



Disrupting Design: The Impact of Cultural Contexts

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An individual's conception of the environment will be a function of prior experience, the social context of the person-environment interaction, and the needs, objectives, and relationships of the individual as he understands them within the situation (Brebner, 1982, p.161).

Much visitor research in gallery spaces centers on understanding and extending visitor engagement with an exhibition and on assessing the effectiveness of the exhibition's interpretive messages and goals. All of this engagement and interpretation, however, takes place in intentionally designed spaces that are reflections of the culture and society in which the museum resides. Therefore there is a layer of design and display beneath the visitor behavior that greatly influences possible engagement, learning, and enjoyment. If display is the primary form of communication in museums then the communication between design and visitor has, like all forms of communication, a basis in culture. And it is a generally accepted principle that what is culturally understood in one place will not be the same in other parts of the world.

This paper will discuss proxemics, chronemics, and color, three of the several aspects of non-verbal communication—often disregarded—which are components of exhibition design. Western museum gallery design has developed based on western social and cultural understandings; however these may have quite different meanings and understandings to visitors of other cultures. My work since 1997 in museums in the Arabian Peninsula,¹ and in the U.S., which forms the basis for this paper,

has convinced me that the use of display techniques and configurations associated with western practice in a non-western context often conveys quite different meanings than what was intended. This 'loss of translation' in exhibitions has also become apparent through audience research in the Peninsula (Bull and Al Thani, 2013; Underwood, 2012), and research on the creation of the region's museums (Al Ali, 2013; Al Mullah, 2013, 2014; Bouchenaki, 2011, pp.102-103). Due to the scarcity of Peninsula museum research, I use western museum research and cultural communication theory here in order to offer up questions for investigation and comparison. The lack of active audience and exhibition evaluation and investigation in all but a handful of Peninsula museums—and the reticence of museums to share research if it is conducted—currently makes sharing specific outcomes all but impossible. The questions I raise can provide more context for those seeking to work with or in other countries. In addition, I believe these investigations have potential for use by U.S. museums attempting to reach out to communities long considered 'non-visiting,' by highlighting aspects of design that are rarely questioned and often thought to be universally understood.

Proxemics: the Use and Understanding of Space as an Aspect of Culture

As the communicative function of space, proxemics is a component of non-verbal communication that has been used to analyze (theoretically and empirically) behavior between people in different cultures and how this occurs in specific spaces. Since the first use of the term by American cultural anthropologist Edward T. Hall in the 1960s, the main body of

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research has centered on what Hall called ‘personal space,’ the relative space we keep between ourselves and others, depending on the situation and their relationship to us. The mostly subconscious ‘rules’ we all observe are culturally created and modified, and although they may seem completely natural, they are not universal. These behaviors are tacit so we rarely realize they exist unless the boundaries are broken; this most often occurs in unfamiliar cultural settings.

Proxemics research as related to museums is very limited, and primarily examines the behavior of visitors in gallery spaces (Bourdeau and Chebat, 2001; de Borhegyi, 1968; Kottasz, 2006). Related aspects such as visitor circulation (Bitgood, 2006, 2011) and space syntax (Choi, 1997; Hillier and Tzortzi, 2006; Macdonald, 2007; Tzortzi, 2004, 2011; Wineman and Peponis, 2010) offer subsidiary information. However, all this research has taken place in western museums and has used western orientations and space understandings for analysis, creating data whose veracity in non-western locations or cultures must be questioned.

A lesser-known aspect of proxemics is the design or layout of spaces as it relates to culture.² Due to the subconscious nature of how we all think about space and interaction in it, it is unsurprising that we would think of and create gallery design and display within *our* understandings—gallery layout is an expression of culture irrespective of what is actually being displayed. As Hall has stated, “people carry around with them internalizations of fixed-feature space learned early in life” (1969, p.106). This means that design

of transactional spaces (spaces where multiple people may engage in activities with or separate from each other) will be culturally familiar to some visitors/audiences, but not to others, and may therefore project meanings quite contrary to what was intended.

