A Piece of the Action: Women's Quest to Become a Part of the Video Game industry

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ABSTRACT

This project looks at the reasons why the video game industry continues to all but ignore half of its potential market, and almost half of its current market; women. The reasons for this start at the development and marketing of video games and can be traced all the way back to computer education that starts as early as elementary school. The main focus of this project is the affect that marketing has in this channel in two places. The first is through the advertising and promotion of the games themselves and the second is through the advertising and promotion for education and careers in the industry. Through the use of books, articles, advertisements, scholarly and professional studies, and other research, this project identifies each stage that contributes to a final outcome, as well as identifying and discussing the impact that marketing has using focus group data. This final outcome is that women are not only left out of being consumers in the video game industry, but are left out of being employed in the video game industry, as well.

INTRODUCTION

When the first commercially successful home entertainment product was launched it was marketed as "fun for the whole family" and ads featured families playing and enjoying games such as pong, and later on games like Pac-Man and Centipede. The first holiday season that these games were introduced they were a huge hit and were "*the* gift to have under the tree" (Ray). However, by the early 1990's, marketers and game makers changed their focus from families to males ages 13-25. This narrowly defined market has been the norm until recently, when demand mixed with increased competition for this segment forced some game makers to look at other markets. Despite being left out of the minds of game makers and marketers, many girls and women have fallen in love with gaming, myself included. However, the growing numbers of female gamers, and the intense competition in the gaming market, have still not been enough for some game companies to realize the importance of expanding their target market. It has come to the point now that the issue goes much deeper than women being left of the gaming as consumers. In some cases women are not just being ignored, they are being objectified, belittled, and even assaulted in video games and in advertisements for video games. The problem goes deeper than just the video game industry; women are being left out of jobs and careers not only in the gaming industry, but also in many other technological industries.

EARLY SOCIALIZATION

Male and female attitudes towards computers and technology begin to form as early as elementary school. Boys are often given machine-type toys, including computers, which they are encouraged to experiment with. Girls, if they are given anything computer related, are usually given productivity type software such as a typing program (Ray, 3). Having computers in schools or in a classroom does not always mean that girls have an equal opportunity to access them. An observational study showed that "when the number of machines is not equal to the number of students, boys will dominate them by physically 'crowding out' the girls (Ray, 4)." Limited access coupled with traditional gender role discrimination helps to shape women's attitudes towards computers, and computer related activities and careers later in life. The impact that gender has on computer interest and access limits opportunities for women to obtain high paying jobs in this growing industry. This problem also affects other industries and careers "as technological literacy increasingly becomes a general precondition for employment (Cassell, 11)."

One interesting example of distinct gender discrimination that leads to the different attitudes young girls have towards technology has to do with how Mattel packaged children's computers during one holiday season. There were two different models, one was pink with flowers and the other was blue with flames, each clearly geared specifically to each gender. However, there was more than just a color difference between the two models. The blue

boy's computer came packaged with four programs geared for math and logic while the pink girl's version did not (Wilkins, 4). This is a perfect example of not only the stereotype that companies have towards girls, boys and computers, but it also illustrates another important point as well. It shows how easy it is for girls to get forgotten and left behind when computer use and math education are involved.

Computer and video games can facilitate and strengthen computer literacy. However, even kindergarten children view video games as toys for boys. This perception helps lead to the fact that, for upper elementary school students, the ratio of heavy users of computers for boys and girls is four to one. In high school, boys are three times as likely to use a computer at home, participate in computer-related clubs or activities at school, or attend a computer camp (Cassell, 12). This helps to explain why the percentage of women that were AP Computer Science test-takers in 1999 was only 17% for Computer Science A and 9% for Computer Science AB (see figure 1).
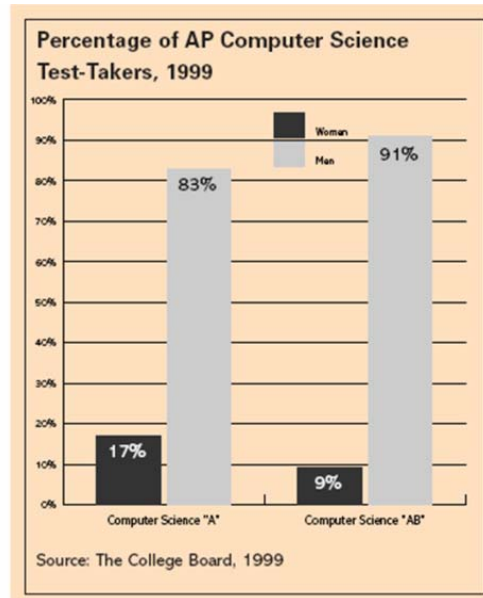

Figure 1. Percentage of AP Computer Science Test-Takes in 1999

COMPUTER SCIENCE EDUCATION

Women's lack of interest in computers in high school effects their interest in it as a major in college and as a career. According to the U.S Department of Education in 2002-03, only 27% of bachelor's degrees in computer and information sciences were awarded to women. This number drops lower to 21% for doctorate degrees with only 168 degrees awarded to women in 2002-03 in the entire U.S. (see table 1).

