Friend or foe: In enjoying playfulness, do innovative consumers tend to switch brand?

LUKMAN AROEAN*

Bournemouth University-Business School, Bournemouth, United Kingdom

ABSTRACT

Playful consumption has been an extraordinary phenomenon in the modern era, but little attention has been paid to how likely innovative consumers are to seek to enjoy this particular experience. Using structural equation modeling and invariant tests, this article examines empirically the relationship between innovativeness, brand switching, and playful consumption, with gender and age as moderators. Innovativeness has been found to predict playful consumption, and although it also predicts brand switching, interestingly, the latter was not found to predict playful consumption. That, for innovative consumers, encountering playfulness is not enhanced by different brands suggests that being able to enjoy playful rewards requires familiarity, which is more likely to be provided by ongoing rather than by new brands. This article therefore presents a friendly message for marketers: In enjoying playfulness, innovative consumers tend not to switch brand. More theoretical and practical implications, as well as future research, are also identified.

Copyright © 2011 John Wiley & Sons, Ltd.

INTRODUCTION

In today's modern market, playful consumption has been an extraordinary phenomenon (Agarwal and Karahanna, 2000; Kozinets *et al.*, 2004; Webster and Martocchio, 1992) as the purchase of products and services with rich playful values has grown rapidly (e.g., reports by BBC, 2008; and Mintel, 2007). That today's consumer has become more playful highlights the profound importance of this specific psychological need (Belk *et al.*, 2003; Molesworth and Denegri-Knott, 2008). Hence, researchers, scholars, and marketers alike need to pay special attention to advance this particular type of consumption (Holbrook *et al.*, 1984; Holbrook and Hirschman, 1982; Holt, 1995; Kozinets *et al.*, 2004).

Despite this, little attention has been paid to how likely innovative consumers are to seek to enjoy this particular type of consumption. Yet, understanding this relationship is highly relevant for marketers as they need to comprehend the consumer's propensity to adopt new offers and products that are rich and salient with playful values. Such knowledge is vital to enable marketers to target their scarce resources effectively toward their most valuable and influential innovative consumers. Furthermore, as industries offering play-laden products attract new providers to take advantage of market demand, new brands are being launched and consumers are exposed to an ever-wider variety of competing offers. It is therefore highly relevant to understand how innovative consumers react to the new product brands within the context of playful consumption.

By way of responding to this challenge, this article seeks to advance the knowledge in this area by proposing and investigating an adoptive model of playful consumption that relates the phenomenon to two prominent consumer

Play is defined as a voluntary state that generates fun and excitement (Agarwal and Karahanna, 2000; Huizinga, 1955; Lieberman, 1977; Webster and Martocchio, 1992) and is conducive to enhanced creativity and imagination, exemplified by higher divergent thinking and thinking liquidity

newness-seeking traits: innovativeness and brand switching. First, it examines whether consumer innovativeness—a key

adoption characteristic—plays an important role in this

phenomenal consumption type, denoting quick adoption of

playful-rich offers. Second, as the thriving playful product

industries attract new providers, their quick spread may relate

to the emergence of new brands and offers seeking to exploit

growing market demand. It is intriguing to see whether inno-

vativeness leads to the seeking of alternative brands and

whether embracing different brands enhances the likelihood of innovative consumers enjoying playful consumption.

Third, it is also critical to investigate playful consumption

in the context of gender and age so that the model can be

understood contextually and, to a reasonable extent, gen-

eralized. To achieve these three objectives, this article

investigates the relationship between consumers' playful

experiences, their innovativeness, and their brand-switching

propensity. This is achieved by examining simultaneously

two important consumer demographic variables: gender and age. Understanding whether innovativeness leads to enjoy-

ment of playful rewards and to becoming "less loyal" in

pursuing playful consumption can help marketers develop

the most effective marketing and targeting strategies for

contemporary playful consumption demand. This article thus

contributes to the body of knowledge by providing theoreti-

cal and managerial insights into the phenomenon of playful

consumption in relation to consumer innovativeness and

brand switching within the context of age and gender.

E-mail: laroean@bournemouth.ac.uk

that mer Playful consumption
Play is defined as a voluntary state that g

^{*}Correspondence to: Lukman Aroean, Bournemouth University-Business School, 89 Holdenhurst Road Executive Business Centre, Bournemouth BH8 8 EB, United Kingdom.

(Lieberman, 1977; Russ, 1993). In consumer research, *playful consumption* has been characterized as an intrinsic act of consumption (Holt, 1995), a symbolic interaction (Webster and Martocchio, 1992), and an absorbing experience (Mathwick *et al.*, 2001).

Play as an intrinsic act of consumption

Playful consumption refers to an intrinsically motivating, self-oriented experience, which is actively sought and enjoyed for its own sake (Holbrook, 1999, p18; Holbrook, 1994). Holt (1995) also conceptualized playful consumption as a form of autotelic activity, in which a "consumption object is essential." With intrinsic fun and enjoyment as the essence, playful consumption can be experienced in a variety of situations and occasion such as hobbies, leisure activities, games, sports, and aesthetic appreciation.

Play as a symbolic interaction

Webster and Martocchio (1992) have observed playful consumption as a symbolic interaction between consumer and product. According to Csikszentmihalyi (1991), a symbolic system is a game in that it provides a separate reality, a world of its own where one can perform actions that are permitted to occur in that world but would not make much sense anywhere else. In symbolic systems, the "action" is usually restricted to the mental manipulation of concepts (Csikszentmihalyi, 1991 p118). Symbolic interaction pinpoints creative imagination and subsequent originality in recombining and reorganizing existing factual knowledge (Lieberman, 1977). The concept of the symbolic interaction has long been of interest for researchers. One of its underlying ideas is that people act as they do because of how they define things. For example, Sutton-Smith (2001) postulated the rhetoric of play as the imaginary that idealizes the imagination, flexibility, and creativity of playful behavior, and this imaginary postulation of play is sustained by modern positive attitudes toward creativity and innovation. Much earlier, Herbert Blumer (1969, p2 & 4), who coined the term symbolic interactionism, set out the basic premises of symbolic interactionism that humans act toward things on the basis of the meanings they ascribe to those things, with such meanings arising in the process of interaction. Putting this notion into the context of interaction between an individual consumer and a product, a playful experience is mediated by the use and exchange of symbols and signification that allow meaningful responses to and interpretation of stimuli.

Play as an absorbing experience

Mathwick *et al.* (2001) defined playful consumption as the intrinsic enjoyment that comes from engaging in absorbing activities that provide an escape from the demands of the day-to-day world. Therefore, play consumption has two aspects: enjoyment and escapism (Mathwick *et al.*, 2001; Mathwick and Rigdon, 2004). *Enjoyment* refers to a self-oriented reward that transforms the activity into a leisure experience in its own terms, and *escapism* reflects a state of psychological immersion or absorption, within which a person is fully engaged by the activity (Mathwick and Rigdon, 2004).

Adopting the symbolic interaction view in this article, playful consumption experience refers to a symbolic, interactive activity wherein an individual, in freely expressing his or her skills and responding to the received stimuli, engages enjoyably in a mental activity characterized by spontaneity, flexibility, originality, creativity, imaginativeness, and inventiveness. This definition explicates that when someone plays, he or she responds and acts freely, flexibly, and inventively according to his or her spontaneous and original creativity and imagination. It emphasizes that within an activity an individual constructs voluntarily a meaningfully playful interaction between himself or herself and another party at the other end, either real or imaginary, through symbolic exchanges meaningful to both within specific boundaries.

