



Communicating with consumers through video games: an analysis of brand development within the video gaming segment of the sports industry

Keywords

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Abstract

The PGA Tour/Tiger Woods golf series was examined for brand and product placement and found to have 2,100 identifiable brand images, with all but one occurring in the final three years. Brands appearing most frequently included Oakley, Nike, adidas, TW Nike and Tag Heuer. By product category, Nike was leader in equipment (36%) and Oakley in apparel (31%). The results indicate that video games are increasingly seen as viable marketing avenues.

Executive summary

The increasing popularity of the sports video game genre has provided advertisers with new avenues for marketing and product placement. Video games, once seen as kids' games and strictly recreational tools, have transformed into vivid, life-like representations of a wide variety of situations. Sports video games in particular have been embraced in the marketplace,

with the genre holding 40% of the console gaming marketplace. Chief among the demographic groups that purchase sports video games is Generation Y, a highly desirable target market for advertisers that comprise consumers aged 18-34. As video games have advanced technologically, advertisers appear to have taken notice, with industry-wide expenditure on



in-game product placement rising sharply – from \$50 million in 2004 to a projected \$120 million in 2006.

The purpose of this study was to examine whether companies are using the sports video game genre for the purposes of branding and product placement, and if so, to what extent this utilisation is taking place. The study examined the highly popular PGA Tour/Tiger Woods golf game for the Playstation and Playstation 2 consoles from 1997-2006, utilising the content analysis method to measure the amount of product and brand placement present in the various menu options for each year of the series. The study used the brand image, name or logo as the unit of measurement.

The results of the study reveal that advertisers are indeed using sports video games for the purposes of branding and product placement, and that this utilisation is a relatively new phenomenon. For the first seven years of the series, there was only one incidence of branding. However, in the final three years of the series, from 2004-2006, there were 2,099 unique occurrences of branding and product placement. Furthermore, the number of incidences of branding in each game more than doubled from 2004 to 2006, while the number of brands represented in the game nearly doubled over that same time span. Certain brands had a much larger presence than others, with adidas, the Nike family and Oakley accounting for more than two-thirds of the total branding impressions recorded. In all, 24 distinct brands were identified over the life of the series, including such niche companies as Cobra, Precept and Under Armour.

These results indicate that sports video games are increasingly seen as viable marketing avenues by companies and by advertisers. The growing number of visible company brands, coupled with the increasing number of available products, indicates a desire by these companies to have their brands seen and utilised by users of this game series.

Introduction

Video games (i.e. Pong, Space Invaders, Pac-Man) were introduced almost three decades ago as a new form of home entertainment. While early home video games were rather basic in design and execution, the genre has since evolved in terms of technology, interactivity and popularity. Today, there are 132 million teen and adult gamers in the United States alone, where nearly half of all households have a games console (Brown, 2006). Sales of entertainment software reached \$8.2 billion in 2004, and are expected to reach \$15 billion in 2009. The potential reach for advertisers and corporate entities is enormous, as video games have provided another medium through which marketers utilise brand development and brand awareness.

The modern success of the sports video game genre began with EA Sports' Madden NFL Football. The series has sold more than 19 million units since its debut in 1989. Because of the enormous success of this video game, a separate sports category was created, which now includes games from several different sports entities, such as golf (PGA Tour/Tiger Woods), baseball (MVP Baseball, Triple Play), football (NCAA College Football), basketball (NBA Live, College Hoops) and boxing (Fight Night). In 2005, 17.3% of video games sold were of the sports genre (Essential Facts, 2006) and six of the top 10 units sold in 2005 were sports games.

Despite competition from several other companies, EA Sports – a subsidiary of Electronic Arts (EA) – is the leader in the sports gaming industry, with a 25% market share. EA Sports accounts for a third of EA's \$3.1 billion annual revenue. Video sports games not only provide EA and other gaming companies with billions of dollars in revenues, but they also provide a unique 'outside the box' method of marketing and advertising for the corporate world. According to the Sports Business Journal, in-game video game advertising spending was at \$50 million in 2004. In 2005, advertising expenditures jumped to



\$80 million (Video Game, 2006), with a projected total of \$730 million by 2010 (Brown, 2006).

The traditional marketing and advertising spending patterns that have supported corporate brands are not as effective in the current market environment, because many of these time-honoured initiatives are creating less of a return on investment than they did before. In today's marketplace, it is the marketer's job to relate the brand to its target consumer in a very personal and relevant way. Experts indicate that major advertising agencies are expanding client services to include all forms of sports marketing and sponsorship opportunities, including video games (Bonham, 1998, as cited in Bush et al, 2004). Sports video games have become an effective way in which advertisers can reach an ever-growing target audience.

