Advergames and Consumer Behaviour: A Quantitative Comparative Analysis of the United Kingdom and Saudi Arabia

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Abstract

Background/Aim: People from different cultures share different thoughts, values, and morals, and the activities they engage in reflect their backgrounds. Advergames are an innovative way to create relationships with your customers. For instance, advergames can be used as a communication tool between your business and the targeted customer to promote your brand. This study focuses on advergames and consumer behaviour, with the aim of investigating the similarities between Saudi Arabia (SA) and the United Kingdom (UK).

Methods: This study used a quantitative approach, with participants chosen from different educational institutions in SA and the UK. A total of 500 participants were shortlisted, and questionnaires were designed and distributed among them to gather data. The questionnaire responses were measured on a seven-point Likert scale. The data were then analysed using the Statistical Package of the Social Sciences version 23.0 (SPSS). Descriptive statistical analysis using means and standard deviations was run to determine the relationship between various constructs, such as persuasiveness, level of experience, brand familiarity, and advergame design, and consumer behaviour.

Results: The study found that the brand familiarity and persuasiveness of advergames influenced consumer behaviour. Furthermore, the design of advergames was found to influence consumer behaviour. The study also predicted that the level of experience with the gameplay would influence consumer behaviour.

Conclusion: The study found that consumer behaviour is influenced by persuasiveness, level of experience, brand familiarity, and advergame design in the UK and SA. It is suggested that game developers and marketing experts dive right into the consumer black box to learn more about consumer choices, preferences, and comfort zones.

Keywords: consumer behaviour, advergames, Saudi Arabia, United Kingdom, persuasiveness, brand familiarity

1. Introduction

People’s behaviours are shaped by culture. As a general pattern, individuals in one group differentiate themselves from other groups through culture (Aaker & Maheswaran, 1997). Inside the gaming industry, culture, from a nation point of view, has taken the form of game localisation, which is not simply just language translations for potential nations of interest. It is more complicated than that, having to update the game software for different countries and regions and also optimising the software to the Mobile/Cell/Smartphone of choice by the local country or Region (Bizzocchi et al., 2011). Culturalization, via the adaptation of game content and elements through cultural appropriation (Wright & Bogost, 2007), is also another method through which culture is incorporated into game design. This could bring many challenges for designers, especially with regard to advergame design. It is very important to understand the role of culture in the advertising and marketing industry, as people have different values that are mediated by marketing communication (Casual Games Association, 2013).

An advergame is a digital game specifically designed for a brand with the aim of conveying an advertising message (de la Hera, 2019). Past research indicates that members from different cultures differ in terms of their attitudes towards advergames, and this is arbitraged by the integration of the brand in the game (Bradley, 1994). However, the number of studies on the role of advergaming in the cultural paradigm is still inadequate (Carlson...
Advergames are cutting-edge methods for building consumer relationships. As such, they may be seen as communication tools that allow businesses to communicate and connect with their target audiences (Waiguny et al., 2011). Advergames have risen to prominence as a pleasant and entertaining technique for capturing customer attention and communicating brand messaging. More specifically, an advergame is a game that is “planned and built to promote a brand, product, service, or concept by carefully integrating brand information into the game” (Terlutter & Capella, 2013, p. 96). According to Statista (2021a), global video game advertising spending is expected to reach $175,060 billion in 2020, up from $2.75 billion in 2015. According to Vibrant Media’s poll of 43 U.S. agency executives, advergames were found by 71% of respondents to be an intriguing digital marketing channel (eMarketer, 2017).

Studies on the cross-cultural dimensions of advertising and consumers have directed a lot of attention to comparisons between Eastern and Western cultures (Cauberge, 2010). This has inspired the opportunity to explore countries such as Saudi Arabia (SA). As in the broader Middle Eastern market, video game revenue in SA is projected to reach US$647 million in 2022 and is expected to grow by 7.42% in 2026 (Statista, 2021b). However, when compared to more developed countries, such as the United Kingdom (UK), the SA gaming market is still in expansion. In the UK, the videogame industry is worth around £1.72 billion (De Mooij & Hofstede, 2010), and the UK games market is the 5th largest in the world (De Mooij & Hofstede, 2011). Therefore, this study aims on advergames and consumer behaviour, with the aim of investigating the similarities between Saudi Arabia (SA) and the United Kingdom (UK).

