Culturally-Sensitive Design for Privacy: A Case Study from The Arab Gulf

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Abstract

Although theories of privacy and how it relates to the use of technology have been a topic of research for decades, little attention has been paid to the perception of privacy from the perspective of technology users in the Middle East. Privacy in the context of the Arab world is highly influenced by the Islamic religion and cultural traditions. In the past three years, I have been conducting qualitative research in Arab Gulf states to enrich the understanding of privacy worldwide with regards to social media. I aim to offer culturally-grounded design principles that incorporate previously unexplored characteristics of privacy. In this position paper, I provide a summary of my research approach and motivation, along with a brief discussion on the importance of accounting for human values in the process of technical design inspired by the Value Sensitive Design (VSD) methodology. I end with a summary of my early findings and my goal of attending the workshop.

Author Keywords

Privacy; Saudi Arabia; Islam; Social Media; Value Sensitive Design

ACM Classification Keywords

H.5.m. Information interfaces and presentation (e.g., HCI): Miscellaneous

Introduction

User experience researchers have long discussed and debated definitions of privacy and how it should be considered and incorporated into technology design. More recently, privacy scholars have questioned the notion of a universal definition of privacy, suggesting instead that it is a socially constructed and culturally bound concept [1,7,8]. While various outcomes and applications have arisen from these studies to date, limited research approach privacy from a point of view that does not focus on interpersonal boundaries [2], but allows for alternative interpretations of "privacy."

Privacy is often viewed as a concept of the self as an individual, apart from a group [2]. While this is true in many previously studied user groups, I note that in the Arab Gulf the basic idea of *the self* and *the group* is conceptualized such that asserting one's individuality is viewed in a negative light. Membership in a family and tribe are of the utmost importance; there is no individual separate from a family [4, 6]. To elaborate, privacy is a high stake-value in collectivist and honor-based societies, a privacy violation "leads to shame and loss of face" [6] comparable to individualist societies where shame follows the individual not their entire family.

In this way, the concept of privacy, as expressed by my participants, is not merely about protecting the identity of a discrete individual or navigating interpersonal boundaries in such a way as to maintain one's "individual privacy" (in the way many American social media users may view it). Rather, privacy is more about maintaining modesty to uphold an acceptable group image and preserve family honor, accomplishments achieved with the help of the entire group.

Problem Statement

In terms of technology adoption and use, social media use within the Arab Gulf region has proliferated in recent years. Consider, for example, that Saudi Arabia ranks seventh in the world for per-capita social media accounts [10]. Much of this use is driven by the popularity of social media among younger generations, which represent over half of the population in the region [11]. As the Gulf's demographics continue to shift toward younger generations, the importance of social media within this region will only grow. With this transformation, the reality that many of the most widely used social media platforms imported from abroad with a limited understanding of this region raises important questions about the assumptions and theories of privacy that are embedded in the design of these technologies.

Privacy in Design

For technology users from the Arab Gulf, the Arabic language, religious affiliation, and cultural traditions and expectations are factors that play a critical role in technology adoption and use. In particular, understandings of privacy are tied to expectations and norms that have foundations in Muslim religious practice. The importance of privacy is borne out of the responsibility to maintain the sanctity of one's body, and one's home, in addition to upholding the honor and good name of one's extended family. That been said, in so many cases, users have been underserved by not having their privacy expectations met. In addition, reports have discussed the many unexpected ways social media have undermined users' right to privacy by

assuming that one setting fits all regions. In other words, a culturally hegemonic form of privacy is being inscribed in the technology people all over the world are using [1, 8].

In technology design, it's a fundamental principle to keep the user in mind throughout the design process. Still, "designers cannot escape being biased culturally" [7]. For many years, Western cultures have been the focal point of the vast majority of research on privacy expectations. Due to the fact that the headquarters of many of these companies are in the USA or Europe, which enables easy access to Western users compared to participants from other countries. An additional issue is the limited amount of contextually grounded research being conducted outside of Western cultures.