This freedom and liquidity of action demonstrated by the mentally engaged characteristics of flexibility, originality, creativity, imaginativeness, and inventiveness leads to the intrinsic rewards of play. This intrinsic fit for the individual allows a transformation into a distinct realm that is pleasant and absorbing and for a period of time, takes the person away from routine. Hence, the symbolic interaction of playful consumption corresponds to and shares the underlying qualities of the other two definitions, where the first emphasizes the intrinsic act leading to fun and the second emphasizes the operative simultaneity of enjoyment and escapism. In other words, for the symbolic interaction to operate, the properties of intrinsic enjoyment and escapism should coexist.

In the context of marketing, this definition shows a conceptual correlation between playful consumption, creative capacity, and dialectical interplay with marketing stimuli, such as advertising (Kozinets *et al.*, 2004). In addition, the "playful" trait, which is described as seductive, subversive, self-expressive, nonlinear, and active (Kozinets *et al.*, 2004), closely relates to the way the individual perceives and responds to new ideas and environmental stimuli, including those from adverts.

Innovativeness

Innovativeness refers to the propensities or preferences of consumers to adopt novel experiences and products (Goldsmith et al., 1998; Goldsmith and Hofacker, 1991; Tellis et al., 2009). It has been described by theorists as a normally distributed characteristic in the consumer population (Gatignon and Robertson, 1991; Goldsmith et al., 1998; Midgley and Dowling, 1978). Although there have been some different theoretical views on the place of innovativeness in the adoption process, Mudd (1990) has contended that there is a considerable theoretical convergence to treat innovativeness as a continuous variable and to view it as a personality-like construct.

As a psychological trait, innovativeness is closely related to a creative and variety-seeking mentality that includes the thinking of new ideas, the desire for new experiences, and the exploration of unique solutions to problems (e.g., in Ridgway and Price, 1994 p69). Quite a range of prior work related to this variety-seeking mentality has been undertaken, including the willingness to change (Im *et al.*, 2003) and an inherent preference for new and different experiences (Hirschman, 1980; Venkataraman, 1991), which lead to early

adoption of new products (Hirschman, 1980; Midgley and Dowling, 1978). Likewise, several theorists have identified innovativeness as a cognitive style (Goldsmith *et al.*, 1998; Venkataraman and Price, 1990). Regarding relations to peers and others, innovativeness has been acknowledged as driving the influencing behaviors of consumers such as market mavenism (Goldsmith *et al.*, 2006) and opinion leadership (Goldsmith and Hofacker, 1991). Meanwhile, from the perspective of optimal stimulation levels (OSLs), a person may engage in seeking new experiences to achieve a satisfactory or optimal cognitive level (Steenkamp and Baumgartner, 1992).

Innovativeness as a trait has been described as a strong intention to buy at an early stage, actualized frequent purchase of the product, actual interest to buy simply when hearing that a new version is to be launched, and updated information or knowledge. In the consumer research domain, Hirschman (1980) has classified three types of innovativeness: adoptive-innovativeness, vicarious-innovativeness, and use innovativeness. Adoptive-innovativeness is defined as the acquisition of a product or service during a relatively early stage of its life cycle (Hirschman, 1980), denoting the traditional definition of innovativeness. Developing Hirschman's work, Hartman et al. (2006) defined vicariousinnovativeness as the active search for information about new or unfamiliar products and services (also Ram and Jung, 1994) for the purpose of making decisions about future purchases and/or increasing consumption knowledge and adopting the concept without purchasing the product or service. Finally, use-innovativeness refers to the extent to which an individual seeks variety in usage and seeks new solutions to problems from an existing product (Hirschman, 1980).

Adoptive-innovativeness is arguably more desirable for marketers, and more commonly acknowledged, as it illuminates the actualized behavior of innovativeness in the purchase of new products or services (Goldsmith *et al.*, 2003). Consistent with the marketing literature's long tradition of portraying innovativeness as an individual trait of the propensity to embrace new products (Tellis *et al.*, 2009), and as playful consumption signifies creativity and innovativeness, it is necessary to test whether adoptive innovativeness encourages experiencing playful consumption.

Brand switching

Brand switching is the tendency of a consumer to purchase brands different from the previous ones he or she has bought (e.g., Mittal, 1994; Putrevu and Lord, 1994). Within the theory of OSL, brand switching can be seen as a manifestation of exploratory behavior and novelty seeking (Raju, 1980). The latter two characteristics have a positive relationship with innovativeness because a consumer who is not afraid of taking risks or of trying new or unusual products and services is eager to find out about them, takes the initiative in trying them, and seeks variety (ibid.). This perspective has been labeled as the true or direct brand-switching behavior, which is intrinsically driven by inherently satisfying rewards of changing or variety-seeking behavior (McAlister and Pessemier, 1982; Van Trijp *et al.*, 1996). Brand switching

may also result from altered beliefs about brands owing to external causes such as advertising (Deighton *et al.*, 1994) or other sales promotion (Grover and Srinivasan, 1992). This second perspective has been labeled as derived due to extrinsic motives (McAlister and Pessemier, 1982; Van Trijp *et al.*, 1996).

This article follows the first perspective that views brand switching as an intrinsic behavior. In this regard, building on Raju's proposition (1980), the predisposition to brand switching exemplifies an individual's true preference and intrinsic urge of making comparisons and an individual's ability to discriminate between stimuli, as a different brand is perceived to have observe-worthy and search-worthy differences from the brand being currently used. Put another way, brand switching suggests an individual's sensitivity to detect possible attractive stimuli of a new brand or brands, which either do not exist in, or complement that of, or are better than that of the currently consumed brand and which therefore arouse the intention of the individual to investigate it further. The mentioned characteristics of innate brand switching go beyond liking a certain brand and are irrespective of whether the current brand performs as expected. In respect to consequences, consumers with a strong innate tendency to brand switching tend to have little concern about potential switching costs, whether economic or psychological, or both.

Brand switching is an important feature of open and liberal economies and markets and also a critical issue for marketers to manage to maintain their consumers' loyalty, as they seek to minimize as far as possible any likelihood that their consumers might switch to other brands. Thus, although innovativeness seems to be favorable for new products and offers, the trait could eventually lead consumers to turn to different providers and brands, a tendency which is undesirable for marketers. On the other hand, playful experience has been found to enhance favorable attitudes toward the current brand and product (Mathwick and Rigdon, 2004 p330). Consequently, understanding this controversy within the context of playful consumption is critical for identifying suitable strategies to serve innovative, but potentially less loyal, consumers.

Relevance of the study

This research has significant theoretical and managerial relevance. This article examines new relationships and perspectives, between novelty-seeking and exploratory tendencies and playful consumption domains to bring insights into how playful experience can be understood within the context of innate consumer adoption-related characteristics. This theoretical agendum seeks a greater appreciation and understanding of both the consumer's role and behavioral perspectives in marketing theory, particularly regarding those characteristics related to the current phenomenon of playful consumption. More specifically, the creative and imaginative essence of playfulness and the play mentality seem to be synchronic with exploratory and variety-seeking characteristics. Thus, the relationship between them will reveal how today's consumers express their desire for newness in meaningful and enjoyable forms of play. Our knowledge of innate innovativeness and overt brand switching will therefore be greatly enriched by understanding the psychological relationship with playful consumption and whether a tendency toward newness and variety-seeking translates into playfulness.

Comprehending how playful experience can be encouraged by the innate qualities of innovativeness and linking this to the brand switching tendency are of immense importance for the consumer behavior and consumer marketing fields. These relationships unveil not only the important psychological linkage between adoption-related characteristics and innate playfulness but also the opportunity for playfulvalue product brands to better serve their innovative, playful consumers.

This research also has practical relevance for brand managers interested in developing strategies to increase brand share and loyalty. Inevitably, the variety-seeking traits of innovativeness and brand switching are simultaneously a source of opportunity and risk for playful-laden industries. This underlines the "contradictory" nature of the question the research would like to examine: Although innovators are vital for successful new product launches, the existence of brand switching can be a success trigger for competing brands. Ultimately, therefore, the central question is whether the innovative consumer is friend or foe. Equally important, this article also makes a significant contribution to target-segment marketing and innovation adoption campaigns by examining the influence of gender and age to the relationship model.