Table 1. Bachelor's, master's, and doctor's degrees conferred by degree-granting institutions, by sex of student and field of study: 2002-03

Field of Study	Bachelor's degrees requiring 4 or 5 years			Master's degrees			Doctor's degrees (Ph.D., Ed.D., etc.)		
	Total	Males	Females	Total	Males	Females	Total	Males	Females
Computer/information sciences, all	57,439	41,950	15,489	19,503	13,265	6,238	816	648	168
Computer/information sciences, general	24,020	18,117	5,903	9,190	6,456	2,734	515	417	98
Computer programming, general	733	540	193	154	106	48	3	2	1
Computer programming, specific	319	216	103	86	50	36	0	0	0
Computer systems analysis/analyst	821	570	251	211	157	54	0	0	0
Computer science	11,449	9,022	2,427	3,715	2,607	1,108	195	167	28
Web page, digital/multimedia design	171	101	70	40	24	16	0	0	0
Computer graphics	570	432	138	121	76	45	0	0	0

SOURCE: U.S. Department of Education, National Center for Education Statistics, 2002-03
Integrated Postsecondary Education Data System, Fall 2003. (This table was prepared January 2005.)

Catherine J. Weinberger, a scholar affiliated with the University of California-Santa Barbara, conducted a study to attempt to isolate the reasons that women do not pursue majors related to computer and information technology. In this study she found that over one-third of the women surveyed indicated that they would not choose a computer related major "because I wouldn't expect the classroom atmosphere to be welcoming to me as a woman" (Weinberger, 32). An important point to note is that this answer did not show up for any of the other majors being questioned.

Another study, conducted by Douglas H. Wilkins as a part of an Information Technology Project in Massachusetts, tried to figure out and understand that reasons that women avoided the field of computer programming. Interestingly, there is one factor that, while it is a problem in many industries, is not a problem in the computer science industry. In many industries the salary levels for men and women is still unequal, but in computer science fields it is nearly equal. This is also a field that has a much higher starting salary when compared to other fields right out of college. Another positive aspect of this industry is that graduates with computer-related degrees are some of the most likely graduates to be hired right after college. So clearly the lack of a well paying job right out of college is not the reason that women are staying out of this industry.

Focus groups in this study strove to identify some of the key reasons for women not pursuing computer related careers. The key findings of the focus groups centered on the fact that women were simply not interested in computer related careers. The focus group participants felt that women were very capable of entering this field; it was simply a matter of personal preference. Participants cited reasons such as wanting to work with people and not wanting to sit in front of a computer all day as why they avoided the field. Another reason was that they had very little interest in math and had bad experiences with boring math classes all through out their schooling. Many felt that certain math teachers had a negative effect on their liking of math, and many also felt that the problems used in math were not practical and did not relate to real world problems that they could get interested in (Wilkins, 54).

Another finding of the focus groups was that many women were unsure what computer programming exactly was and what was involved in a computer programming career. One woman said "I couldn't even define computer programming." Another women added "don't you just have to sit there in front of the computer and type a bunch of stuff, for hours." These comments reveal a lack of knowledge about computer careers and a negative perception of what they do know (Wilkins, 52). It makes sense that people who do not know what a career or major entails, and do not know what they would do for job, would avoid that career or major. The negative perception of what little knowledge they have about computer programming prevents them from wanting to learn more or explore what a job in that industry would be about.

Game Programmer Advertisements

With such a small percentage of women graduating with degrees in computer science, it is no surprise that the percentage of female game programmers is also small. However, there are other factors that contribute to the lack of female game programmers and game designers other than there being a small pool of them to choose from. Advertisements for game design programs and careers can usually be found in gaming magazines which, as discussed later, specifically target men. The ads themselves also specifically target men, and sometimes go as far as

to outright exclude or objectify them. This leaves women feeling like the job is not for them, if they are even aware of the job or the ad to begin with. Television ads can also be found for game design programs and careers, but these ads are limited to G4, a gaming network that targets men, and Spike TV, which openly states that it is a network for men. The lack of knowledge available to women about careers and opportunities in gaming hinders and prevents the small portion of qualified women from getting jobs in this industry.