Gallery design elements very common in western museum buildings include the prominence of square corners and of the use of the edge of a space over the center (for an overview of this aspect in buildings see Neuliep, 2012, p.175). Although certain types of exhibitions and museums, such as science centers and children’s museums, may have a more varied gallery layout, this is prevalent in many western museums. According to research the edge-center relationship in layout is a western tendency which is manifested in spaces where the central area is understood as a transitional space (Dean, 1994, p.51). This non-use of the central area is not absolute in western cultural practice; however only when a central display, or possibly seating, is included, does a western audience actively use a gallery central space (Communication Design Team, 1999, p.184). This non-use of central gallery areas for display may account for the apprehension by western audiences of when to approach central exhibits within their journey through a gallery (de Borhegyi, 1968, p.44). The active use of the center of spaces is far more common in other cultures, including Japan and other parts of East Asia (Dean, 1994, p.51; de Borhegyi, 1968, p.44; Liotta, 2012, p.15). Within galleries this can manifest itself in greater exhibit use and more extensive visitor interaction in central spaces.

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The aspect of the use of square corners rather than curves within spaces, and the accompanying arrangement of furniture and displays in ninety-degree angles to each other, are also western preferences that are not universal (Dean, 1994, p.51). Traditional display methods in U.S. museums, particularly art museums, may reflect the majority culture of interpersonal isolation and individualism—the U.S. being the world's most individualistic country (Neuliep, 2012, p.52)—minimizing the possibilities for conversation and discouraging interaction. Cultures with far greater interaction and collectivist orientations, which include Arab, Chinese and Latin American³ (Gundykunst and Lee, 2003, p.12; Zaharna, 2009, pp.183-184), may therefore find these styles of layout cold, distancing and unengaging due to their preferred modes of interaction and space (Neuliep, 2012, p.141).

Within the Arabian Peninsula an aspect of space understandings often cited is the desire for more visually open vistas within indoor spaces. Research (Choi, 1997; Wineman and Peponis, 2010, pp.92-93) on U.S. gallery occupancy rates has shown that visitors tend to stop in spaces that have greater visual connections to other spaces, and that are most visually connected to a museum's transitional spaces. This therefore leads to a greater awareness of other visitors in the museum, which within the U.S. has been seen as resulting in a form of non-interactive virtual community—visitors aware of others within a shared space (Wineman and Peponis, 2010, p.88). Whether these two aspects of vistas and occupancy align to inform Peninsula practice has yet to be investigated.

Chronemics: The Understanding of Time as a Component of Culture

Cultural communication research on understandings of time, referred to as chronemics, would not appear at first to offer insights into museum display. Both the understandings of time and of time perspectives (past, present, future orientations) are culturally connected (Adam, 2003; Hall, 1989, 1990). Therefore how time is used and represented within exhibition narratives and display—the use of timelines, chronological displays, and the segmentation of eras, as examples—will influence visitor engagement based on their cultural chronemics preferences, and how those may, or may not, align with those used in an exhibition. Western cultures, especially North American, are *monochronic* oriented, where time is viewed as linear, moving from past, to present, and into the future. This has developed out of the acceptance of change, and the perception that things are different before and after. Monochronic cultures see time as a commodity, almost a physical reality which can be bought, saved, spent, or wasted, and where time is segmented into pieces that allow for the planning of one item at a time, one after another. For these cultures time is also future-oriented, where what is to come is valued; the future is expected to be “better” than the present. (For discussions on multiple aspects of time orientations see Hall, 1989, 1990; Neuliep, 2012, pp.156-159).

Across the continuum⁴ are *polychronic* cultures, including Arab cultures, where time is not viewed as linear or segmented but as fluid: “there can be a circular or cyclical quality to time...time and

activities are fluid" (Zaharna, 2000). Many things can be done at one time, unlike in monochronic cultures where this would be viewed as chaos, and many cultures place greater emphasis on the past. Polychronic orientation stresses the involvement of, and orientation to, people, relationships, and society, with lesser priority given to adherence to schedules. Here the past acts as a guide for the present, and social relationships and traditions are highly important. Within Peninsula museums this manifests itself in a far greater visitor interest in unstructured gallery programs, such as drop-in workshops in which participants may come and go as they please, rather than structured, time-specific lectures. Within galleries narrative forms different from a linear, time segmented progression may be preferred, in which subjects and objects are discussed and displayed through the use of more culturally understood—and socially accepted—frameworks, such as place of creation, relationships to heritage traditions, or relationships to society, with little or no linear progression.

This would suggest that chronological exhibitions or displays would not be the most suitable for polychronic audiences, including those in the Peninsula. Within the U.S. with a dominantly individualistic monochronic orientation, there exist multiple cultural groups whose time concepts may have a different orientation. Although certain activities, such as work, may require people to adhere to the monochronic, segmented, and linear use of time, this orientation may not be someone's natural/cultural orientation, nor how they would *choose* to orient time.⁵ As free-time choices include

museums, time orientation may affect the kinds of programs and activities that attract some cultural groups.