While it is true that video games reach a wide demographic range (Brown, 2006), one of the most important market segments to advertisers is individuals born between 1977 and 1994, otherwise known as Generation Y (Bush et al, 2004). Within this overall market is the teen market segment, one of the most coveted of all segments due to the consumers' spending power, ability to be trendsetters, receptivity to new products and tremendous potential for becoming lifetime consumers (Brand, 2000; Wolburg & Pokrywczynski, 2001). Video games are the "most frequently used interactive media" among this valued market segment (Beentjes et al, 2001, p.95). The teen market is notoriously difficult for marketers to capture, so as the infrastructure for in-game ads improves, it seems clear that advertisers will recognise the potential and embrace it (Tochen, 2006). Advertising in video games provides marketers with a rare opportunity to play a significant role within this popular and ever-growing entertainment vehicle (Brown 2006). By actively getting involved in video games, advertisers are developing a brand image in a medium that is attractive to this market segment.

Review of literature

Advertising

Successful advertising can enhance a brand's reputation in a specific product category, which can lead to a greater increase in sales and more positive feelings for the overall brand (Chaudhuri, 2002; Zajonc, 1980). Advertising theory concludes that in the absence of functional brand differentiation, brand advertisement has to give every consumer some reason, benefit or added value to be able to select one brand over another (Ehrenberg et al, 2002). Successful advertising and marketing should affect a consumer's experience, meaning that advertisers should not just tell the consumer about the brand, but should also allow the consumer to experience the brand (Calder & Malthouse, 2005). Customer perception of a brand's value occurs when the customer is familiar with the brand and holds favourable, strong and unique brand associations in their memory (Keller, 1993). Video gaming is a genre that is well suited to marketing and advertising.

Advertising, through the gaming experience, allows for repeated exposure of the brand, which in turn leads to a more conscious understanding of a brand's image (Ehrenberg et al, 2002).

Brand and product development

To properly develop a product's brand, advertisers and marketers must be able to differentiate their product from those of their competitors. Both Aaker (1991) and Keller (1993) argue that the creation of brand value (i.e. added value associated with a brand name) is largely driven by consumers' mental associations relative to a specific brand. As noted by Mehta et al (2001, p.9), "A consideration set refers to the set of brands (a subset of all the brands in the product category) over which a consumer makes an explicit utility comparison or cost-benefit trade-off before she makes her brand choice decision." Video games present a new method of advertising to those target consumers that corporations may not fully be reaching.



The concept of brand community may be applicable to the investigation of brand placement in video games. Cova and Pace (2006, p.1087) noted that the study of brand community involves the examination of “consumers driven by a similar passion or ethos to form a group, thereby producing a sub-culture”. Brand communities form around a particular product and have been interpreted in several ways in previous research, including relatively simple brand-to-consumer connections, as well as more complex webs of community which involve the brand, the customer, the product and the marketer (McAlexander et al, 2002). Brand communities may exist on a dual-level basis in relation to product placement in video games, on one level involving communities focused on the brands included in the game and on another level involving communities focused on the games themselves.

It is essential that advertisers maximise their overall investment by actively leveraging their role in video games with a meaningful marketing strategy (Farrelly et al, 2005). Product placement via video games offers advertisers an opportunity to reach a larger and more captive audience than they would with traditional advertising methods (Nelson, 2002).

While some marketing methods involving sports could be considered obtrusive, this is not the case with in-game marketing. In fact, research shows that gamers enjoy the method of marketing via product placement because they believe it enhances the realism of the experience, aids character development, creates a sense of historical subtext and provides a sense of familiarity (Nelson, 2002; Tsuruoka, 2006). Advertisers see the effectiveness of including their products in computer and video games as a popular method to increase brand awareness (Nelson, 2002). Advertisers have found that the marketing method of product placement is a successful way to develop their brand to a specific market segment. The brand can play an endorser role, in that it will provide credibility and instil confidence in the consumers, especially if new technology like video games is involved (Aaker, 2004).

Product placement within video games provides advertisers with the ability to consistently demonstrate

their product in its natural state, such as a round of golf, and to do so over a period of time not afforded by the temporal constraints of a television broadcast.

Video games

Video games allow for brands to create a significant number of unique impressions on a specific target market that they might otherwise not be able to reach. A unique brand that can position itself in the marketplace as superior will lead to an increase in its reputation, which will in turn lead to a greater market value (Chaudhuri, 2002). Video games provide this unique opportunity for corporate brands. The technological advancements in gaming have made it easier and more efficient for marketers to place highly targeted brands in games which will have a positive effect on the consumer’s involvement with the respective brand (Nelson, 2002).

There have been several studies done within the genre of video games, most of which focus on sociological aspects of the individual participating (Beasley & Standley, 2002; Vandewater et al, 2004). However, only a few studies have focused on business aspects of the video game industry. Most notable was the study by Nelson (2002), which focused on the effectiveness of placing brands in racing games by measuring the sponsorship recall of the participants. The study found that players were able to recall 25-30% of brands in the short term and approximately 10-15% of the brands at a delay. Brands that were associated with a major part of game play or brands that were already relevant to the consumer experienced a higher recall rate.