1.1 Research Question

Question: How do advergame features affect consumer behaviour in the UK and SA?

2. Literature Review

2.1 Consumer Behaviour and Advergames

Consumer decision making has long been of interest to researchers. Understanding consumer behaviour is essential to effective marketing and assists managers in identifying the right people to approach, shape, and communicate with about attractive offers. We must also consider the environment in which consumers are active, including the nature of the commodity market. Finally, the shift from production-oriented strategies to marketing concepts has helped facilitate the study of consumer behaviour over the last few years.

The existing literature on advergame effectiveness focuses on aspects involving the attitudes adopted towards both the brand and the advergame, such as product-game congruity (Hernández & Minor, 2011), congruity (Hermeking, 2005), brand fit (Kassarjian, 1977), product involvement (Martínez, 2013), flow (Mintu, 1992), arousal (Johnson & Wiles, 2003), and brand familiarity (Wanick et al., 2019). These concepts are key factors related to advergame effectiveness. The integration of brand features into the advergame is vital for measuring its effectiveness. According to Keller (2001), consumer involvement also differs from culture to culture, as perceptions and attitudes towards a brand might be socially constructed. Moreover, brand familiarity can also influence advergame effectiveness (Wanick et al., 2019), which suggests that previous experience with the brand affects the way people react to the advergame. While observing advergames’ effectiveness, it is crucial to attend to issues related to the game itself. For example, according to Hofstede (2001), the flow of the game might be influenced by the balance between in-game challenges, player skills (Khaled et al., 2009), and the level of telepresence inside the game (Lee & Youn, 2008). The way the advergame is designed is expected to impact the player’s experience. Although this experience could vary according to the individual’s skills, such variance could also be a matter of culture, since people tend to prefer interfaces that are already culturally adapted (or localised; Luna & Gupta, 2001).

2.1.1 Brand Familiarity

In accepting culturalisation and the symbolic meaning of objects that might be presented within advergames, it is anticipated that if the advergame is designed to favour a particular culture, it will definitely increase the level of familiarity with those objects and thus impact consumer behaviour in a positive manner. A sense of familiarity could be induced by advergames through game content. As an advergame is a type of game that is utilised as a form of advertising, demonstrations of the brand, game mechanics, storylines, and visual appeals, such as game objects, game scenarios, and colour schemes, could be the main elements in promoting such familiarity (Wanick et al., 2018). An advergame is an interactive gamified form of advertising, and the game part of the advergame is still a game, but it is one that is designed with the intention of communicating a particular message about a brand. The level of familiarity with that particular brand might induce positive experiences, as cultural preferences moderate people’s acceptance of and satisfaction with interactive systems (Evers & Day, 1997). Hence, it was
expected that, since players would feel more familiar with the visual representations in the advergame due to their cultural values and background, their level of game experience would be higher.

2.1.2 Level of Experience

A model that describes the core elements of game experience (CEGE) by Calvillo et al. (2009) has explained the concept through the lens of game enjoyment. In other words, enjoying a game means that one is having a positive experience of the game. According to Wanick et al. (2018), because context is so important when dealing with cross-cultural communications, the inclusion of humour to evaluate advergame efficacy and the influence of advergame experience on customer behaviour is critical. Indeed, people’s familiarity with advertising material can make them laugh, and this factor should be considered when evaluating the impact of advertising messages across cultures (Wanick et al., 2018). Metro Trains Melbourne released this extremely effective advertisement in 2012 as part of an effort to reduce the number of accidents on its railway network. The video, which has a pleasant and happy tune and runs over all of the ridiculous ways a person can die, has gone viral. This is an example of a company employing comedy to communicate a crucial message. Arousal has a significant link to brand attitudes (Hernández et al., 2011), impacting people’s perceptions of brands. Arousal is a psychological state that combines one’s emotions and physiological behaviour (Hernández & Minor, 2011), and it has been found to influence people’s propensity to share material online (Berger, 2011). According to Weinberger amd Gulas (1992) the use of humor in advertising has grown commonplace, our understanding of its influence has not been updated since the last major assessment nearly two decades ago. While comedy isn’t a guarantee of stronger commercials, its impact can be boosted by carefully considering the goals to be achieved, as well as the audience, context, and style of humour.