MODEL AND HYPOTHESES

The model builds on trait theory, which postulates that consumer behavior is influenced by consumers' inner traits that vary among individuals and are relatively stable over time. Figure 1 depicts the relationship model between the three variables of innovativeness, playful consumption, and brand switching, with gender and age as moderating factors.

Conceptually, innovativeness and playfulness signify openness to perceived complexity (Holbrook *et al.*, 1984) and a welcoming or embracing of complex patterns of stimuli (Mahatanankoorn, 2007). This open personality then underlies the conceptual linkage of the research model between playful consumption–innovativeness–brand switching. More specifically, the open personality points out the inclination to welcome challenges, including actively processing playful stimuli by reorganizing forms and associations of meanings or knowledge; being open to access and to try

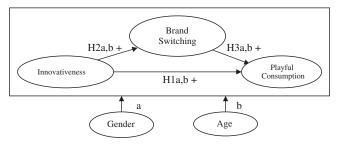


Figure 1. Research model.

new stimuli; and being open to taking risks, for example, switching brand.

Innovativeness and playful consumption

Both innovativeness (Ridgway and Price, 1994) and playful consumption (Lieberman, 1977; Russ, 1993) signify creativity and flexibility in imagination and in exploring, processing, and responding to stimuli. As innovative individuals enjoy novelty and "playing" with new stimuli, for example, in exploring new perspectives and constructing different organizations of meaning, knowledge, and solution, these qualities are inherent in play and playful situations. Thus, by signifying a creative and imaginative mentality, playful consumption can be regarded as facilitating innovativeness, where being playful can be seen as enjoying opportunistic rewards freely, inventively, and creatively. Likewise, being innovative may encourage individual to seek and enjoy playful rewards of an activity. It is thus hypothesized that there is a positive relationship between the two variables. More specifically, the more innovative an individual, the more likely he or she will experience playful consumption. This notion substantiates the main part of Hypotheses H1a and H1b.

Previous work has examined the influence of gender and age on consumer innovativeness with, however, at times equivocal results (Tellis *et al.*, 2009). Regarding gender, with no clear consensus over its influence on innovativeness and to be consistent with the positive relationship between innovativeness and playful consumption, it is hypothesized that gender does not moderate their relationship. This argument on gender applies to Hypotheses H1a, H2a, and H3a.

Regarding age, using the perspective of habituation theory and as a consequence of having less prior consumption experience, young people are theorized to be less habituated than are older ones (Griffin *et al.*, 2000, p36). With less experiential reference of adapting to environmental inputs, young consumers are more likely to be open to new stimuli, offers, or brands and as such tend to be more innovative (Tellis *et al.*, 2009) and more playful than are older ones. If younger people tend to be more innovative, more playful, and more likely to switch brand, then it is hypothesized that age moderates the relationships between the three variables. This argument on age applies to Hypotheses H1b, H2b, and H3b.

H1a: Gender does not moderate innovativeness predicting playful consumption.

H1b: Age moderates innovativeness predicting playful consumption.

Innovativeness and brand switching

Because both innovativeness and brand switching are manifestations of a variety-seeking tendency (Raju, 1980; Van Trijp *et al.*, 1996), a positive correlation between both constructs is suggested. Within the theory of OSL, both innovativeness and brand switching have been related to maintaining this psychologically most pleasant level due to their linkage to open personality trait toward ambiguity, risk, complexity, and unfamiliar stimuli (Raju, 1980). In short, both signify commonality in exploring stimulus variation where

innovativeness trait is likely to drive the actual adoption behavior (Raju, 1980; Tellis *et al.*, 2009). Consistent with the theorem that an individual's inner traits influence behavior, it is argued here that innovativeness explains true or innate switching behavior. Hence, innovativeness is hypothesized to predict brand switching.

Regarding the effect of gender and based on the aforementioned that there is no clear consensus over the influence of gender on innovativeness, it is hypothesized that gender does not moderate the relationship between innovativeness and brand switching. With respect to age, Hypothesis H2b follows a similar argument to that of Hypothesis H1b.

H2a: Gender does not moderate adoptive innovativeness predicting brand switching.

H2b: Age moderates adoptive innovativeness predicting brand switching.

Brand switching and playful consumption

As consumer playfulness signifies creative thinking and imaginative exploratory tendencies that relate substantively to newness-seeking behavior, brand switching can be seen as positively related to playfulness. Exemplifying an individual's true preference for exploring variety, ability in discriminating stimuli, and sensitivity to detecting possible attractiveness from new stimuli, brand switching features some conceptual similarities to the characteristics of playful consumption. In a more practical sense, seeking new brands may express a creative, wishful mindset with an expectation that new brands serve as a new source of the sought-after playful rewards. Therefore, brand switching is hypothesized to predict playful consumption. In respect to gender and age, the corresponding hypotheses follow similar arguments as those of H1b and H2b.

H3a: Gender does not moderate brand switching predicting playful consumption.

H3b: Age moderates brand switching predicting playful consumption.

METHOD

Product context

Playful consumption is vast and subjective in nature and may happen in any activities, for example, day-to-day routines, or within special events, or time and space, as everyone has their personal playful zones. According to Sutton-Smith (2001), play is highly diverse and varied. Likewise, in respect to the categorization rubrics proposed by Caillois (2001), even these do not cover the entire universe of play. Because of its personal and highly flexible nature, playful consumption may occur from within settings abundant with playful stimuli, such as hobbies and sports, to less abundant, simple occasions, such as the use of a product of interest, to restricted contexts within severely limited circumstances, such as poverty or, even more, in jail. Almost anything can allow play to occur within its boundaries that are not discrete

across individuals. With regard to the diversity of players, we may hear a vast array of playful experiences from different individuals. With regard to the diversity of play items, practically anything can become an agency for some kind of play. Therefore, many elements, forms, activities, and experiences of play can be found in the context of consuming or using a product of choice as long as it can provide a personally meaningful playful space and interaction.

The product use context was chosen with three perspectives in mind. First, as discussed earlier, there are ample playful opportunities, occasions, and elements in consumption, in particular, with products that an individual has enjoyed consuming or using. Second, this article seeks to accommodate the trend that modern consumers are becoming increasingly playful. In this regard, settings with limited playful environments provide a control that ensures that the playful experience, when it happens, is likely due to the innate characteristics of the individuals themselves. This condition of limited intervention or influence from other sources helps examine nonbiased intrinsic play and how playful someone has been. In other words, a playful situation with the absence of external sources of stimuli other than the individual and the item itself enables us to investigate the true extent of individualized playfulness. Third, as the profundity of playfulness can vary across different individuals, situations, time, and place, if we argue therefore that an individual can turn an ordinary situation of product use into a playful one, then that person should have no less likelihood of being playful in an obvious playful setting such as doing hobbies or sports.

Within this product use context, playful consumption is then operationalized as an interaction between an individual and a product of choice characterized by spontaneity, flexibility, originality, creativity, imaginativeness, and inventiveness. The research sought to test the hypotheses above through a variety of products. To help secure the validity of the data collected, each individual respondent chose the product upon which their questionnaire answers were based. By doing this, the contextual nature of the past experience under investigation—innovativeness, brand switching, and playful consumption—could be recalled, encouraging respondents to identify their true answer (Kozinets et al., 2004). Products chosen include iPod, Xbox, CD player, digital camera, PlayStation, Nintendo, mobile phone, mp3 player, computer, clothes and apparel, food, newspaper, non-entertainment household appliances, sporting goods, and accessories.