Purpose of the study

The purpose of this study was to determine the recent trends in brand development in sports video gaming. This work breaks new ground because it concentrates on brand development and trends over the past decade in sports video games. In an effort to determine the existence and extent of this brand



development, this paper analyses the annual golf video games offered through EA Sports and Tiger Woods PGA Tour. This sport and these releases were selected because of their unique position in the video game marketplace. The burgeoning popularity of the sport of golf, particularly among young people, can be traced back to the appearance of Tiger Woods on the PGA Tour in the late 1990s and his subsequent successes. Not only have Woods' on-course successes increased interest in the game among the youth demographic, but the presence of a consistently successful multiracial golfer made golf an attractive sport to a wide variety of social, racial and economic groups (Lieber, 2001).

The PGA Tour/Tiger Woods series is also relatively unique in the video gaming segment of the sports industry, standing as the only mainstream sports title where the user can create an individual character in his/her own image, progress that character through a series of individual-play tournaments and dress that character in whatever way s/he sees fit. In addition, the PGA Tour/Tiger Woods series is one of the longest-running sports gaming franchises, with the original PC version of the game appearing in the early 1990s. The study involved an analysis of the first decade of golf video-game releases (1997-2006). By examining the brand usage and placement, a better understanding of how corporations use video games to develop a specific brand line to a captive audience is achieved.

Based on the results of previous research into branding, brand development and video games, the following research questions were developed for this study:

1. Do corporate advertisers use sports video games as an avenue for branding?
2. To what degree are corporate advertisers integrating their products into sports video games?

Methodology

The methodology for this study was a content analysis of brand images appearing in the annual golf video games offered through EA Sports and Tiger Woods PGA Tour. Content analyses have been conducted on books, newspapers, television broadcasts, websites and many other communication formats (Riffe et al, 2005). This unobtrusive and non-reactive research methodology is simply the systematic and replicable examination of communication symbols. The brand images appearing within the menu frame of the video games (N=10) provided the overall data for this study. All of the game menu options, products and brands – with the exception of the manufacturer's (EA) brand – were coded. Only those brand images that met the study's codebook and coding protocol (i.e. recognisable, visible, understandable) were coded.

Measures

The study involved a descriptive analysis of brand images (e.g. logos) included in the video games (N=10) over the prescribed time (1997-2006). For the coded material examined, the unit of analysis was the brand logo or image. In an attempt to discover the existence and extent of brand development in sports video games, seven coding measures were developed and coded. The coders first identified themselves (1 or 2). Next, the year in which the golf video game was released was recorded. Following this, the game menu location (i.e. equipment, apparel) was noted. The coders then recorded the brand name of the product, and the featured product was noted by the coders. For example, the coders identified if the brand appeared on a ball, putter, pair of pants, shirt, glove, etc and then determined whether the feature product was locked or unlocked. (This was determined by the user's ability to purchase or use the item in question in the default game – if an item was unable to be purchased from the game menu frame, it was considered a locked product.) The last variable coded was the dollar amount. This only applied to those elements of the game where items were being purchased (i.e. the game's Pro Shop).



Coders

Riffe et al (2005) note that content analyses can use one coder, two coders or several coders. In order to efficiently and effectively code the content of this study, two trained sports management doctoral students were utilised as coders. Both of the coders had an effective level of training and worked independently. These two coders were utilised due to their involvement in and familiarity with the codebook, coding sheets and coding protocol. First they independently examined the same two video games, which were chosen by random selection and which represented 20% of the total sample. This initial coding was done in order to test intercoder reliability (explained below). After the completion of the intercoder reliability section, the remaining eight video games (from a total of 10) were randomly divided into two groups, with each coder given four video games. In total, each of the coders coded six video games (two intercoder reliability games plus four individual games).

Reliability

Reliability in content analyses is directly connected with intercoder reliability. This is the determination of the degree to which coders consistently measured the coding variables. The testing of intercoder reliability involves measuring consistency, which involves both a simple agreement percentage and a statistic that takes into consideration the element of chance agreement. To effectively test reliability in content analysis, researchers must have an overlap of data (normally a minimum of 10%) where the project coders have coded the same information (Riffe et al, 2005). Therefore, two video games (20% of the 10 video games in this study) were randomly selected, in order to provide a reasonable size for a data overlap. The same two video games were independently coded by the study's two coders. An examination of the issues in this sample that fit the requirements of the codebook protocol produced a total of 404 brand

images. The 404 brand images were 19.2% of the total brand images (2,100) coded for this study.