Focus Group Findings

Since there was little to no information about the effect and perception of advertisements specifically for video games and jobs in the industry, I put together focus groups to attempt to gather more information about the impact and perception of ads in this industry. I conducted two different focus groups, each with an equal number of male and female participants. I showed them a series of magazine and television ads that had to do with specific video games, video game hardware, and jobs in the video game industry. I asked both groups questions pertaining to the prospective target, effectiveness, and offensiveness of each ad.

One ad I showed was from a magazine and was for a job as a game programmer. The ad featured an anime style woman from the Final Fantasy game series. Many respondents initially commented on how her large breasts were a focus of the ad. The caption on the side said "You want a piece of me program boy?" While the word "boy" clearly indicates who this ad is trying to reach, respondents felt that even if that word were taken out or changed this ad would still be targeting males because of the appearance and sexuality of the anime women. When asked if the ad would be more effective if it was changed to target a wider demographic, a male respondent answered "I think it would be more effective if it wasn't discriminating against women" and went on to say that with this ad "you're eliminating them (women) from the resume pool". I then asked the women if they would apply for this job and they all said no or shook their head. Then one woman said "well, maybe, because you wouldn't have any female competition, you'd stand out." When I asked the women in the group if they would feel comfortable applying for this job one respondent said "probably not, you get a feeling that they want more of the masculine side…they don't really want women applying".

Another ad was for a piece of game play enhancing hardware, the ad featured Lara Croft in a bikini and the caption said "Faster! Faster! Faster!" There was a small bit of copy at the bottom of the ad in a small font that told a little bit about the product. A male respondent said that the ad would catch his eye, but his first question would be "what is this for?" All respondents agreed that they would want to learn more about the product and that the ad would be more effective if it had more information. No one really understood what the product was or what exactly it did. A female respondent then asked "why is she there?" and another female respondent added "It just doesn't make sense, it's not necessary." So while Lara Croft caught the reader's eye, it did not fit with the product and it was not effective in selling the product. In some respondent's opinions the presence of Lara Croft was confusing, and thought she detracted from the product and made the ad less effective. All respondents agreed that the ad would be more effective if it focused more on the product and gave more information about what the product was and what it could do.

THE VIDEO GAME INDUSTRY

Dr. Kathryn Wright, a psychologist who writes for womengamers.com, makes several important points about not only the video game industry, but the technology industry as well. In an article titled *Search for the Techie Woman* she talks about how society as a whole is affected by the lack of women in math and science careers. She says the lack of women in technology industries affects the type of products that are released and how they are designed. She points out that "Males create male-centered products, often without realizing it." This creates a cycle where "women do not see their needs and interests reflected in technological products," this leads to women not buying or becoming involved with technological products which leads to a lack of interest and ability with these products which leads back to them not pursuing technological oriented careers (Wright).

GENDER
OF GAME PLAYERS

55.0% male
43.0% female

Source: Peter D. Hart Research Associates

Figure 2. Gender of Game Players

In another article, titled *The Gaming Industry & the Female Market*, Wright discusses how females continue to be ignored as customers and as potential customers despite the growing number of female gamers. As shown in figure 2, women now make up 43% of all gamers, this includes both console and pc gamers (ESA). A vast majority of games are featured around violence or sports, activities which are normally associated with male interests. Also, main characters and playable characters in games are overwhelmingly male. While some games are starting to feature female characters, they are generally passive and only serve to motivate game play. Female characters in games, whether passive or playable, are usually highly stereotyped and sexualized (Wright). Rather than creating female characters for female enjoyment, game developers are creating female characters to increase male enjoyment.

While there have been gender-neutral games that have attracted female gamers such as Myst, Tetris, and Sonic the Hedgehog, these games were not created or marketed with women in mind. Some argue that if so many women are already playing games, then a lack of games made and marketed with them in mind is not necessary. However, in many cases women have learned to tolerate or attempt to avoid the many sexist images and limited selection of games that they are interested in because they love gaming (Wright). This shows that if game developers were to reach out to women gamers, or at the very least stop excluding them, they would find that the current pool of women gamers would be more interested and spend more time and money on gaming. Another benefit would be to attract women who do not currently play games either. Many women have not been exposed to much information on gaming or they are not willing to seek out games they enjoy by sifting through sexist and male-oriented content. Either way, female gamers are still a mostly untapped market.