2.1.3 Persuasiveness

According to van Berlo (2021), as advergames are persuasive, they are expected to influence consumer choice behaviour. This anticipation is based on social cognitive theory (Bandura, 1986), which proposes that people tend to learn new behaviours through observation and reinforcement. More precisely, people are believed to adopt behaviours that they observe as being accepted and rewarded within a specific context. According to Terlutter and Capella (2013), such a context could be an advergame. The behaviour displayed in advergames often depicts real-world commercial behaviour, such as picking up product packages or looking for the target brand in the game. Lee at al.’s (2009) detailed content analysis showed that in about half of the advergames they examined, collecting product packages and brand logos was essential to completing the game. Whereas this behaviour was not essential in 20% of the advergames, it did offer players an in-game bonus of some kind. This implies that people playing advergames are often not just observing in-game commercial behaviour, but also being rewarded for it.

Research Hypotheses

**H1:** Advergames tend to influence customer buying behaviours.

**H2:** The player’s experience of an advergame will vary depending on the game design and whether it complements his or her values and background.

**H3:** The level of satisfaction among advergame players will be higher if they are more familiar with the brand.

**H4:** Persuasive advergames influence consumer choices.

3. Conceptual Framework

Advergames can influence a customer’s buying behaviour through three main key factors. The factors which a consumer notices in an advergame are player’s experience with the gameplay of the advergame. Player’s familiarity with the product or the brand which has been targeted in the game, and last but not the least persuasiveness. The tendency of the game to change a player’s behaviour and his/her choices.
4. Methodology

4.1 Study Design and Setting
The followed a quantitative approach was used in this study. The study was conducted through an online portal with different universities in SA and the UK.

4.2 Study Sample and Data Collection
A total of 2,000 survey questionnaires were distributed through email among professional streamers/gamers and university students who were interested in playing games, 700 responses were received, of which 200 were discarded due to incomplete or duplicate responses. Therefore, 500 completed questionnaires were included in this study, according to Roasoft. Out of 500 respondents, 312 were from the UK, and 188 were from SA. Before the commencement of the data collection, the researcher explained the purpose of the study and obtained a written consent form from all participants. Ethical approval was obtained from the international review board. The participants also signed a written consent form before filling out the survey questionnaire.

4.3 Study Instrument
The survey questionnaire was divided into two parts. The first part comprised the demographic details of the participants, whereas the second part focused on the features of advergames, such as persuasiveness, level of experience, brand familiarity, and advergame design. All the item responses were based on a 7-point Likert scale (1—strongly agree, 2—agree, 3—strongly disagree, 4—disagree, 5—partially agree, 6—don’t know, and 7—neutral). The researchers explained the participants the purpose and aim of the study also an approval from the ethical review board of the university was taken. The participants also signed a written consent form before filling the survey questionnaire.

4.4 Validity and Reliability
Validity and reliability of the questionnaire was also attained by checking the value of Cronbach’s alpha for all the items, and all values above 0.7, which showed that the questionnaire fit for carrying out the study. Moreover, in terms of language comprehension, three experts from the marketing department of the university were contacted and asked to give their expert opinions about the questionnaire in terms of their level of understanding. Once the questionnaire was returned, with minor changes to be made, it was prepared to be distributed among the study participants.

4.5 Data Analysis
The data collected were analysed using the Statistical Package of the Social Sciences version 23.0. Descriptive statistical analysis using means and standard deviations was performed. To determine the relationship between the constructs, such as persuasiveness, level of experience, brand familiarity and advergame design, and consumer behaviour, a regression model using a partial least squares (PLS) approach with Smart partial least squares
structural equation modelling (PLS SEM software version 3.0 was used.

5. Results and Discussion

Table 1 shows the demographic profiles of the participants from SA and the UK. In both countries, the age group between 18 and 25 years was the most dominant in the sample, at 37.18% for the UK and 57.06% for SA. The lowest number of respondents in both countries came from the age range above 55 years. Respondents with an age above 55 years old in the UK accounted for 11.54% of the total sample. In SA, it was 0%. In terms of gender, the proportions of male and female participants in both countries’ samples were relatively balanced. In SA, the female sample comprised 58.58%, while the male sample made up the other 41.42%. In the UK sample, 55.95% were female, and 44.05% were male. Although the gender profile in both countries was not perfectly balanced, the gap between male and female respondents was not statistically significant.