Questionnaire and scales

Existing scales were used to measure the three constructs (for the complete lists, see Appendix A). To measure innovativeness, a 6-item innovative scale developed by Goldsmith and Hofacker (1991) was used. This indicates that the more innovative an individual, the more purchases of the product of interest have been made, the quicker the updating of knowledge of the product, and the stronger the desire to buy a newly launched product of interest. Capturing the essential characteristics of adoptive innovativeness, the scale has proven to be adaptable across a variety of products (Flynn and Goldsmith, 1993; Roehrich, 2004) and thus fits the varied product context of this study. To measure brand switching, a

7-item scale developed by Raju (1980) was used. To measure playful consumption, a scale developed by Webster and Martocchio (1992) was employed. This fits our objective to examine individual playful experience within product use as the Webster and Martocchio scale was developed in that context. The reliability of the playful consumption measurement has been statistically tested with acceptable results, as shown in the "Measurement model" section.

Sample

Data have been randomly gathered from a variety of people and areas from a UK city. Participants, that is, "strangers," were randomly invited from a variety of places, including a university, residences, shopping areas, and sports parks. For example, for the residential areas, the randomness was achieved by making and following an area coverage plan to ensure that relevant areas and streets of the city were actually covered as well as to avoid repeated invitations and the same respondents—and by employing the other-next-door rule. In public areas, participants were randomly invited, and those who actually took part did so solely according to their willingness. The scope of survey was explained to the respondents before they completed the questionnaire. After collating all the returned questionnaires, 304 sets were found complete, 143 male and 161 female individuals, and 133 young (17–40 years) and 166 old (40+ years).

RESULTS

Measurement model

Reliability

Table 1 shows that all constructs have Cronbach's alpha from .795 to .926, well exceeding the .70 requirement (Nunnally and Bernstein 1994) and thus demonstrating high measurement consistency and reliability.

Validity

Confirmatory factor analysis was conducted simultaneously with an invariant test over moderators, and modifications were based on theoretical meaningfulness and model parsimony.

As recommended by Baumgartner and Homburg (1996), we presented the values of χ^2 and associated p, goodness-of-fit index (GFI), Tucker–Lewis index (TLI), comparative fit index (CFI), and root mean square error approximation (RMSEA). No strict thresholds for these statistics currently exist, but the following general guidelines have been suggested: GFI, TLI, and CFI values above .9, and RMSEA

Table 1. Reliability test

Constructs	Cronbach's alpha	Cronbach's alpha standardized items
Innovativeness	.824	.824
Brand switching	.795	.797
Playful consumption	.926	.927

values equal or less than .06, are generally interpreted as indicating good model fit (Baumgartner and Homburg, 1996; Browne and Cudeck, 1993; Hu and Bentler, 1999; MacCallum *et al.*, 1996).

From Table 2, with all GFIs > .90 (Bentler 1992), all TLIs .90 (Hu and Bentler, 1999), all CFIs > .90 and even > .95 (Hu and Bentler, 1999), and all RMSEAs < .05, significantly lower than the threshold of .06 (Browne and Cudeck, 1993; Hu and Bentler, 1999), the measurement model of brand switching fits the data well. No significant effect of age and gender has been identified (see also Figure 2).

Similarly, Table 3 shows all GFIs > .90 (Hu and Bentler, 1995), all TLIs close to or > .95, all CFIs > .90 and even \geq .95, and all RMSEAs < .06, the measurement of brand switching fits the data well. Although gender did not moderate the measurement model, age did, with Item 41 as the source of invariance (see also Figure 3).

With the first item removed due to the problems identified from suggested modifications, most indices in Table 4 show a good fit of playful consumption measurement—all GFIs .90, all TLIs > .95, all CFIs > .95, and all RMSEAs < .06, the playful consumption model fits the data well. No significant effect of age and gender has been identified. In summary, all three measurement models fit the data well, suggesting acceptable unidimensionality and construct validity (see also Figure 4).

Structural model

Gender grouped structural model

Table 5 shows that the structural model fits the observed data fairly well, as most indices show acceptable fit results: TLIs > .90, CFIs > .90, and RMSEAs < .06, although GFIs were slightly below the cutoff of .90. For the sake of parsimony, no further modification is necessary (see also Figures 5 and 6).

From Table 5, $\Delta \chi^2$ between M_0 and $M_1 = 05$ at df = 3 was not significant at p < .05, demonstrating that gender did not moderate all structural relationships.

Age-grouped structural model

Table 6 shows that each structural model fits the observed data fairly well, as all fit indices of TLIs > .90, CFIs > .90, and RMSEAs < .06, although GFIs were slightly below the cutoff of .90. Similar to the gender group, no further modification is necessary (see also Figures 7 and 8).

With $\Delta \chi^2$ between M_0 and M_1 = 8.6 at df = 3 significant at p < .05, there was significant influence of age over the structural parameters. The path between innovativeness and brand switching (γ IB) was the source of this, and this finding links to confirmatory factor analysis on the measurement model, where age moderates brand switching through Item 41. Age as a moderator of brand switching then develops into a moderator of the structural parameter of γ IB but, however, not of γ BP.

For both moderated findings, to ensure a better understanding of their behavior, the structural parameters from both M_0 and M_1 are discussed in the next section.

Table 2. Confirmatory factor analysis on innovativeness—invariant test over gender and age^a

Factor	Equality	Mod	χ^2	df	$p(\chi^2)$	GFI	TLI	CFI	RMSEA
	Unconstrained	M-F	20.7	12	.054	.979	.967	.987	.049
Innovativeness:	Constrained ^a	M-F	35.1	21	.028	.964	.969	.978	.047
baseline	$\Delta \chi^2$	14.4	9	No significant effect of gender at $p < .05$					
+e4-e6	Unconstrained	Y-O	17.6	12	.128	.981	.978	.991	.039
+e3-e6	Constrained ^b	Y-O	28.3	21	.133	.971	.984	.989	.034
+e3-e4	$\Delta \chi^2$		10.7	9	No significant effect of age at $p < .05$				

Note: Mod, moderating factor; M-F, male-female; Y-O, young-old; GFI, goodness-of-fit index; TLI, Tucker-Lewis index; CFI, comparative fit index; RMSEA, root mean square error of approximation.

^bOne loading path constrained to 1; five path loadings, one variance, and error covariances (e4–e6, e3–e6, and e3–e4) were constrained equal across moderated groups.

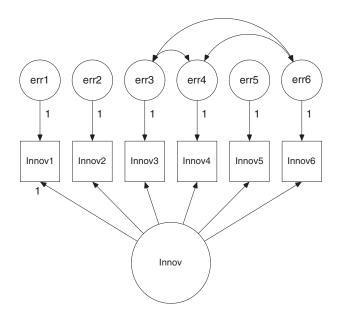


Figure 2. Measurement model of innovativeness.

Structural parameters: Hypotheses testing results and discussions

From Table 5, with $\Delta \chi^2$ (df=3) = .5 not significant, there is no significant effect of gender over the relationships between innovativeness, brand switching, and playful consumption. Furthermore, from Table 7, with all γ IPs by gender positive and significant, H1a is supported: Regardless of gender,

innovativeness predicts playful consumption. Similarly, with all γIBs by gender positive and significant in Table 7, H2a is supported: Regardless of gender, innovativeness predicts brand switching. Next, from Table 7, with all γBPs by gender not significant, H3a is not supported, as brand switching does not predict playful consumption.

From Table 6, as $\Delta \chi^2$ (df=3)=8.6 is significant, age moderates at least one of the relationships between innovativeness, brand switching, and playful consumption. Further invariant analysis found that γ IB is moderated, whereas γ IP and γ BP are not. Furthermore, from Table 7, with almost all γ IPs by age positive and significant, H1b is partly supported: Innovativeness predicts playful consumption but is not moderated by age. With almost all γ IBs by age positive and significant, H2b is supported: Innovativeness predicts brand switching, and the relationship is moderated by age. Next, with all γ BPs by age not significant, H3b is not supported: Brand switching does not predict playful consumption.