The first stage of reliability requires the calculation of simple percentage agreement, which can be determined by tabulating the number of times the coders have coded the data the same way. For this study, the agreement between the coders in the overlap area resulted in percentages that ranged from 95.8% to 99.3% (Table 1). According to Riffe et al (2005), any agreement percentage above 80% is considered acceptable. However, because this agreement could be the result of accurate coding or nothing more than agreement by chance, there is a need for a second stage in the testing of intercoder reliability. This stage takes out agreement by chance alone. It involves turning the percentage of agreement into a coefficient of reliability (Potter & Levine-Donnerstein, 1999). For this study, these scores ranged from .953 to .992. Any reliability assessment above .70 is considered acceptable for the corrections for chance agreement (Riffe et al, 2005). This study's high numbers relating to percentage of agreement and correction for chance agreement confirm that the two coders were thoroughly familiar with the coding protocol and codebook by the time this study was conducted. Overall, they were highly consistent in their application of the protocol definitions and procedures.

Data analysis

The purpose of this study was to determine the recent trends in brand development in sports video gaming. The data gathered were used to determine the existence and extent to which brands were integrated into the golf video games offered through EA Sports and Tiger Woods PGA Tour. Using the Statistical Package for the Social Sciences 13.0 [SPSS], descriptive statistics and frequency tables were used to tabulate, describe and summarise the parameters of the data that were collected.



TABLE 1 Reliability percentages and corrections for chance agreement

VARIABLE	PERCENTAGE OF AGREEMENT	SCOTT'S PI
CODER	99.3	.985
VIDEO GAME	99.3	.985
GAME MENU	99.3	.989
BRAND NAME	99.3	.992
PRODUCT	95.8	.953
LOCKED/UNLOCKED	99.3	.985
DOLLAR AMOUNT	98.8	.986

TABLE 2 Total brand images by game year

GAME YEAR	NUMBER OF IMAGES	PERCENTAGE OF TOTAL
1997	0	0.0%
1998	0	0.0%
1999	0	0.0%
2000	0	0.0%
2001	0	0.0%
2002	2	0.1%
2003	0	0.0%
2004	403	19.2%
2005	779	37.1%
2006	916	43.6%

Results

This study involved the coding of all 10 golf video games released by EA Sports and Tiger Woods PGA Tour from 1997 through 2006. The coding protocol and timeframe of the study yielded for analysis a total of 2,100 brand images that fitted the study's protocol. Nearly every brand image recorded in the coding process occurred in the last three years of games that were examined, with the most recent year, 2006, containing 916 brand images. Table 2 reflects the year-by-year breakdown of recorded images.

The 2,100 images coded in this study represented 24 unique brands over the life of the series, with the top five occurring brands appearing in Table 3. None of the remaining brands coded comprised more than 3.9% of the total data set. In order, however, these remaining brands included: Taylor Made, Callaway, Under Armour, Ping, Cleveland Golf, Dunlop, Maxfli, Cobra, Precept, Grafalloy, Mizuno, True Temper, MacGregor, Odyssey Golf, Bridgestone, Golden Bear, Rossa, Tour Stage and Never Compromise.



An examination of the brands within each specific year revealed that several brands were consistently represented in the 2004, 2005 and 2006 editions of the video games. Table 4 illustrates the top brand occurrences for those three years. There were 15 different product groupings coded over the life of the series. The product grouping with the most occurrences was 'Shirts' with 535 (25.5% of the total), followed by 'Headwear' with 472 (22.5%), 'Pants' with 199 (9.5%), 'Watches/Jewellery' with 152 (7.2%) and 'Shoes' with 125 (6.0%). The remaining product groupings coded in this study (ranging from 5.4% to 1.4 %) were Shafts, Eyewear, Balls, Irons, Wedges, Gloves, Putters, Drivers, Fairway Woods and Gloves.

Also analysed were the distributions of brands in terms of the various product groupings. The Nike brand had the widest distribution, appearing in 14 of the 15 identified product groupings. The 'Watches/Jewellery' product grouping was the only one in which the Nike brand was not represented. The other brands that had wide distributions were Callaway and Dunlop (each represented in nine of the 15 product groupings), Precept and Taylor Made (eight product groupings each), Bridgestone, Cleveland Golf, Cobra, Mizuno, Oakley and Ping (seven product groupings each), Golden Bear and MacGregor (six product groupings each) and adidas, Tour Stage and TW Nike (five product groupings each).

For the life of the series, Nike was the most commonly occurring brand in five of the product groupings: Balls, Putters, Fairway Woods, Socks and Gloves. Oakley was the most commonly occurring brand in five categories as well: Shoes, Pants, Headwear, Eyewear and Watches/Jewellery. Taylor Made was the most commonly occurring brand in three of the product categories: Irons, Drivers and Shafts. Cleveland Golf was the most commonly occurring brand in Wedges, and adidas was the most commonly occurring brand in Shirts.