Table 1. Demographic profile of the participants from UK and SA

|          | Saudi Arabia | UK    |
|----------|--------------|-------|
| Gender   |              |       |
| Male     | 41.42%       | 55.95%|
| Female   | 44.05%       | 58.58%|
| Age      |              |       |
| 18–25 years | 57.06%      | 37.18%|
| 26–35 years | 27.06%      | 30.13%|
| 36–55 years | 15.88%      | 21.15%|
| Above 55 years | 0.00%      | 11.54%|

Table 2 shows the descriptive statistical analysis of the items pertaining to persuasiveness, level of experience, brand familiarity, and advergame design. According to the table, all the constructs of the questionnaire showed values of standard deviations close to the mean values, thus proving close associations among the constructs in both countries.

Table 2. Descriptive statistical analysis of constructs

| Constructs          | Mean (Saudi Arabia) | Mean (UK) | Standard Deviation (Saudi Arabia) | Standard Deviation (UK) |
|---------------------|---------------------|-----------|-----------------------------------|-------------------------|
| Persuasiveness      | 2.79                | 2.55      | 1.98                              | 1.47                    |
| Level of Experience | 2.55                | 2.44      | 1.87                              | 1.85                    |
| Brand Familiarity   | 2.59                | 2.79      | 1.46                              | 1.97                    |
| Advergames Design   | 2.46                | 2.57      | 1.86                              | 1.96                    |

Table 3 shows an R-value of 0.715, which indicates a linear correlation between the independent variables. The adjusted R square of 0.44 revealed that 44% of the variance could be projected from the independent variable. The beta value shows that all the independent variables had a high contribution towards brand attitude, except game design, which had a low contribution towards brand attitude.

Table 3. Regression analysis of persuasiveness, level of experience, brand familiarity and advergames design on consumer behaviour

| Independent Variable | Beta Value | R adj | Adj R sq |
|----------------------|------------|-------|----------|
| Persuasiveness       | 0.56       | 0.71  | 0.44     |
| Level of Experience  | 0.57       |       |          |
| Brand Familiarity    | 0.56       |       |          |
| Advergames Design    | 0.56       |       |          |

The study found that the brand familiarity and persuasiveness of advergames influenced consumer buying behaviour. Advergames are a major medium to make an individual familiar to a brand. If a player keeps seeing a certain product in the game or if the gameplay keep targeting the product, the player will remember that brand or that product for a long time. Persuasiveness is when a brand tries to convince an individual to purchase its product. If an individual is not aware with the brand which is present in the market the business will try to
promote its product through advergame. Majority of the advergames are persuasive in nature. This finding is in line with those of van Berlo (2021), who stated that, due to the persuasive nature of advergames, it could be expected that they would influence consumer behaviour. Moreover, the present study also found that the design of advergames influenced consumer behaviour, which was also stated by Keller (2001), who reported that consumer involvement also differs from culture to culture. Individuals have prior experience with a problem and are aware of it, according to Marton and Booth (1997). They are also aware of who they are, the circumstances in which they find themselves, where they are located, as well as the emotions associated with the location, the time of year and day, and what to do with the rest of the day. Even if everything is visible at the same time, the intensity changes. The structure of people’s consciousness is continually changing, and what we call awareness is the total of an individual’s experiences. So you may do one thing while being aware of a lot of other things.

This study also found that brand familiarity affects consumer behaviours. Evers and Day (1997) also reported that a level of familiarity induces a positive experience. Furthermore, the present study also predicted that the level of experience would influence consumer behaviour, which is in line with the results reported by Wanick et al. (2018), who revealed that context is very important when dealing with cross-cultural communications, so much so that the inclusion of humour to evaluate advergame efficacy and the influence of advergame experience on customer behaviour is critical.

Advergames play a significant role in the advertisement of brands nowadays. Considering the current situation of the market it is mandatory for businesses to provide maximum satisfaction by delivering the best quality product to their customers. Most of the customised games are designed to promote a brand or a cause, this promotion has favoured both, game developers and businesses. The unique characteristics of advergames can ultimately improve their promotion effect, as players select games depending on their own preferences and choices. Brand promotion through games can be done in two possible ways: by advertising the product in-game (Diaa et al., 2019) or by creating game characters that are directly related to the brand or to their products (Al-Meshal, 2020). Some other aspects might also influence the player, such as the player’s satisfaction with the game and his or her gaming experience.

