The Arts and Humanities in our Times – AHRC Strategy 2013–18*, Swindon: Arts and Humanities Research Council, <http://www.ahrc.ac.uk>, Accessed 24 March 2019.
- Anon. (2016). *Creative Industries: Focus on Employment*, London: Department for Culture, Media & Sport, <http://www.gov.uk/dcms>, Accessed 23 March 2019.
- Anon. (2017). *A Snapshot of China's Creative Industries.*: BOP Consulting for The Canadian Trade Commissioner Service. See: [http://ampia.org/wp/wp-content/uploads/EN\\_SNAPSHOT\\_20171005-1.pdf](http://ampia.org/wp/wp-content/uploads/EN_SNAPSHOT_20171005-1.pdf). Date accessed 18 April 2018.
- Anon. (2018). *Strategic Prospectus: Building the UKRI Strategy*, Swindon: UK Research and Innovation, <http://www.ukri.org>, Accessed 24 March 2019.
- Bazalgette, P. (2017). *Independent review of the creative industries*, London: Department for Digital, Culture, Media & Sport, <https://www.gov.uk/government/publications/independent-review-of-the-creative-industries>.



- Blake, J. (2000). "On Defining the Cultural Heritage." *International & Comparative Law Quarterly*, 49(1), 61–85.
- Buchanan, R. (1989). "Declaration by Design: Rhetoric, Argument, and Demonstration in Design Practice", in V. Margolin, (ed.), *Design Issues*. Chicago: The University of Chicago Press, pp. 4–22.
- Buchanan, R. (2001). "Design Research and the New Learning." *Design Issues*, 17(4), 3–23.
- Chen, Y. (2005). "Regeneration and sustainable development in the transformation of Shanghai." *Transactions on Ecology and the Environment*, 81.
- Dziobczenski, P. R. N., and Person, O. (2017). "Graphic Designer Wanted: A Document Analysis of the Described Skill Set of Graphic Designers in Job Advertisements from the United Kingdom." *International Journal of Design*, 11(2).
- Farrells. (2015). *The Farrell Review of Architecture + the Built Environment*, London: Department for Culture, Media and Sport.
- Hesmondhalgh, D. (2002). *The Cultural Industries*, London: SAGE Publications Ltd.
- Julier, G. (2014). *The Culture of Design*, London: Sage Publications Ltd.
- Keane, M. (2009). "Creative industries in China: four perspectives on social transformation." *International Journal of Cultural Policy*, 15(4), 431-443.
- Lang, J. (2005). *Urban design: a typology of procedures and products*, Oxford: Architectural Press.
- Livingston, A., and Livingston, I. (1992). *The Thames and Hudson Dictionary of Graphic Design and Designers*, London: Thames and Hudson Ltd.
- Lupton, E. (2017). *Design is Storytelling*, New York: Cooper Hewitt.
- Mitchell, W. J. T. (1986). *Iconology: image, text, ideology*, Chicago: The University of Chicago Press.
- Nasser, N. (2003). "Planning for Urban Heritage Places: Reconciling Conservation, Tourism, and Sustainable Development." *Journal of Planning Literature*, 17(4).
- Nelson, H. G., and Stolterman, E. (2012). *The Design Way: Intentional Change in an Unpredictable World*, Cambridge and London: The MIT Press.
- Prott, L. V., and O'Keefe, P. J. (1992). "'Cultural Heritage' or 'Cultural Property'?" *International Journal of Cultural Property*, 1(2), 307–320.
- Punter, J., and Carmona, M. (1996). *The design dimension of planning: theory, content and best practice for design policies.* , London: Chapman & Hall.
- UN-Habitat. (2008). *State of world cities 2008/2009: Harmonious Cities*, London: Earthscan.
- van der Waarde, K. (2009). *On graphic design: listening to the reader*: Avans Hogeschool Research Group Visual Rhetoric AKV | St. Joost.
- Vecco, M. (2010). "A definition of cultural heritage: From the tangible to the intangible." *Journal of Cultural Heritage*, 11, 321–324.
- Waterton, E., and Watson, S. (2015). "The Palgrave Handbook of Contemporary Heritage Research". City: Palgrave Macmillan: Basingstoke.
- Williams, R. (1988 [1976]). *Keywords: a vocabulary of culture and society*, London: Fontana Press.
- Xie, J., and Heath, T. (2018). *Heritage-led Urban Regeneration in China*, New York: Routledge.
- Xue, C. Q. L., Hailin, Z., and Mitchenere, B. (2011). "Shaping Lujiazui: The Formation and Building of the CBD in Pudong, Shanghai." *Journal of urban Design*, 16(2), 201–232.

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