Color

As with chronemics, color recognition and the understandings of its representations are not universal. The art museum's "white cube," for example, has been described as the "pretence of an unmediated presentation" (Stead, 2002). However, the visual representation of objectivity is anything but. The very idea of a culturally neutral space is an oxymoron: neutral in comparison to what? If what is considered neutral is culturally created then what is neutral in a western country may not be elsewhere.

Just as body language and gestures are understood differently around the world, and at different points in time, so are colors⁶. Color has the ability to create environments that welcome and invite, as well as distance and disassociate through the cultural and emotional understandings we all have of what colors mean (Aslam, 2006; Ham and Guerin, 2004; Park and Guerin, 2002). The greatest research on culture and color has been conducted within branding and brand marketing, informing the decisions companies make on color use in different parts of the world so as to align products and services with the regional understandings which the company wishes to elicit. The use of multiple colors as an attempt at diverse appeal (Madden, Hewett and Roth, 2000, p.102) can be seen in, for example, the logos of Google and ebay. Here companies use several colors to attract multiple cultures without changing their logo for different parts of the world.

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Within the Peninsula art museums and galleries, particularly contemporary spaces, actively use the white cube. White within Islam is the color of peace and purity and is the only color worn throughout the fulfillment of *Al Hajj* (the pilgrimage to Mecca and Medina). It is also the color of death in Arab and other eastern cultures, as opposed to the western black. The cold and “stark white walls and smooth marble floors of an art museum’s galleries” (Falk and Dierking, 2000, p.126) have an appeal to people in the Peninsula. The very smooth, cooling effect of the color and materials is a welcome break from the high heat outdoors through much of the year. Due to this cooling effect white walls and marble floors are widely utilized in homes and apartments, giving a certain level of familiarity to the décor.

Wall finishes reflect light themselves and also onto the objects displayed; hence the importance of the relationship between object and wall color, texture, and reflectance. Western research in museums has shown that warmer, color-saturated walls increase the speed of visitor walking over cooler and lighter wall colors, suggesting a greater arousal (action) when surrounded by warmer colors (Brebner, 1982, p.162; Mehrabian & Russell, 1974, p.60). Whether this and other related western findings—reactions to hue and brightness levels, and light intensity—would be similar in the Peninsula is currently unknown.

Conclusion

Museums aim to create designed spaces that people *choose* to come to. “Where displays are easy for people to relate to, local and repeat visitors will increase. Where the experience of the...museum

is comfortable, enjoyable and personally extending, people will seek it out” (Hooper-Greenhill, 1999, p.256). If audiences—whether in the U.S. or the Peninsula—are not comfortable, and do not have a cultural connection, then the chances for an engaged and active visit are greatly reduced.

Proxemics, chronemics, and color along with several other aspects of non-verbal and cross-cultural communication—including visualism (the preference of vision/sight above other senses in western discourse), sense hierarchies (the different sense orderings made by different cultures), olfactics (the cultural understandings of smell), load (the level of information contained or perceived in a space per unit of time), and collectivism/individualism (the degrees to which cultures function based on collective or individual goals)—are highly influential in gallery spaces (Erskine-Loftus 2012, 2013). For some visitors galleries may be communicating quite the opposite message from what was intended, thereby significantly limiting engagement and learning. The lack of research on these communicative media means that most often existing western practices are applied almost universally without question. This article was written with the goal of encouraging Western museums, as they address diverse local audiences and as they work more globally, to be curious about the cultural contexts in which they work; to seek out research on cultural differences that may affect visitor behavior within exhibitions; and to apply this research in creating exhibition experiences that are accessible and welcoming to the communities for which they were created. *

References:

- Adam, B. (2003). Perceptions of time. In T. Ingold (Ed.), *Companion encyclopedia of anthropology*, pp.503-526. London/New York: Taylor & Francis e-Library.
- Al Ali, M. (2013). History of museums in the United Arab Emirates. *Seventh World Archeological Congress, Investigating Museums: A global perspective*. Dead Sea, Jordan, 17 January 2013.
- Al Mulla, M. I. (2013). Museums in Qatar: Creating narratives at a time of global unease. In P. Erskine-Loftus (Ed.), *Reimagining museums: Practice in the Arabian Peninsula* (pp.160-203). Edinburgh/Boston: MuseumsEtc.
- Al Mulla, M. I. (2014). Collecting the collection for Qatar National Museum: Changing Qatari's attitudes and practices. In P. Erskine-Loftus (Ed.), *Museums and the material world: Collecting the Arabian Peninsula*. Forthcoming - Edinburgh/Boston: MuseumsEtc.
- Aslam, M. M. (2006). Are you selling the right colour? A cross-cultural review of colour as a marketing cue. *Journal of Marketing Communications*, 12(1), 15-30.
- de Borhegyi, S. F. (1968). Space problems and solutions. In S. F. de Borhegyi, and I. A. Hanson (Eds.), *The museum visitor: Selected essays and surveys of visitor reaction to exhibits in the Milwaukee Public Museum (Publications in Museology 3*, pp.40-44). Milwaukee: Board of Trustees, Milwaukee Public Museum.
- Bitgood, S. (2006). An analysis of visitor circulation: Movement patterns and the general value principle. *Curator*, 49(4), 463-475.
- Bitgood, S. (2011). *Social design in museums: the psychology of visitor studies (collected essays Vol. 1)*. Edinburgh: MuseumsEtc.
- Bluedorn, A. C., Kaufman, C. F. and Lane, P. M. (1992). How many things do you like to do at once? An introduction to monochronic and polychronic time. *The Executive*, 6(4), 17-26.
- Bouchenaki, M. (2011). The extraordinary development of museums in the Gulf States. *Museum International*, 63(3-4), 93-103.
- Bourdeau, L. and Chebat, J-C. (2001). An empirical study of the effects of the design of the display galleries of an art gallery on the movement of visitors. *Museum Management and Curatorship*, 19(1), 63-73.
- Brebner, J. (1982). *Environmental psychology in building design*. London: Applied Science Publishers Ltd.
- Bull, J. and Al Thani, S. H. (2013). Six things we didn't know: Researching the needs of family audiences in Qatar. In P. Erskine-Loftus (Ed.), *Reimagining museums: Practice in the Arabian Peninsula* (pp.322-344). Edinburgh/Boston: MuseumsEtc.
- Choi, Y. K. (1997). The morphology of exploration and encounter in museum layouts. *Space Syntax First International Symposium*, Proceedings Vol.1: Complex Buildings, pp.16.1-16.10.
- Communication Design Team (1999). Spatial considerations. In E. Hooper-Greenhill (Ed.), *The educational role of the museum* (2nd ed., pp.178-190). London/New York: Routledge.
- Conte, J. M., Rizzuto, T. E. and Steiner, D. D. (1999). A construct-oriented analysis of individual-level polychronicity. *Journal of Managerial Psychology*, 14(3/4), 269-288.
- Dean, D. (1994). *Museum exhibition: Theory and practice*. London: Routledge.
- Erskine-Loftus, P. (2012). The museum-cultural heritage relationship in the GCC: The effects of the use of western-style museum theory and practice on local visitorship and tourism. *The 2012 Gulf Studies Conference*, University of Exeter, Exeter, UK. 16–20 July. Retrieved March 2014 from https://www.academia.edu/2037599/The_museum-cultural_heritage_relationship_in_the_GCC_the_effects_of_the_use_of_western_-style_museum_theory_and_practice_on_local_visitorship_and_tourism
- Erskine-Loftus, P. (2013). What are we silently saying? Non-verbal communication and exhibitions. In P. Erskine-Loftus (Ed.), *Reimagining museums: Practice in the Arabian Peninsula* (pp.470-518). Edinburgh/Boston: MuseumsEtc.
- Falk, J. H. and Dierking, L. D. (2000). *Learning from museums: Visitor experiences and the making of meaning*. Walnut Creek, CA: AltaMira Press.
- Gundykunst, W. B. and Lee, C. M. (2003). Cross-cultural communication theories. In W. B. Gundykunst (Ed.), *Cross-cultural and intercultural communication* (pp.7-34). Thousand Oaks/London: Sage Publications.