6. Conclusion

In conclusion, it should be emphasised that brands are an influential factor in consumer purchases. Specifically, brands try to create positive perceptions of their products, which can affect consumers and their buying behaviours. Advergames play a vital role in making players aware of their products. The player will not be influenced by the brand if there is no relation or link with that certain brand, or if that product conflicts with his/her cultural and moral values.

The level of gaming experience also defines that whether the player will keep playing that certain game because of his great experience with the game or he is going to switch to another game. If an advergame does not have the best graphics, or it does not provide a smooth gameplay experience, then there are more chances that the player will not prefer the game. The player will most likely get bored with the advergame if the missions and challenges are too easy and the tasks are too achievable.

The present study found that consumer behaviour was influenced by persuasiveness, level of experience, brand familiarity, and advergame design in both the UK and SA. Players from both countries were more comfortable playing advergames that did not conflict with their cultural values and morals. However, their buying behaviours were also influenced by player’s level of experience with the game their persuasiveness and familiarity with the brand. In the future, it is suggested that game developers and marketing experts dive right into the consumer black box to determine their choices, preferences, and comfort zone boundaries.

References

Aaker, J. L., & Maheswaran, D. (1997). The effect of cultural orientation on persuasion. *Journal of Consumer Research, 24*(3), 315–328. https://doi.org/10.1086/209513

Al-Meshal, S. A. (2020). Attitude towards online advergame: An empirical study among Saudi consumers. *International Journal of Business and Social Science, 11*(3). https://doi.org/10.30845/ijbss.v11n3a11

Bandura, A. (1986). Fearful expectations and avoidant actions as coefficients of perceived self-inefficacy. *American Psychologist, 41*(12), 1389–1391. https://doi.org/10.1037/0003-066X.41.12.1389

Berger, J. (2011). Arousal increases social transmission of information. *Psychological Science, 22*(7), 891–893. https://doi.org/10.1177/0956797611413294

Bizzocchi, J., Lin, B. M. A., & Tanenbaum, J. (2011). Games, narrative and the design of interface. *International
Journal of Arts and Technology, 4(4), 460–479. https://doi.org/10.1504/IJART.2011.043445

Bradley, S., Hitchon, J., & Thorson, E. (1994). Hard sell versus soft sell: A comparison of American and British advertising. Global and Multinational Advertising, 141–157.

Calvillo, E., Clark, L., Ballantyne, J. E., Pacquiao, D., Purnell, L. D., & Villarruel, A. M. (2009). Cultural competency in baccalaureate nursing education. Journal of Transcultural Nursing, 20(2), 137–145. https://doi.org/10.1177/1043659608330354

Carlson, R., & Corliss, J. (2011). Imagined commodities: Video game localization and mythologies of cultural difference. Games and Culture, 6(1), 61–82. https://doi.org/10.1177/1555412010377322

Casual Games Association, S. T. (2013). Games Market Sector Report. Casual, Connect Association.

De Moorj, M., & Hofstede, G. (2010). The Hofstede model: Applications to global branding and advertising strategy and research. International Journal of Advertising, 29(1), 85–110. https://doi.org/10.2501/S026504870920104X

De Moorj, M., & Hofstede, G. (2011). Cross-cultural consumer behavior: A review of research findings. Journal of International Consumer Marketing, 23(3–4), 181–192.

De Moorj, M., & Hofstede, G. (2011). Cross-cultural consumer behavior: A review of research findings. Journal of International Consumer Marketing, 23(3–4), 181–192.

Evers, V., & Day, D. (1997). The role of culture in interface acceptance. In Human-Computer Interaction INTERACT’97 (pp. 260–267). Springer, Boston, MA. https://doi.org/10.1007/978-0-387-35175-9_44

Hernández, J. A., Asamort, J. B., Niort, A., & Blazquez, J. D. (2011). Las Tics como facilitadoras en la comprensión lectora. Universidad Católica de Pereira, Pereira, Colombia.