While there were no brands included from 1997 to 2001, several brands were added to the game during the final three years that were reviewed. Although

there were no brand images coded in the 2003 game, the two brand instances coded in the 2002 game both belonged to Nike. In 2004, the number of brands increased to 13. In addition to Nike, the product line-up for 2004 included adidas, Callaway, Cleveland Golf, Maxfli, Odyssey Golf, Ping, Precept, Rossa, Tag Heuer, Taylor Made, Tour Stage and TW Nike. In 2005, the number of brands included increased to 17. The game added Cobra, Dunlop, Grafalloy, Never Compromise, Oakley and True Temper, while Precept and Tour Stage did not repeat their appearances in the game. In 2006, the number of included brands increased to 22, with Bridgestone, Golden Bear, MacGregor, Mizuno and Under Armour appearing for the first time, Precept appearing again after a one-year hiatus, and Cleveland Golf and Never Compromise not appearing.

An examination of brand occurrences based on type of product category was also conducted, with the 15 product categories broken up into two segments: Equipment, which encompassed all items dealing directly with the playing of golf (Balls, Drivers, Fairway Woods, Gloves, Irons, Putters, Shafts, Wedges), and 'Apparel', which denoted all other categories (Eyewear, Headwear, Pants, Shirts, Shoes, Socks, Watches/Jewellery). For the life of the series, the brand with the most instances of equipment was Nike, with 107 (22.1%) of the 485 equipment items. The leader in number of apparel items was Oakley, with 499 (30.9%) of the 1,615 apparel items in the game, and all of those occurring in just the last editions released over the last two years of the study's timeframe (2005 and 2006). An examination of the individual final three years (2004, 2005 and 2006) of the study reveals some interesting results in terms of brand occurrence based on type of product category, highlighted in Table 5.

'Locked' and 'unlocked' products were also a measured element of the game. An 'unlocked' product was available for purchase from the outset of the game, while a 'locked' product was not available to the user until some sort of in-game requirement had been met. Of the 2,100 products, 835 (39.8%) were



Brand development and video games

TABLE 3 Top five occurring brands

BRAND NAME	NUMBER OF IMAGES	PERCENTAGE OF TOTAL
OAKLEY	499	23.8
NIKE	414	19.7
ADIDAS	368	17.5
TW NIKE	134	6.4
TAG HEUER	119	5.7

TABLE 4 Top five brand occurrences 2004-06

2004		2005		2006	
BRAND	NUMBER	BRAND	NUMBER	BRAND	NUMBER
NIKE	121 (30%)	OAKLEY	251 (32.2%)	OAKLEY	248 (27.1%)
ADIDAS	111(27.5%)	NIKE	140 (18.0%)	NIKE	151 (16.5%)
TW NIKE	37 (9.2%)	ADIDAS	128 (16.4%)	ADIDAS	129 (14.1%)
TAG HEUER	32 (7.9%)	TAG HEUER	52 (6.7%)	UNDER ARMOUR	50 (5.5%)
CLEVELAND GOLF	22 (5.5%)	TW NIKE	48 (6.2%)	TW NIKE	49 (5.3%)
TOTAL	403	TOTAL	779	TOTAL	916

TABLE 5 Brand leaders by category 2004-06

	BRAND LEADER	NUMBER OF ITEMS	PERCENTAGE OF YEAR	TOTAL CATEGORY ITEMS
2004 EQUIPMENT	NIKE	36	35.0%	103
2004 APPAREL	ADIDAS	117	37.0%	300
2005 EQUIPMENT	NIKE	36	23.8%	151
2005 APPAREL	OAKLEY	251	40.0%	628
2006 EQUIPMENT	NIKE	35	23.2%	628
2006 APPAREL	OAKLEY	248	36.2%	685

TABLE 6 Brands with at least 40% of items unlocked

BRAND	NUMBER OF UNLOCKED ITEMS	PERCENTAGE OF BRAND'S ITEMS
ADIDAS	192	52.2
NIKE	213	51.4
TAG HEUER	57	47.9
OAKLEY	204	40.9



'unlocked' and therefore available from the outset of the game, while 1,265 (60.2%) were 'locked'. The brands with over 40% of their products unlocked are listed in Table 6.

Discussion

The purpose of this study was to investigate recent trends in brand development in sports video gaming. The results indicate a demonstrable increase in brand occurrence over the life of the PGA Tour/Tiger Woods video game series, both in terms of number of brands included and overall number of available products. This increase of brand occurrence indicates that this video game series has rapidly become an important marketing conduit for companies engaged in the manufacture of golf products, apparel and other items.

According to the data collected, the development of the PGA Tour/Tiger Woods video game series into a viable marketing element was sudden. The lack of branding in the games from 1997 to 2003 could have been due to a number of factors, including technical limitations, graphics capacity and a lack of advertiser familiarity and/or comfort with the video game genre. As discussed earlier, it has become essential that advertisers can maximise their overall investment by actively leveraging their role in video games with a meaningful marketing strategy (Farrelly et al, 2005).

