Innovation in consumer-computer-interaction in smart retail settings

Increasing computing capabilities, improvements in mobile and wireless technologies, the development of flexible software architecture and automatic identification systems as well as the development of "contactless technologies", such automatic payment and self-checkout have changed the way consumers access and consume information. Similarly, the way in which firms and organizations acquire and retain clients and deliver services has changed, with interesting research questions emerging out of the encounter between technological advancement and the cultures and practices of retailing (Demirkan & Spohrer, 2014; Hristov and Reynolds, 2015; Pantano and Priporas, 2016; Willems et al., in press.).

In this scenario, the current retailers' trend is to integrate innovations able to shift services from physical employee (human) to the computer (self- service technologies), by creating a new way to access, search, compare and consume products, information and services, while enriching the traditional in-store service with new options (Pantano and Migliarese, 2014). As a consequence both in-store consumer experience and building relationships with consumers is dramatically changing. Attempts have been made in a number of studies explaining the extent to which building relationships with consumers becomes more difficult in the new technology-enriched retail settings, due to the increasing consumers' willingness to choose self-service services (Poon et al., 2012; Pantano and Migliarese, 2014).

To the aim of examining the use of computers from a psychological perspective, this special issue provides with new approaches to innovation management for retailing. Its main focus rests on *innovations on consumer-computer interactions*, and its main objective is to support

scholars and practitioners to engage with studying technology-based innovations in retailing through a more comprehensive and contemporary perspective that blends marketing with other disciplines, such as sociology and media studies. Seeking to understand this innovative force in retailing, the editors developed this special issue proposing original empirical and theoretical contributions, models, approaches, methods, tools and case studies that contribute to explain this emergent phenomenon.

Among 28 submitted papers, we finally selected the following eight contributions.

In the first paper, Pantano and Gandini explore the extent to which the usage of smart technologies in retailing causes new social interactions. In particular, through a qualitative analysis involving young consumers based in London, UK, they investigate the extent to which the increasing usage of technology in the store affects shopping activity as a social experience.

In the second paper, Priporas, Stylos, and Fotiadis explore Generation Z' perceptions, expectations, and recommendations of their possible interactions in smart retailing settings, through a qualitative analyses of 38 university students (consumers) in UK market.

In the subsequent paper, Bertacchini, Bilotta, and Pantano analyze a new robotic shopping assistant and how it interacts with consumers in a technology-enriched store. They also illustrate the robot development based on machine learning systems, and the influence on the shopping behavior.

In the fourth paper, Papagiannidis and colleagues examine consumers interaction in three different shopping channels, the computer-based one, the mobile one, and the traditional one. Drawing upon a quantitative analysis involving the Theory of Planned Behavior, they evaluate the effect of this interaction on their wellbeing, with emphasis on consumer personal perception of social inclusion.

Next, Cano, Ashman, and Waite focus on the channel represented by the traditional store enriched with in-store mobile services, by evaluating the importance of the touch screens as a key element of consumer daily life. In particular, the study investigates consumers engagement as effect of interactive visual rotation and tactile simulation features in a specific touch screen devices for fashion clothes.

In the sixth contribution, Crisafulli and Singh focus on the online channel by investigating the role of response time when recovering from e-service failure in internet retailing is needed. In particular, authors figure out the possibility to delay the service recovery when negative emotions elicited by the failure are low, by further specifying in which cases it can be successfully for consumers satisfaction in online shopping environments.

Similarly Vazquez, Dennis, and Zhang investigate the mobile channel. In particular, the authors investigate the effect of socialness perception, media richness and involvement as drivers of positive emotional state, which would result in positive word-of-mouth communication when considering instant message systems for mobiles, and represent a powerful tool to build relationships with consumers.

Finally, Van Kerrebroeck, Brengman, and Willems demonstrate the extent to which relaxing virtual reality experience in shopping mall might reduce the sense of the crowd, by immersing consumers in a computer-generated environment providing them a sort of escape from the crowdedness.

Taken together, these contributions illustrate how digital and mobile technologies come to occupy a central role in retailing and consumer practices for a variety of aspects that keep together practical notions of access to the store, consumer engagement and promotion with the forms of communication and sociality that are at stake with the more social side of the shopping activity. Technology in this context seems far from being a passive object. Its intermediation of social relations, practices and cultures of shopping appears to be central to the understanding of present and future developments in retail studies. This Special Issue provides an initial account of these developments, hoping to stimulate further interdisciplinary research on the topic.

Guest Editors Eleonora Pantano and Alessandro Gandini

References

- Demirkan, H., & Spohrer, J. (2014). Developing a framework to improve virtual shopping in digital malls with intelligent self-service systems. *Journal of Retailing and Consumer Services*, 21, 860-868.
- Hristov, L., & Reynolds, J. (2015). Perceptions and practices of innovation in retailing. International Journal of Retail & Distribution Management, 43, 126 – 147.
- Pantano, E., & Priporas, C.-V. (2016). Mobile retailing effect on consumption experiences: A dynamic perspective. *Computers in Human Behavior*, 61, 548-555.
- Pantano E., & Migliarese P. (2014). Exploiting consumer-employee interactions in technology-enriched retail environments through a relational lens. *Journal of Retailing and Consumer Services*, 21, 958-965.
- Poon, P., Albaum, G., & Chan, P. S.-F. (2012). Marketing trust in direct selling relationships. *Marketing Intelligence and Planning*, *30* (5), 588–603.
- Willems, K., Smolders, A., Brengman, M., Luyten, K., & Schoning, J. (*in press*), The pathto-purchase is paved with digital opportunities: an inventory of shopper-oriented retail technologies. *Technological Forecasting and Social Change*.