Hernandez, M. D., & Minor, M. S. (2011). Investigating the effect of arousal on brand memory in advergames: comparing qualitative and quantitative approaches. Qualitative Market Research: An International Journal, 14(2), 207–217. https://doi.org/10.1108/13522751111120701

Hofstede, G. (2001). Culture’s consequences: Comparing values, behaviors, institutions and organizations across nations. Sage publications.

Johnson, D., & Wiles, J. (2003). Effective affective user interface design in games. Ergonomics, 46(13–14), 1332–1345. https://doi.org/10.1080/00140130310001610865

Kassarjian, H. H. (1977). Content analysis in consumer research. Journal of Consumer Research, 4(1), 8–18. https://doi.org/10.1086/208674

Keller, K. L. (2001). Building customer-based brand equity: A blueprint for creating strong brands (pp. 3–27). Cambridge, MA: Marketing Science Institute.

Khaled, R., Barr, P., Biddle, R., Fischer, R., & Noble, J. (2009, August). Game design strategies for collectivist persuasion (pp. 31–38). Proceedings of the 2009 ACM SIGGRAPH Symposium on video games. https://doi.org/10.1145/1581073.1581078

Lee, M., Choi, Y., Quilliam, E. T., & Cole, R. T. (2009). Playing with food: Content analysis of food advergames. Journal of Consumer Affairs, 43(1), 129–154. https://doi.org/10.1111/j.1745-6606.2008.01130.x

Lee, M., & Youn, S. (2008). Leading national advertisers’ uses of advergames. Journal of Current Issues and Research in Advertising, 30(2), 1–13. https://doi.org/10.1080/10641734.2008.10505243

Luna, D., & Gupta, S. F. (2001). An integrative framework for cross-cultural consumer behavior. International
Martinez, C. R. (2013). Los europeos opinan que el 92% de las marcas son prescindibles: Google, Ikea y Mercadona son las mejor valoradas por los españoles, según un estudio de Havas Media. *Anuncios: Semanario de publicidad y marketing*, 1469, 58.

Marton, F., & Booth, S. (1997). *Learning and awareness*. New Jersey: Lawrence Erlbaum Associates Inc.

Mintu, A. T. (1992). Cultures and organizations: Software of the mind. *Journal of International Business Studies*, 23, 362–365. https://doi.org/10.1057/jibs.1992.23

Statista. (2021a). *Digital Media Report – Video Games* (worldwide). Retrieved from https://www.statista.com/outlook/dmo/digital-media/video-games/worldwide

Statista. (2021b). *Digital Media Report – Video Games*. Retrieved from https://www.statista.com/outlook/dmo/digital-media/video-games/saudi-arabia

Terlutter, R., & Capella, M. L. (2013). The gamification of advertising: analysis and research directions of in-game advertising, advergames, and advertising in social network games. *Journal of Advertising*, 42(2–3), 95–112. https://doi.org/10.1080/00913367.2013.774610

Van Berlo, Z. M., van Reijmersdal, E. A., & Eisend, M. (2021). The gamification of branded content: A meta-analysis of advergame effects. *Journal of Advertising*, 50(2), 179–196. https://doi.org/10.1080/00913367.2020.1858462

Waiguny, M. K., Terlutter, R., & Zaglia, M. E. (2011). The influence of advergames on consumers’ attitudes and behaviour: an empirical study among young consumers. *International Journal of Entrepreneurial Venturing*, 3(3), 231–247. https://doi.org/10.1504/IJEV.2011.041273

Wanick, V., Dunn, R., Ranchhod, A., & Wills, G. (2019). Analysing cross-cultural design in advergames: a comparison between the UK and Brazil. *EAI Endorsed Transactions on Game-Based Learning*, 5(17), e1. https://doi.org/10.4108/eai.13-9-2018.156150

Wanick, V., Stallwood, J., Ranchhod, A., & Wills, G. (2018). Can visual familiarity influence attitudes towards brands? An exploratory study of advergame design and cross-cultural consumer behaviour. *Entertainment Computing*, 27, 194–208. https://doi.org/10.1016/j.entcom.2018.07.002

Weinberger, M. G., & Gulas, C. S. (1992). The Impact of Humor in Advertising: A Review. *Journal of Advertising*, 21(4), 35–59. https://doi.org/10.1080/00913367.1992.10673384

Wright, W., & Bogost, I. (2007). *Persuasive games: The expressive power of videogames*.