Compared with others, γIP was found to be the parameter with the steadiest significance level, showing significantly a nonzero, positive magnitude. With γIP 's magnitude ranging from .18 to .34, being innovative is a significant positive predictor for consumers to seek and enjoy a playful consumption experience. Bearing in mind that there is no statistical support for the influence of age, the magnitude of γIP tends to indicate that innovativeness might generate an impact on playful consumption more strongly for young consumers (17–39 years)— γIP ave = (.34+.25)/2=.30—than for older

Table 3. Confirmatory factor analysis on brand switching—invariant test over gender and age

Factor	Equality	Mod	χ^2	df	$p(\chi^2)$	GFI	TLI	CFI	RMSEA	
	Unconstrained	M-F	39.2	22	.013	.964	.952	.975	.051	
Brand switching: baseline	Constrained ^a	M-F	57.4	32	.004	.948	.951	.963	.051	
+e39-e40	$\Delta \chi^2$		18.2	10		No signit	ficant of geno	der at p < .05		
+e37-e38	Unconstrained	Y-O	41.1	22	.008	.965	.947	.972	.054	
+e36-e39	Constrained ^a	Y-O	63.2	32	.001	.945	.940	.955	.057	
	$\Delta \chi^2$		22.1	10		Significa	nt effect of a	ge at $p < .05$		
					A further investigation found that the path loading of Item 41 is the					
					source of the invariance. Therefore, it is set free to estimate for subse-					
					quent analysi	s. ^b				

Note: Mod, moderating factor; M-F, male-female; Y-O, young-old; GFI, goodness-of-fit index; TLI, Tucker-Lewis index; CFI, comparative fit index; RMSEA, root mean square error of approximation.

^aUsing AMOS16.

^aOne path loading constrained to 1; six path loadings and error covariances (e39–e40, e37–e38, and e36–e38) were constrained equal across moderated groups. ^bWith a logic order of invariant test on path loadings, variances, and error variances.

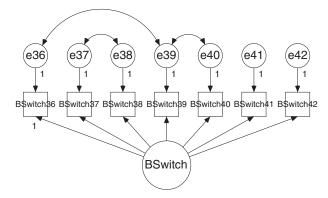


Figure 3. Measurement model of brand switching.

ones (40+ years)— γ IP ave=(.18+.28) / 2=.23. Across genders, the strength of innovativeness as a predictor of playful consumption seems to be much steadier, with γ IP ave=.275 for male and .235 for female individuals.

Next, the results of γIB , the regression weight between innovativeness and brand switching, show a "split" picture between gender and age and between young and old. With respect to gender, bearing in mind that there is no statistical evidence of a gender effect, the magnitude of γIP tends to indicate that innovativeness might generate an impact on brand switching more for male individuals, with γIB ave = .33, than for female individuals, .26. Meanwhile, age moderates γIB ; thus, although for older consumers (40+ years) being innovative on a relatively steadily basis leads to a tendency to switch brands, for younger consumers (17–39 years), it is relatively unstable as the significance is not steady. With γIB ave = .18 for young and .265 for old, for young consumers, being innovative either has a low impact on switching brands or an insignificant one.

Perhaps the most interesting and rigorous findings are concerned with γBP , the regression coefficient between the propensity to brand switching and experiencing playful consumption. With nonsignificant coefficients across age and gender, it is clear that switching brand neither correlates with nor predicts the behavior of enjoying playful rewards. One negative coefficient, although insignificant, hints that there is some indication that switching brand can damage or disrupt enjoyment of playful consumption. For the sake of model parsimony, the structural path γBP was therefore removed.

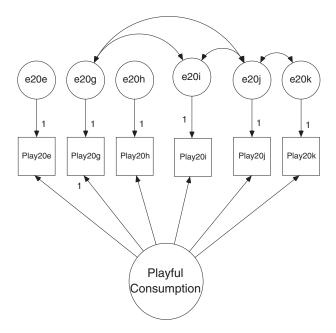


Figure 4. Measurement model of playful consumption.

THEORETICAL IMPLICATIONS

First, all the mentioned findings imply discriminant evidence for the constructs in the research model, where each of them was found to be distinctive to the others. Innovativeness, as the hypothesis supported, was found empirically to predict the likelihood of both experiencing playful rewards and the tendency to switch brands. Despite this finding, it is interesting to note that brand switching did not encourage the likelihood of experiencing playful rewards. Thus, the findings serve as a distinctive determinant between the three constructs.

Second, as consumers may switch brands to maintain an OSL, the findings can be interpreted as implying two-edged stimulation relatedness for innovativeness: Innovativeness is related to OSL management—expressed by switching to new brands—and is related to enjoying stimulating playfulness. Therefore, innovativeness conceptually can be seen to have qualities that promote both managing satisfactory stimulation and managing a stimulating playful experience.

Third, the nonrelatedness of brand switching and playful consumption appears to exist regardless of the level of

Table 4. Confirmatory factor analysis on playful consumption—invariant test over gender and age

Factors	Equality	Mod	χ^2	df	$p(\chi^2)$	GFI	TLI	CFI	RMSEA
	Unconstrained	M-F	16.7	10	.082	.982	.985	.995	.047
DI CI	Constraineda	M–F	30.7	20	.044	.967	.986	.991	.045
Playful consumption:	$\Delta \chi^2$		14.0	10		No significat	it effect of g	ender at $p < $.	05
Item 20 d removed + e20g –e20i									
+e20i-e20j	Unconstrained	Y–O	18.1	10	.054	.981	.981	.994	.052
+e20j-e20k	Constrained ^a	Y-O	34.9	20	.014	.965	.988	.988	.053
+e20g-e20j	$\Delta \chi^2$		16.8	10		No signific	ant effect of	age at $p < .0$	5

Note: Mod, moderating factor; M-F, male-female; Y-O, young-old; GFI, goodness-of-fit index; TLI, Tucker-Lewis index; CFI, comparative fit index; RMSEA, root mean square error of approximation.

^aOne path loading constrained to 1; five path loadings, one variance, and error covariances (e20g-e20i, e20i-e20j, e20j-e20k, and e20g-e20j) were constrained equal across moderated groups.

Table 5. Structural equation modeling results, gender-moderated samples

Equality	Mod	χ^2	df	$p(\chi^2)$	GFI	TLI	CFI	RMSEA		
Unconstrained ^a $-M_0$ Constrained ^b $-M_1$	M–F M–F	432.1 432.6	278 281	.000 .000	.879 .879	.932 .934	.945 .946	.043 .042		
$\Delta \chi^2 = M_1 - M_0$		0.5	3	No significant effect of gender at $p < .05$						

Note: Mod, moderating factor; M-F, male-female; Y-O, young-old; GFI, goodness-of-fit index; TLI, Tucker-Lewis index; CFI, comparative fit index; RMSEA, root mean square error of approximation.

^bM₁: M₀+ all the structural parameters (regression weights between innovativeness, brand switching, and playful consumption) constrained equal.

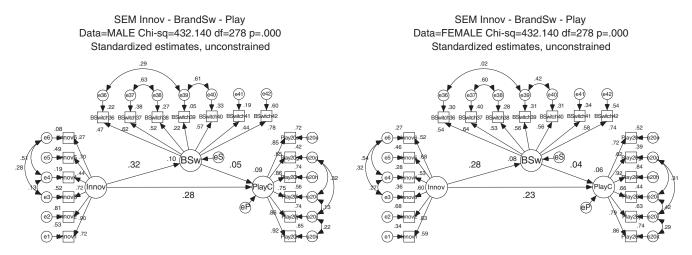


Figure 5. Structural model, all parameters unconstrained (M_0) .