One of the most revealing results is that the number of brands nearly doubled from the first version of the game that had a large quantity of branded products (2004) to the last version coded (2006). In 2004, the number of brands stood at 13. Despite three brands dropping during the next two years, the overall number of brands increased to 22. In addition to an increase in brands featured, the overall number of products more than doubled over the same time span, from 403 in 2004 to 916 in 2006. This finding is not surprising given the overall increase in spending on in-game advertisements during this period (Video

Game, 2006) and the increasing realisation among companies that video games are a useful method by which their target markets can be reached.

The prominence and volume of products bearing the Oakley brand are two intriguing findings of this study. A possible reason for this finding is that Oakley, which is not as well known as Nike or adidas in terms of its golf apparel line, wanted to utilise the popularity and visibility of the Tiger Woods video game series to introduce its vast product line to golfing fans in the game's demographic. It should be noted that if the Nike and TW Nike brands were combined into one, the overall Nike brand would lead in overall branded products featured.

Nike was the most diversified brand in terms of product grouping appearances, with its logo appearing in 14 of the 15 groupings. Given Nike's recent entrance into the golf equipment industry, and given its existing contract with the golfer (Tiger Woods) whose name is featured on the title of the series, this is not a surprising occurrence. Furthermore, Nike had the greatest number of 'unlocked' products available to users at the start of the game. One could interpret this as indicating Nike's desire to have its products readily available to users from the outset. If Nike has chosen to follow the basic premise of brand exposure mentioned above (Chaudhuri, 2002; Zajonc, 1980), then it makes sense that it would want its products to be given a greater level of exposure.

It is also important to note that while the overall percentage of Nike products to the whole went down over the final three years of the game, the actual number of Nike products from year to year increased. This is not surprising, given the increase in overall brands offered in the game over this time period. The entry of companies with broad product lines, such as Oakley, combined with the addition of 'niche' companies such as Bridgestone, Cobra, Grafalloy and Mizuno, helped to spur the increase in the overall number of products offered. Furthermore, as noted in the conceptual framework of this study, the ability for



a company to have its product(s) portrayed as quality items can lead to increased market value and market share (Chaudhuri, 2002).

The PGA Tour/Tiger Woods series is ideally suited for this task, because all products are portrayed in a positive light. The only noticeable differentiation offered between the products is in appearance, character skill modification and price, and none of these factors is portrayed in a negative manner to the user. Indeed, it appears from empirical observation that practically every company has a 'specialised' product in at least one equipment category, thereby allowing that company to have a core product or products portrayed in the best possible light. Given this, it is not surprising that both the number of products and the number of brands increased with each passing year from 2004.

The results of this study reveal that the PGA Tour/Tiger Woods video game series is increasingly seen as a viable and important marketing avenue by companies whose product line includes golf and golfing accessories. Given the rapidly increasing level of marketing capital spent on in-game advertisements over the last three years (Video Game, 2006), it is obvious that companies with an interest in golf decided to increase their marketing activity in the realm of video games. As Chaudhuri (2002) explained, the success of in-game advertising can deliver an overall enhancement of a brand's reputation in a specific product category, which can lead to a greater increase in sales for the overall brand. A greater level of exposure to the target consumer, in this case the video gamer and the golf enthusiast, can lead to a more positive feeling towards that brand (Chaudhuri, 2002; Zajonc, 1980). To focus marketing resources on the video game market is to focus one's brand image on Generation Y consumers, whose prospects for becoming long-term consumers are very high (Wolburg & Pokrywzyski, 2001).

Conclusions

The results of this study reveal that corporate advertisers do indeed use sports video games as an avenue for branding, and that the degree of product and brand integration in games has increased rapidly over the past three years. Furthermore, the benefits of brand integration in video games appear to have only recently been understood by advertisers. Brand integration in the PGA Tour/Tiger Woods series of games was virtually non-existent from the launch of the series through the first seven years. That number increased in the last three years examined, with the number of products more than doubling by 2006 and the number of brands represented nearly doubling over the same period. This indicates that corporate entities with an interest in marketing golfing products are utilising video games as a new marketing tool, and that they appear to be interested in expanding the degree of integration that their products enjoy.