Gaming Magazines and Advertisements

While some argue that games need to be redesigned with women in mind in order to attract women gamers, others feel that that is not necessary. Besides the argument of games excluding women by their sheer male-oriented design, there is also criticism targeting gaming advertisements and magazines. Suzanne Freyjadis-Chuberka stated that "more women could be playing the games as they exist now. The industry could grow even with the current games library that we have, if the games were presented in a way that doesn't just appeal to this one sector of the population (Campbell)." She goes on to criticize gaming magazines specifically because they only target 18-34 males as opposed to targeting gamers in general (Campbell). Mediamark Reporter data from fall of 2005, as shown in table 2, supports this claim by showing the readership for three of the most popular gaming magazines. Electronic Gaming monthly has only 17% female readership, PC Gamer does not have much more with 19% female readership, and Game Informer has the highest percentage with 28% female readership (MRI). None of these numbers even come close to matching the gender breakdown of gamers which is now 43% female (ESA).

Table 2. Game Magazine Readership by Gender

Magazine	Total Adults	Men	Women	% Women
Electronic Gaming Monthly	3,166,000	2,631,000	535,000	17%
Game Informer	4,027,000	2,892,000	1,135,000	28%
PC Gamer	2,782,000	2,256,000	526,000	19%

Gaming magazine editors responded to the statements made by Freyjadis-Chuberka by shifting the blame back onto game developers. Chris Slate of PSM magazine stated that "The real issue is that game publishers still haven't learned how to consistently appeal to the fairer sex." Andy McNamara from Game Informer magazine said "I think that if developers and publishers make good games, and we make good content, the players and readers will come regardless of sex." Francesca Reyes from Xbox magazine asked 'the real question' of "Why aren't more women applying for positions in the games industry?"(Svensson)

Advertising and promotions for games is another place in the chain where marketing has a big impact on the industry. Lee McEnany Caraher, president of corporate and consumer communications for Sega, spoke about Sega's advertising for their games in an interview in 1997. She stated that "about 33% of our market is girls. And we don't even try to get girls. We don't do any girl marketing right now." (Cassell, 194). When asked why they did not market to girls she responded with "It's expensive." She went on to say, after being asked if the expense would be worth it that it would not "because girls are always second" (Cassell, 197). Besides enraging many members of the female gaming community, this also reveals several things about the gaming industry beyond what type of attitude large gaming companies have towards advertising for girls and women.

Each part of the game development chain refuses to believe that they are the ones freezing women out of the gaming industry, when in reality it is the combination of every part of the chain freezing out women. One part of the industry cannot change without other parts changing as well, however, the chain needs to be broken somewhere and it appears that change is coming about slowly as game development companies are creating a wider selection of titles and all parts of the industry are realizing that in order to grow, they must expand their currently narrow demographic.

Focus Group Findings

One of the first ads I showed, that was specific to video games, featured a sexual looking woman on a motorcycle with the caption "Real Man Stuff". When asked if the ad was effective and if they would purchase the game one male respondent said "I don't usually play racing games…if I saw an ad like this I would probably just pass it up" Another male respondent said "It's designed for real big tough guy egos…I wouldn't personally buy the game". The female respondents commented on how the woman was there for guys to look at and that the motorcycle she was on "probably isn't hers".

One television ad featured two men controlling a woman's body and clothing with a game controller. By the end of the ad she had larger breasts and was almost completely naked. I asked if this ad could be found offensive by anyone and the group laughed and unanimously responded with "yes". I asked how or why it could be found offensive and one male respondent said "It was offensive on many levels" while another respondent went into more detail saying that "they are essentially sexually assaulting the women". When asked if this ad would stop people from purchasing the game a male respondent said "If a women gamer saw the ad I don't think they would go out and buy it… it's portraying women as an object". Next, I asked the group that if it was up to them if to run this ad or not, knowing that it would greatly offend women, but that it would be effective to male gamers, if they would choose to run it. One male respondent answered first with "I would run the ad" and the other males chimed in with "me too". I looked towards the women and one said defiantly, "I would not run the ad" with all the other women responding with agreement and nods. The males are not the ones being objectified or offended in the ad so they are quicker to agree to run it because they know it would be effective and it does not harm them. The women on the other hand are offended by the ad and do not think that it being effective is a good enough trade off for the negative treatment and portrayal of women in the ad. This is an example that shows how the lack of women in the industry affects the number of ads that not only exclude women, but blatantly offend and degrade them.