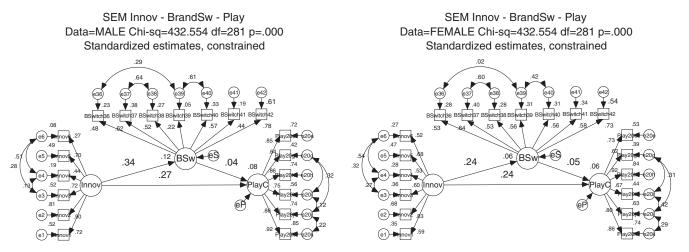


Figure 6. Structural model, all structural parameters constrained (M_1) .

innovativeness. This nonrelatedness of brand switching and playful consumption further implies that the symbolic interaction of playful consumption within the product use context does not go along with the consumption of different brands. This notion does not mean that a new encounter of playfulness cannot be experienced again with new brands. Instead, to achieve a level of playfulness, exposure and familiarization are implied—in other words, theories of familiarity and exposure may come into play. When someone needs a novel playful experience through a new brand, he or she requires sufficient exposures to be familiar with

the new brand to achieve the stimulating level of playful experience. Developing this further, the exploratory qualities driven by innovativeness toward brand switching seem not to be the same as those toward playful consumption. In other words, there is an indication of incompatibility between the exploratory properties of innovativeness as applied to brand switching and those applied to playful consumption. These conceptual incompatibilities help explain why playful consumption and brand switching were found empirically to have no significant relationship. The discussion that follows therefore looks at some of the possibly incompatible

 $^{{}^{}a}M_{0}$: all parameters unconstrained.

Table 6. Results of structural equation modeling, age-moderated samples

Equality	Mod	χ^2	df	$p(\chi^2)$	GFI	TLI	CFI	RMSEA
Unconstrained ^a — M_0 Constrained ^b — M_1 $\Delta \chi^2 = M_1 - M_0$	Y-0 Y-0	432.9 441.5 8.6	278 281 3	.000 .000	.875 .872 Signific	.931 .930 ant effect of ag	.944 .942 ge at $p < .05$.043 .043

 $^{{}^{}a}M_{0}$: all parameters unconstrained.

^bM₁: M₀+ all the structural parameters (regression weights between innovativeness, brand switching, and playful consumption) constrained equal.

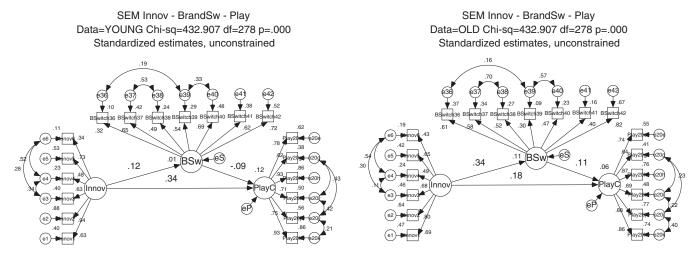


Figure 7. Structural model, all parameters unconstrained (M_0) .

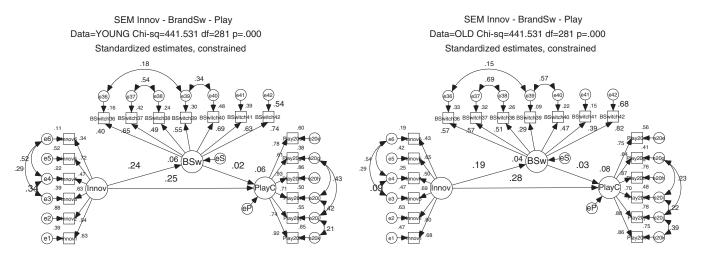


Figure 8. Structural model, all structural parameters constrained (M_1) .

properties, including mediation in maintaining OSL and capability in discriminating stimuli.

1. Looking more closely at innovativeness as a predictor of playful consumption and brand switching, the nonrelatedness between brand switching and playful consumption suggests that maintaining the OSL from playful consumption is unlikely to be mediated by consuming different brands. On the other hand, maintaining the OSL of brand switching is unlikely to be mediated by playful consumption. More practically, when an individual is obtaining OSL through experiencing playful rewards from a brand, it is unlikely that at the same time he or she looks for a different brand. This further implies three things in relation to managing the optimal level of pleasantness from playful

consumption. First, this tends to be facilitated by familiarization and exposure with a particular brand rather than with several brands. Second, although the findings imply that innovativeness maintains OSL through managing stimulating playful experiences, consuming different brands appears to inhibit encountering playfulness. In other words, switching brands tends to disrupt encountering playful stimuli, experiencing playful rewards, and maintaining OSL through playful experiences. Third, the novelty and exploratory trait of innovativeness exerts a direct influence on seeking and enjoying either playful consumption or brand switching but cannot take both routes at the same time. This latter notion further implies that being innovative might bring some psychological two-option challenge to the individual consumer in making decisions:

Table 7. Structural parameters

Moderator	Group	Model Index	Struct	Structural parameters				
			γIP	γIB	γBP			
Gender	Male	M_0	.28**	.32**	.05			
		M_1	.27***	.34***	.04			
	Female	M_0	.23*	.28*	.04			
		M_1	.24***	.24***	.05			
Age	Young	M_0	.34***	.12	09			
C	C	M_1	.25***	.24**	.02			
	Old	M_0	.18	.34***	.11			
		M_1	.28***	.19**	.03			

Note: γ IP: regression weight innovativeness – playful consumption. γ IB: regression weight innovativeness – brand switching. γ BP: regression weight brand switching – playful consumption. M_0 : all parameters unconstrained. M_1 : M_0 + all the structural parameters equally constrained.

whether to pursue a playful experience or experience different brands. Although maintaining OSL driven by being innovative can be actualized/articulated through either playful consumption or switching brands, the theory of exposure and familiarization helps explain how he or she undertakes or continues down the route of playful consumption behavior.

2. As innate brand switching was examined in this article, the findings imply that the ability to distinguish stimuli within the relationship between innovativeness and brand switching is different from and not correlated with that within the relationship between innovativeness and playful consumption. Within the first relationship, it refers to a sensitivity to detect possible attractive brand-related stimuli across new/different brands, whereas the second refers to detection of desirable playful stimuli from a current brand.

Fourth, as being innovative has been found to predict playful consumption, the latter can be regarded as a possible expression of the trait of innovativeness. This does not mean that only innovative persons can play, but being innovative may enhance the likelihood to encounter playfulness. The innovativeness—playful consumption relationship seems to imply that playful situations may give some sort of enjoyable challenge to innovative consumers to promote self-inventiveness and encounter opportunistic rewards creatively and imaginatively.

Fifth, the findings confirmed the results of prior work (e.g., Raju, 1980; Van Trijp *et al.*, 1996) that innovativeness correlates positively to and drives the tendency to switch brands. The extent to which innovativeness influences brand switching can be seen as the extent to which brand switching is intrinsically driven by consumers' inner characteristics. Being innovative for its own sake and the enjoyment of seeking and finding new experiences are considered rewards in themselves and cause the variation-laden behavior of brand switching. This behavior is then said to be true brand switching, reflecting the supremacy of intrinsic motivation. Thus, innovativeness requires a repertoire of stimuli, with a range of

different brands serving to meet an internal demand for newness seeking within innovative consumers.

Sixth, although satiation and boredom have not been examined, these two states could play an important role—as a turning point—for someone to start to search for novel experiences. Arguably, these could or should not be completely separated from (or might be related to) the trait of innovativeness. On one hand, arguably, satiation and boredom might moderate—either amplify or reduce—the influence of innate innovativeness toward subsequent behavior such as the adoption of new products. On the other hand, arguably, innovativeness might influence the sensitivity to satiation and boredom in that it might make these states more affecting.