The increasing levels of brand integration in sports video games have been demonstrated to be quantifiable by the methods utilised in this study. However, an important conceptual element of brand integration is a corresponding increase in brand awareness by the individuals who utilise the medium into which the brands have integrated. As mentioned earlier, the members of Generation Y, towards whom sports video games are marketed, have the potential to become long-term consumers (Wolburg & Pokrywzyski, 2001). An experimental research design could quite easily ascertain the level of increase in brand awareness among such individuals, by comparing the brand integration data derived from a particular game (or games) with the degree to which game users are familiar with the brands and their products before and after use. Such an investigation would have two main conceptual implications. First, it would measure the effectiveness of product placement in video games, a topic important to both practitioners looking to measure their marketing efforts and to scholars seeking to examine the theoretical



implications of an interactive secondary delivery system (i.e. video games). Second, it could indicate whether the brands' inclusion into video games fostered an extension of brand community (Cova & Pace, 2006; McAlexander et al, 2002) for those brands, whether they fostered an extension of brand community for the game itself, or neither. This exploration could contribute to, and potentially expand, the theoretical body of research relating to brand community, by considering the role of interactive media in the brand community process.

This potential extension of brand community theory possesses implications for marketers and other managers, as well. The presence of a particular brand or product within a video game could entice people to purchase the game who would not otherwise be inclined. Alternatively, or additionally, the inclusion of brands and products within video games could bolster brand community for the game itself, with users' loyalty to the game(s) increasing due to a higher perceived level of real-life detail or authenticity. By exploring the effects of product placement in video games, marketers and managers could potentially increase their consumer base, increase their current consumers' loyalty, or both.

The limitations of the study are that its findings can only be applied to one particular video game series, namely the PGA Tour/Tiger Woods series, over one particular timeframe (1997-2006). However, these limitations are minimalised given the fact that the increase in brand representation and product placement observed in the PGA Tour/Tiger Woods series very closely matches the proportional increase in overall money spent on in-game advertising over the same period (Video Game, 2006). Future studies could examine the extent of branding in other series of sports video games, such as the aforementioned Madden NFL series or the FIFA soccer series.

Research should be conducted throughout qualitative techniques to examine branding decisions.

For instance, researchers should interview brand managers and marketing directors of companies that have placed products in sports video games. Furthermore, it might be beneficial for future researchers to compare and contrast the amount of in-game advertising in sports video game titles with in-game advertising from non-sports video game titles, to see if the market for brand development and placement is advancing evenly across the video game spectrum. It would also be beneficial to examine the target markets for a set of companies using in-game branding in sports video games, to see how the demographics of these markets skew towards a particular gender, age or income class.

For many years, video gaming was seen as simply a leisure activity for the young, with relatively primitive graphical interfaces and an unpredictable user base. But as the video gaming world has matured, so too have its technical aspects, which in turn help to introduce that world to a multitude of new users. As research has shown, video gaming now reaches a significant portion of sports consumers, and those consumers are very desirable to companies due to both their age and their consumption habits (Fromme, 2003).

It is of importance to both the business of sports branding and the academic study of sports marketing that this emerging marketplace be identified, observed and analysed, because it represents the opening of a new frontier in the connection between commercial sports enterprise and sports consumers. Specifically, sports consumer products aimed at the key gaming demographics should pay particular attention to this emerging practice of brand development. As a result of this study, brand managers and marketing directors of consumer products should develop marketing strategies that include the sports video gaming experience.



Biographies

Galen Clavio teaches in the Sport Administration programme at the University of Miami (Coral Gables, Florida, US). He received his PhD from Indiana University and has been involved in a variety of presentations, publications and other scholarly activities. He has published articles in the *International Journal of Sport Management*, *Applied Research in Coaching and Athletics Annual* and the *Sport Marketing Association Book of Papers*.

Patrick M. Kraft is a third-year PhD candidate in Sport Marketing and Administration at Indiana University (Bloomington, Indiana, USA). Prior to pursuing his doctorate, Kraft worked in both professional and amateur athletics, with responsibilities including day-to-day event operations and the development and enhancement of local, national and international branding and marketing programmes. He has successfully solicited sponsorships and managed public relations efforts, promotional programmes and fundraising initiatives with companies such as AFLAC, All-State Insurance, Budweiser, Coca-Cola, Goodyear Tire, Speedo and United Airlines, and worked with such media outlets as NBC, ESPN, MTV, Spike TV, HD NET, Fox Sports Net and several local affiliates.

Paul M. Pedersen, an Associate Professor of Sport Communication at Indiana University (Bloomington, Indiana), received his PhD from Florida State University. Pedersen has published three books, including *Strategic Sport Communication* (2007), and more than 40 peer-reviewed articles in national or international academic journals such as the *Journal of Sport Management*, *Sociology of Sport Journal*, *International Review for the Sociology of Sport* and *Journal of Sports Economics*. He is an associate editor, assistant editor and editorial review board member of five national and international sports journals and founding editor of the *International Journal of Sport Communication*.