After showing all the ads I asked which ad was the group's favorite. A majority of guys and girls picked the ad that featured competition between two couples playing Xbox live. When I asked which ad was most effective to the market it was trying to reach, many respondents choose that same ad with one respondent adding "I like how it

showed a girl and a guy playing". Whenever the question about ad effectiveness came up for each ad shown the most influential factor that determined whether or not the ad was effective was the amount and quality of game play shown, and the amount of information about the product. An ad for a new Tomb Raider game was rated as highly effective by one respondent because it was "showing the game play, showing the graphics, and it had great reviews." The ad that showed a mostly naked woman was only rated as being effective because it incorporated game play and features mixed in with the shots of the women.

Near the end of each focus group I asked what percentage of gamers they thought were female. I got answers that ranged from 10-40% with 20% being the most agreed upon answer. When I told the groups that 43% of gamers were women many were surprised. I then asked what went into creating their perception of how many women played games. Most respondents said that it was a mix of real life experience and what they saw on television and in ads. One girl said "out of the girls I hang out with I'm the only girl that plays". As the discussion continued a male respondent said, referring to people who play games, "I think it's more the personality of a person rather than if they are a female or a male". My last question asked "If games were advertised and targeted towards women would more women would play?" A female respondent said "if I had more access to games I think I would play them more" while another female respondent said, referring to people who currently play games "Women that game have had to go in search of it, guys don't have to go in search of it, it's right there."

CONCLUSION

Women are attracted to games despite the fact that they are made and marketed for men. A small percentage of women read gamer magazines despite their male oriented content. If women want to play games and read about games so badly that they are willing to sift through ads, magazines, and game content all aimed at males, then clearly there is a women gamer market even larger than what already exists. With the current success of the video game industry, some ask why it is so important for this industry to include women. Other than the benefits that women would receive such as equal educational, career, and recreational opportunities, there is the opportunity for men to enjoy a broader range of games and new competition, and the opportunity for the industry to benefit as a whole. The gaming industry is growing very quickly, while the game market is not. Figure 3 shows how industry sales growth has tapered off and even experienced negative growth in 2000. As Sheri Graner Ray points out in her book, "There are only so many males of this demographic age group in the world at any one time…without new markets to expand into and new audiences to tap, the game industry will eventually cut off its own growth paths" (Ray, 148).
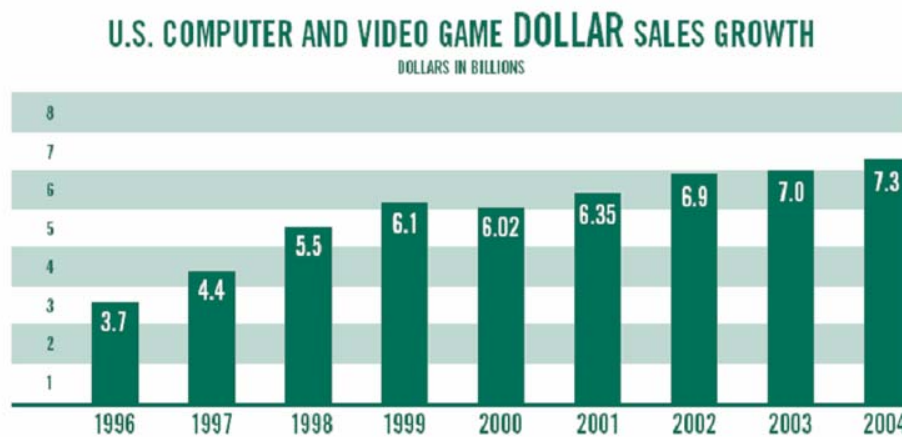

Figure 3. Video game dollar sales growth from 1996-2004

There are two different paths that can be taken to reach the female market. The first path is to keep the existing pool of games and simply market and promote them to women. If women can more easily learn about new games and have access to more information about gaming then it will be easier for them to try it. By marketing to women it will make them feel like gaming can be for them as much as it is for men, which was a common perception my focus groups. The other path to take is to create and develop new games and new types of games with women in mind. Changing game content to learning and playing styles that females prefer would draw more women into gaming who find many current games to be boring or not in line with their interests. There are already some companies taking steps down both paths and the results have been positive.

In the end, the gaming market as a whole could benefit from both approaches. Games that are promoted to a wider variety of people have a better chance of getting a wider audience. Also, the gaming industry could use new ideas and fresh storylines for games. Males and females would both benefit from a wider variety of games to play. Personally, I feel that it is not so much a difference between male and female gamers, but a difference in genre and game type. Many women enjoy fighting and sports games and many men enjoy puzzle and social games. The industry should focus less attention on gender and more attention on making good games that everybody can enjoy. Game developers and marketing campaigns should seek to attract a genre of gamer rather than a gender of a gamer.

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