Finally, gender did not moderate the relationships in the research model, with the empirical coefficients prevailing for male and female individuals. This clarifies that within the domain of the innovative consumer enjoying playful rewards, gender tends not to be influential. On the other hand, age did moderate one structural path of innovativeness—brand switching, where it was shown to have had a greater impact on brand switching among young consumers than among older ones. It is also indicated that the impact of innovativeness in driving playfulness is stronger for young people than for older ones. This notion confirms the theoretical stance of habituation that having less experience results in less reference to adapt to new external stimuli.

PRACTICAL IMPLICATIONS

These findings offer insights into the realm of playful consumption in relation to the consumer characteristics of being innovative and having a brand-switching propensity. For industries and products that offer rich and salient playful rewards, innovators are vital for marketers trying to gain a strong foothold in the marketplace.

Interestingly, although being innovative predicts the tendency to switch brand, the latter does not predict the likelihood of encountering playful consumption. In other words, as innovative consumers tend to be playful, and playfulness is not enhanced by consuming different brands, marketers might not have to be too concerned about the likelihood of their innovative consumers finding different brand(s) for the sake of enjoying playful consumption. Furthermore, when innovative consumers begin to enjoy playful rewards from a brand, there is a good opportunity for the brand/provider to encourage and serve these consumers for further or more serious playful consumption.

Of course, this is not to suggest that marketers need do nothing to keep their innovative consumers amused. Playful rewards may become obsolete, and consumers may reach what is called as "adaptation" level to the current enjoyment that they have been consuming. Innovative consumers may need to be offered new playful rewards through new products over time. The findings further illuminate such an opportunity for those marketers offering playful-laden products to maximize the impact of their marketing campaigns by

^{*}p < .05.

^{**}p < .01.

^{***}p < .001.

focusing their efforts on innovators and early adopters to enhance their influence on other consumers.

A further interpretation of the finding that brand switching does not predict the experience of playful consumption is that an innovative consumer may purchase a different brand of a similar product item not for the sake of enjoying playful consumption but for "functional and social" reasons. For example, although a consumer finds the iPhone playfully enjoyable for himself or herself, he or she still buys a Blackberry because of peer pressure and to be accepted by his or her social group.

As innovativeness predicts playful consumption across gender and age, marketers launching playful products and services should focus their efforts primarily on their innovative consumers. Perhaps more intriguingly, with young innovative consumers tending to be less driven to switch brands than do older ones, or tending to stay with current brands, marketers may achieve better results by giving more attention to their young innovative consumers.

Finally, the real challenge is that playful products offered to innovative consumers should enable consumers to enjoy the creativity and imaginative opportunities they seek without ignoring the contextual perspective of gender and age. What might be creative and imaginative for older innovative consumers may not be for younger ones, and similarly for male and female individuals. In this regard, playful value cocreation between consumers and providers may be a key for success.

Overall, therefore, in their enjoyment of playful products, innovative consumers are more likely to be friend than foe.

LIMTATIONS AND FUTURE RESEARCH

A problem inherent to all such surveys is socially desirable bias, whereby subjects completed the questionnaire with socially desired rather than true answers. However, the fact that the reliability and validity of the measurements used were statistically acceptable, perhaps partly due to the freedom given to select products of interest, might indicate that this problem did not adversely affect the research. Another limitation is that although structural equation modeling has been thoroughly applied, other models might work equally well.

Further limitations of this study reveal the opportunities for expanding the playful consumption and consumer innovativeness knowledge base. First, as the sample frame is in the individual context of playfulness, the findings might not be immediately generalized into the wider social context. Further research within the social environment will help reveal the innovativeness–playfulness relationship, whether confirming or disconfirming the findings from the individual context. Second, the random sampling and variety of products investigated in this research might be less desirable for marketers targeting specific segments for their particular product category or item. Therefore, further research with specific segments and within particular product categories would certainly be useful.

With respect to satiation and boredom, further research with the following theoretical agenda could be relevant: whether the level of satiation and boredom of innovative people is relatively lower than that of others; when satiation and boredom emerge, whether the more innovative a person is the stronger he or she is urged to seek new experiences and new brands; and whether for innovative consumers the search for novel experiences can happen even without the level of satiation and boredom being achieved.

In addition to the mentioned further research, to obtain more insights into playful consumption in conjunction with new product campaign strategies, some suggestions are offered here. First, it is valuable to investigate the playful consumption of the innovative consumer in respect to their attitudes to and perceptions of corresponding marketing communication, such as advertising and sales promotions. Second, other valuable directions would be to investigate the relationship in conjunction with types of adoption process involved, the brand belief, and attitudes to switching costs, where a wider picture of innovative consumers can be obtained.

APPENDIX

MEASURING PLAYFUL CONSUMPTION, ADOPTED FROM WEBSTER AND MARTOCCHIO (1992)

(1 = strongly disagree to 7 = strongly agree)

- 1. When using this product, I am spontaneous.
- 2. When using this product, I am imaginative.
- 3. When using this product, I am flexible.
- 4. When using this product, I am creative.
- 5. When using this product, I am playful.
- 6. When using this product, I am original.
- 7. When using this product, I am inventive.

Measuring innovativeness, adopted from Goldsmith and Hofacker (1991)

(1 = strongly disagree to 7 = strongly agree)

- 1. Compared with my friends, I do little purchasing for this product. (*r*)
- 2. In general, I am the last in my circle of friends to know the names of the latest trends for this product. (*r*)
- 3. I know more about new versions of this product than other people.
- 4. If I heard that a new version of this product was available, I would be interested enough to buy it.
- 5. In general, I am among the last in my circle of friends to purchase new products like this. (*r*)
- 6. I will consider buying one, even if I have just heard about it.

Measuring brand switching, adopted from Raju (1980) (1 = strongly disagree to 7 = strongly agree)

- 1. I enjoy sampling different brands of commonplace products for the sake of comparison.
- 2. I would rather stick with a brand I usually buy than try something I am not very sure of.
- 3. If I like a brand, I rarely switch from it just to try something different.
- 4. I get bored with buying the same brands even if they are good.
- 5. A lot of time I feel the urge to buy something really different from the brands I usually buy.

- 6. If I did a lot of flying, I would probably like to try all the different airlines, instead of flying just one most of the time
- 7. I enjoy exploring several different alternatives or brands while shopping.

BIOGRAPHICAL NOTES

Lukman Aroean is a lecturer in international marketing. His interest is in contemporary consumer innovative behavior and consumer marketing within the advanced technology product and international contexts. Prior to his academic career, he had held a number of managerial posts in a variety of industries such as retail, trade, manufacturing, management, and engineering services within the international environment.