Endnotes:

1. The Arabian Peninsula, the largest peninsula in the world, has a generally accepted northern (land) demarcation of the northern borders of Saudi Arabia and Kuwait, and is bordered on the east by the Persian Gulf and Gulf of Oman, the west by the Red Sea, and to the south by the Arabian Sea. The Peninsula comprises seven countries: Kuwait, Bahrain, Qatar, United Arab Emirates, Oman, Yemen, and Saudi Arabia.
2. The best-known physical arrangement of space as a component of culture is probably feng shui, a traditional Chinese philosophy.
3. It should be noted that cultural communication theory often uses and mixes terminology. Therefore groupings may not be referred to solely by 'cultures,' but also by terms related to ethnicity, nationality, country, or geographic area, often within one discussion. In addition, due to the size and scope of cultures, within literature there often appears a necessary broadness to discussions.
4. One of the valuable aspects of cross-cultural non-verbal communication theory is the use of a spectrum of possible outcomes (a cultural continuum), and not a closed binary, for analysing cultural similarities.

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5. With increased diversity within U.S. workforces the primary, organisation orientation will be monochronic, but the workforce will include people who are culturally polychronic, see Bluedorn, Kaufman & Lane, 1992; Conte, Rizzuto & Steiner 1999.
6. For multiple-country research on color and color combination understandings and preferences see Madden, Hewett & Roth, 2000.

References continued:

- Hall, E. T. (1969). *The hidden dimension*. New York: Anchor Books.
- Hall, E. T. (1989). *The dance of life: The other dimension of time*. New York: Anchor Books.
- Hall, E. T. (1990). *The silent language*. New York: Anchor Books.
- Ham, T. Y. and Guerin, D. A. (2004). A cross-cultural comparison of preference for visual attributes in interior environments: America and China. *Journal of Interior Design*, 30(1), 37-50.
- Hillier, B. and Tzartzi, K. (2006). Space syntax: The language of museum space. In S. Macdonald (Ed.), *A companion to museum studies* (pp.282-301). Malden: Blackwell Publishing.
- Hooper-Greenhill, E. (1999). Audiences—a curatorial dilemma. In E. Hooper-Greenhill (Ed.), *The educational role of the museum* (2nd ed.). (pp.255-268). London/New York: Routledge.
- Kottasz, R. (2006). Understanding the influences of atmospheric cues on the emotional responses and behaviours of museum visitors. *Journal of Nonprofit and Public Sector Marketing*, 16(1/2), 95-121.
- Liotta, S.-J. (2012). Patterns, Japanese spatial culture, nature, and generative design. In S.-J. Liotta and M. Belfiore (Eds.), *Patterns and layering: Japanese spatial culture, nature and architecture* (pp.8-19). Berlin: Gestalten.
- Macdonald, S. (2007). Interconnecting: museum visiting and exhibition design. *CoDesign*, 3(1), 149-162.
- Madden, T. J., Hewett, K. and Roth, M. S. (2000). Managing images in different cultures: A cross-national study of color meanings and preferences. *Journal of International Marketing*, 8(4), 90-107.
- Mehrabian, A. and Russell, J.A. (1974). *An approach to environmental psychology*. Cambridge, MA/London: The MIT Press.
- Neuliep, J. W. (2012). *Intercultural communication: A contextual approach* (5th ed.). Thousand Oaks/London: Sage Publications.
- Park, Y. and Guerin, D. A. (2002). Meaning and preference of interior color palettes among four cultures. *Journal of Interior Design*, 28(1), 27-39.
- Stead, N. (2002). White cubes and red knots: on colour and populism in museum architecture, *M/C: A Journal of Media and Culture*, 5(3). Retrieved from <http://journal.media-culture.org.au/0207/whitecubes.php>
- Tzortzi, K. (2004). Building and exhibition layout: Sainsbury Wing compared with Castelvecchio. *Architecture Research Quarterly*, 8(2), 128-140.
- Tzortzi, K. (2011). Space: interconnecting museology and architecture. *Journal of Space Syntax*, 2(1), 26-53.
- Underwood, S. (2012). Building family audiences in Qatar. *Museums in Arabia session of the Seminar for Arabian Studies*, British Museum, London, 15 July 2012.
- Wineman, J. D. and Peponis, J. (2010). Constructing spatial meaning: Spatial affordances in museum design. *Environment and Behavior*, 42, 86-109.
- Zaharna, R. S. (2000). *Overview: Cultural continuums*. Retrieved from <http://academic2.american.edu/~zaharna/continuums1.html>
- Zaharna, R. S. (2009). An associative approach to intercultural communication in the Arab World. In D. K. Deardorff (Ed.), *The Sage handbook of intercultural competence* (pp.179-195). Thousand Oaks/London: Sage Publications