The results of my research show that there is a big risk on users when continuing to undermine these tensions and allowing for these misconceptions to guide our technology design and our understanding of other cultures [12,13]. My research agenda includes the commitments of VSD, that is, the commitment to human values, in this case the values of my study population. Furthermore, I am inspired by the VSD philosophy that suggests "a first step towards designing for privacy [and other values] entails understanding what privacy means to those who will use and be affected by the use of technology" [3].

Research Statement

I am a Ph.D. candidate at the University of Washington Information School. My work lies at the intersection of social computing, human-computer interaction, and cross-cultural information system design. Within these fields, my current research projects investigate the interactions between privacy and cross-cultural information system design. In general, my research reflects my strong passion for designing and evaluating collaborative, social, and inclusive technologies. Throughout I combine my experience conducting and designing research projects with my multilingual and cross-cultural background and utilize my knowledge of qualitative and visual methods.

In my dissertation project, I investigate the everyday use of social media by Arab Muslim youth from Arab Gulf states (e.g., Saudi Arabia) to understand how youth conceptualize values such as privacy and identity. Through 34 qualitative design sessions -- that included background questionnaires, a collage construction activity and semi structured interviews -- with men and women ranging in age from 18 to 35, I gleaned insight into the way these social media users manage privacy concerns online—concerns that are steeped in traditional values—while they adapt and make these technologies "their own." At large, my research reflects my strong interest in a broader research agenda that advocates for *culturally-inclusive design* by applying qualitative, quantitative, visual and human-computer interaction methods, and on understanding the implications of emerging technologies used by people in different contexts.

Early findings

After spending time conducting field work in the Arab Gulf, I learned a great deal about privacy behaviors and perceptions in regards to everyday use of social media [12,13]. I summarize couple of points here:

1) The need for privacy is often supported by Quranic texts, with much advice on how to protect privacy.

In these texts the privacy discussed is usually related to the protection of one's body from exposure and/or to lower the gaze (avoid staring at others bodies). This knowledge influences the ways people in this region interact with photos sharing on social media in general; 2

2) In offline practices, women are only allowed to be seen without a *hijab* (head scarf) by female friends and *mahrams* (male relatives that a Muslim woman cannot marry, or to whom she is already married, such as father, husband, brother, son). Likewise, online practices adhere to the same norms. Female social media users often use photos of natural scenery, babies or photos of themselves from afar with unrecognizable features for profile pictures instead of pictures of their faces. This is in addition to using nicknames or the names of their children instead of their real names to disguise their online identity.

3) Privacy is framed as a *communal* attribute, including not only individual, but also the behavior of those around them;

4) Social media profiles are treated as an *extension of the self*, meaning, people associate Islamic attributes to them such as being judged for the content they post in the afterlife with sins and good deeds, making one very concerned with the privacy of these accounts.

5) Lastly, there is a huge weight on cultural identity and the protection of it through the use of social media.

Conclusion

As illustrated in the summary here, the social media users I interviewed through my research adopt novel tactics that allow them to refashion social media designed around different ideologies of the individual and notions of privacy. From the moment my participants create their profiles, they think of privacy in culturally specific ways. Yet they demonstrate remarkable adaptability and ingenuity as they embrace these global technologies while making them "their own" in a way that allows them to maintain traditional values important to their family and community life.

With my contextually grounded study–that explores how privacy is understood and enacted by Gulf Arab Muslims in a social media environment–my aim is to recognize the consequences that can occur when designing technologies with a limited view of how *privacy* is understood and enacted throughout the world. In addition to concluding with value-driven (and culturally-sensitive) design principles that will better guide designers and policy makers going forward.

My goal of attending the workshop is threefold:

1) Through my experience, I seek to enrich the workshop conversation regarding cross-cultural privacy research by providing the insights I gained from my study.

2) I also come prepared to discuss my approach in addressing ethical considerations when conducting research on privacy.

3) Lastly, I aim to seek answers to some of the questions regarding transforming theory to practice, as I am still working on my dissertation, and discussing this aspect with like-minded people will help me better approach my research.

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