REFERENCES

- Agarwal R, Karahanna E. (2000). "Time flies when you're having fun: Cognitive Absorption and Beliefs about Information Technology Usage." *MIS Quarterly* 24(4): 665–694.
- Baumgartner H, Homburg C. (1996). "Applications of structural equation modeling in marketing and consumer research: A review." *International Journal of Research in Marketing 13*(2): 139–161.
- BBC. (2008). "Fans go mad for new Warcraft game." Vol. 2008. Belk RW, Ger G, Askegaard S. (2003). "The Fire of Desire: A Multisited Inquiry into Consumer Passion." Journal of Consumer Research 30: 326–351.
- Bentler PM. (1992). "On the fit of models to covariances and methodology to the Bulletin." *Psychological Bulletin* 112(3): 400–404.
- Blumer H. (1969). *Symbolic interactionism: perspective and method.* Englewood Cliffs, NJ: Prentice Hall.
- Browne MW, Cudeck R. (1993). "Alternative ways of assessing model fit." In Bollen KA, Long JS (eds). *Testing structural equation models*. Newbury Park, CA: Sage.
- Csikszentmihalyi M. (1991). Flow: The Psychology of Optimal Experience. New York: Harper Perennial.
- Deighton J, Henderson CM, Neslin SA. (1994). "The Effects of Advertising on Brand Switching and Repeat Purchasing." *Journal of Marketing Research (JMR)*. 31(1): 28–43.
- Flynn LR, Goldsmith RE. (1993). "Identifying Innovators in Consumer Service Markets." *Service Industries Journal* 13(3): 97–109.
- Gatignon H, Robertson TS. (1991). "Innovative Decision Process."
 In Robertson TS, Kassarjian HH (eds). Handbook of Consumer Behaviour. Englewood Cliffs, NJ: Prentice-Hall.
- Goldsmith RE, d'Hauteville F, Flynn LR. (1998). "Theory and Measurement of Consumer Innovativeness." *European Journal of Marketing* 32(3/4): 340–353.
- Goldsmith RE, Flynn LR, Goldsmith EB. (2003). "Innovative Consumers and Market Mavens." *Journal of Marketing Theory and Practices* 11(4): 54.
- Goldsmith RE, Hofacker CF. (1991). "Measuring Consumer Innovativeness." *Journal of the Academy of Marketing Science* 19(3): 209–221.
- Griffin M, Babin BJ, Modianos D. (2000). "Shopping values of Russian consumers: the impact of habituation in a developing economy." *Journal of Retailing* 76(1): 33–52.
- Grover R, Srinivasan V. (1992). "Evaluating the Multiple Effects of Retail Promotions on Brand Loyal and Brand Switching Segments." *Journal of Marketing Research (JMR)* 29(1): 76–89.
- Hartman JB, Shim S, Barber B, O'Brien M. (2006). "Adolescents' utilitarian and hedonic Web consumption behavior: Hierarchical influence of personal values and innovativeness." *Psychology and Marketing* 23(10): 813–839.

- Hirschman EC. (1980). "Innovativeness, Novelty Seeking and Consumer Creativity." *Journal of Consumer Research* 7: 283–295.
- Holbrook MB. (1999). Consumer Value: A Framework for Analysis and Research. London: Routledge.
- Holbrook MB. (1994). "The Nature of Customer Value: An Axiology of Services in the Consumption Experience." In Rust R, Oliver R (eds). *Service Quality*. Thousand Oaks, CA: Sage.
- Holbrook MB, Chestnut RW, Oliva TA, Greenleaf EA. (1984).
 "Play as a Consumption Experience: The Roles of Emotions, Performance, and Personality in the Enjoyment of Games."
 Journal of Consumer Research 11(2): 728–739.
- Holbrook MB, Hirschman EC. (1982). "The Experiential Aspects of Consumption: Consumer Fantasies, Feelings and Fun." *Journal of Consumer Research 9*: 132–140.
- Holt DB. (1995). "How Consumers Consume: Toward a Typology of Consumption Practices." *Journal of Consumer Research* 22: 1–25.
- Hu L-, Bentler PM. (1999). "Cutoff Criteria for Fit Indexes in Covariance Structure Analysis: Conventional Criteria versus New Alternatives." Structural Equation Modeling 6(1): 1–55.
- Hu L-, Bentler PM. (1995). "Evaluating Model Fit." In Hoyle RH (ed). Structural Equation Modeling: Concepts, issues and applications. Thousand Oaks, CA: Sage.
- Huizinga J. (1955). *Homo ludens: a study of the play element in culture*. Boston: Beacon.
- Im S, Bayus BL, Mason CH. (2003). "An empirical study of innate consumer innovativeness, personal characteristics, and new-product adoption behavior." *Journal of the Academy of Marketing Science* 31(1): 61–73.
- Kozinets RV, Sherry JF, Storm D, Duhachek A, Nuttavuthisit K, Deberry-Spence B. (2004). "Ludic Agency and Retail Spectacle." *Journal of Consumer Research 31*: 658–674.
- Lieberman JN. (1977). *Playfulness: Its Relationship to Imagination and Creativity*. New York: Academic Press.
- MacCallum RC, Browne MW, Sugawara HM. (1996). "Power analysis and determination of sample size for covariance structure modelling." *Psychological Methods 1*(2): 130–149.
- Mathwick C, Malhotra N, Rigdon E. (2001). "Experiential Value: Consptualization, Measurement and Application in the Catalog and Internet Shopping Environment." *Journal of Retailing* 77(1): 39–56.
- Mathwick C, Rigdon E. (2004). "Play, Flow and the Online Search Experience." *Journal of Consumer Research 31*: 324–332.
- McAlister L, Pessemier E. (1982). "Variety Seeking Behavior: An Interdisciplinary Review." *Journal of Consumer Research* 9(3): 311–322.
- Midgley DF, Dowling GR. (1978). "Innovativeness: The Concept and Its Measurement." *Journal of Consumer Research* 4(4): 229–242.
- Mintel. (2007). "Massively Multiplayer Online Games (MMOGs) UK November 2007."
- Mittal B. (1994). "An Integrated Framework for Relating Diverse Consumer Characteristics to Supermarket Coupon Redemption." *Journal of Marketing Research 31*: 533–544.
- Molesworth M, Denegri-Knott J. (2008). "The Playfulness of eBay and the Implications for Business as a Game-Maker." *Journal of Macromarketing* 28(4): 369–380.
- Mudd S. (1990). "The place of innovativeness in models of the adoption process: an integrative review." *Technovation* 10(2): 119–136.
- Nunnally JC, Bernstein IH. (1994). *Psychometric Theory* (3rd ed.). New York: McGraw-Hill.
- Putrevu S, Lord KR. (1994). "Comparative and Noncomparative Advertising: Attitudinal Effects under Cognitive and Affective Involvement Conditions." *Journal of Advertising* 23: 77–90.
- Raju PS. (1980). "Optimum Stimulation Level: Its Relationship to Personality, Demographics, and Exploratory Behavior." *Journal of Consumer Research* 7(3): 272.
- Ram S, Jung H-S. (1994). "Innovativeness in Product Usage: A Comparison of Early Adopters and Early Majority." *Psychology* and Marketing 11(1): 57–67.

Copyright © 2011 John Wiley & Sons, Ltd.

- Ridgway NM, Price LL. (1994). "Exploration in Product Usage: A Model of Use Innovativeness." *Psychology and Marketing 11*(1): 69–84
- Roehrich G. (2004). "Consumer Innovativeness: Concepts and Measurements." *Journal of Business Research* 57: 671–677.
- Russ SW. (1993). Affect and Creativity: The Role of Affect and Play in the Creative Process. Hillsdale, NJ: Lawrence Erlbaum.
- Steenkamp JBEM, Baumgartner H. (1992). "The Role of Optimum Stimulation Level in Exploratory Consumer Behaviour." *Journal of Consumer Research 19*: 434–448.
- Sutton-Smith B. (2001). *The Ambigutiy of Play*. Cambridge, Massachussets: Harvard University Press.
- Tellis GJ, Yin E, Bell S. (2009). "Global Consumer Innovativeness: Cross-Country Differences and Demographic

- Commonalities." *Journal of International Marketing 17*(2): 1–22.
- Trijp V Hans CM, Hoyer WD, Jeffrey Inman J. (1996). "Why Switch? Product Category-Level Explanations for True Variety-Seeking Behavior." *Journal of Marketing Research (JMR)* 33(3): 281–292.
- Venkataraman MP. (1991). "The Impact of Innovativeness and Innovation type of Adoption." *Journal of Retailing* 67(1): 51–67.
- Venkataraman MP, Price LL. (1990). "Differentiating between Cognitive and Sensory Innovativeness: Concepts, Measurements and Implications." *Journal of Business Research* 20: 239–315.
- Webster J, Martocchio JJ. (1992). "Microcomputer Playfulness: Development of a Measure With Workplace Implications." MIS Quarterly 16(2): 201–226.