References

- Aaker, D.A. (1991) *Managing Brand Equity*. New York: Free Press.
- Aaker, D.A. (2004) Leveraging the corporate brand, *California Management Review* 46(3), 6-18.
- Beasley, B. & Standley, T.C. (2002) Shirts vs. skins: clothing as an indicator of gender role stereotyping in video games, *Mass Communication & Society* 5(3), 279-293.
- Beentjes, J.W., Koolstra, C.M., Marseille, N. & Voort, T. (2001) Children's use of different media: for how long and why? In Livingstone, S. & Bovill, M. (eds.), *Children and Their Changing Media Environment: A European Comparative Study* (pp.85-112). Mahwah, NJ: Lawrence Erlbaum.
- Brown, E. (2006) Product placement on the rise in video games; Marketers desperate to engage well-to-do market of 132 million gamers. *Forbes.com*. Retrieved 26 July 2007 from <http://www.msnbc.msn.com/id/13960083/>
- Bush, A., Martin, C. & Bush, V. (2004), Sports celebrity influence on the Behavioral intentions of Generation Y, *Journal of Advertising Research* 44(1), 108-118.
- Calder, B.J. & Malthouse, E.C. (2005) Managing media and advertising change with integrated marketing, *Journal of Advertising Research* 45(4), 356-361.
- Chaudhuri, A. (2002) How brand reputation affects the advertising-brand equity link, *Journal of Advertising Research* 42(3), 33-43.
- Cova, B. & Pace, S. (2006) Brand community of convenience products: New forms of customer empowerment – the case of “my Nutella the community”, *European Journal of Marketing* 40(9/10), 1087-1105.
- Dietz, T.L. (1998) An examination of violence and gender role portrayals in video games: implications for gender socialisation and aggressive behaviour, *Sex Roles* 38, 425-442.
- Ehrenberg, A., Barnard, N., Kennedy, R. & Bloom, H. (2002) Brand advertising as creative publicity, *Journal of Advertising Research* 42(4), 7-18.
- Electronic Arts. (2006) The history of EA sports' Madden. *UnderGroundOnline*. Retrieved 26 July 2007 from: <http://www.ugo.com/channels/games/features/maddennfl%5F2003/>
- Essential Facts about the Computer and Video Game Industry. (2006) Entertainment Software Association. Retrieved 26 July 2007 from: <http://www.theesa.com/archives/files/Essential%20Facts%202006.pdf>



Farrelly, F., Quester, P. & Greysen, S. (2005) Defending the co-branding benefits of sponsorship in B2B partnerships: the case of ambush marketing, *Journal of Advertising Research* 45(3), 31-39.

Fromme, J. (2003) Computer games as a part of children's culture, *Game Studies: The International Journal of Computer Game Research* 3 (1). Retrieved July 26, 2007, from <http://www.gamestudies.org/0301/fromme/>

Keller, K.L. (1993) Conceptualizing, measuring and managing customer-based brand equity, *Journal of Marketing* 57(1), 1-22.

Lefton, T. (2006) The man behind EA's rise, *Street & Smith's Sports Business Journal* 8(1), 38-39.

Lieber, J. (2001) Golf finally reaching out. *USA Today*, 1C, 15 August.

Mehta, N., Rajiv, S. & Srinivasan, K. (2001) Active versus passive loyalty: A structural model of consideration set formation. Retrieved 26 July 2007 from: http://www.bschool.nus.edu.sg/Staff/bizsr/PDF_Files/active%20versus.pdf

McAlexander, J.H., Schouten, J.W. & Koenig, H.F. (2002) Building brand community, *Journal of Marketing* 66(1), 38-54.

Nelson, M.R. (2002) Recall of brand placements in computer/video games, *Journal of Advertising Research* 42(2), 80-92.

Potter, W.J. & Levine-Donnerstein, D. (1999) Rethinking validity and reliability in content analysis, *Journal of Applied Communication Research* 27, 258-284.

Riffe, D., Lacy, S. & Fico, F.G. (2005) *Analyzing Media Messages: Using Quantitative Content Analysis in Research* (2nd edn). Mahwah, NJ: Lawrence Erlbaum.

Romaniuk, J. & Sharp, B. (2003) Brand salience and customer defection/subscription markets, *Journal of Marketing Management* 19(1-2), 25-44.

Tochen, D. (2006) Spot on: in-game advertising poised to pop. *Gamespot News*. Retrieved 26 July 2007 from: <http://www.gamespot.com/news/6152597.html>

Tsuruoka, D. (2006) Advertisers taking on video games; Players don't mind the ads; The commercial spots can actually help games feel more realistic, experts say. *Investor's Business Daily*, A4, 16 June.

Vandewater, E.A., Shim, M. & Caplovitz, A.G. (2004) Linking obesity and activity level with children's television and video game use, *Journal of Adolescence* 27, 71-85.

Video game, mobile advertising (2006), *Street and Smith's SportsBusiness Journal* 9(6), 23.

Wolburg, J.M. & Pokrywczynski, J. (2001) A psychographic analysis of Generation Y, *Journal of Advertising Research* 41(5), 33-53.

Zajonc, R.B. (1980) Feeling and thinking: preferences need no inferences, *American Psychologist* 35, 151-75.

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