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The Current Role Of Color Psychology In The Practice Of Gender Marketing

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The Current Role Of Color Psychology In The Practice Of Gender Marketing

A Thesis Submitted to

the Faculty of the University of North Georgia

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With Honors

Michelle Vatral

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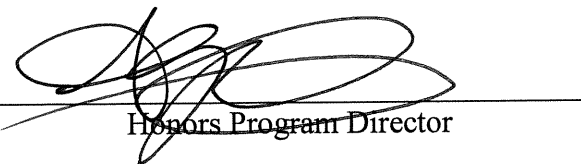
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Honors Program Graduate

Thesis Committee:

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Thesis Chair

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Abstract

Due to the changing worldview of gender as a fluid concept versus its previous role as a rigid aspect of human identity, marketing researchers and consumer behaviorists need to conduct current studies on color psychology as a means of communication to the changing gender spectrum. Because of the lack of updated research on this topic, marketing strategies and advertisements can often seem out of touch with its younger, socially conscious audience. This study aims to fill this gap in research by exploring college students' color preferences in a digital marketing scenario. Through the methods of survey and analysis, the study's objective will be to apprehend the correlation between a person's identifying gender and their color choice.

Introduction

Prior to the late nineteenth century, society's understandings of masculinity and femininity were clearly defined for an individual at birth. Because of this differentiation, the roles of each gender were also distinctly marked. Now, due to global early and ongoing movements for gender equality such as feminism, women's suffrage, and countless other contributing factors, the persistence of strict gender roles are on the decline. Due to the nature of gender as a part of human identity, this changing social norm affects everyone and everything, business and industry included. To remain successful and relevant to their socially adept younger audience, companies are now generating products and utilizing tactics that reflect the new worldview of gender as a fluid concept. However, not all businesses have adapted to the trend. Marketing, a field historically notorious for its polarized representations of men and women, has and will continue to feel the brunt of this change more than most.

Though the past 20 years have seen an increase in research on gender marketing and consumer behavior, color psychology is one area that's role has been left out of the equation. Like gender, color is another facet of life that affects everything. It determines perception and thus holds influence in every decision we make, especially our economic ones. Because the studied relationship between color and gender has seen a wide range of ambiguous results over the previous century, a current snapshot of the correlation between these two is necessary and pertinent to marketing professionals seeking to successfully maneuver the current social trend of gender nonconformity amongst their younger target demographics. This study aims to fill this gap in research by exploring the color preferences of college students in a digital marketing scenario.

Background

Gender

Gender nonconformity can be defined as, "the degree to which an individual's appearance, behavior, interests, and subjective self-concept deviate from conventional norms for masculinity/femininity" (Diamond 2015). Though gender nonconformity is not a concept new to the 21ˢᵗ century, it is a term that is constantly being redefined and reapplied to changing social constructs. The origination of this idea began with Simone de Beauvoir, a French feminist writer popular in the 1940s who held that biological sex and gender were separate distinctions that could not be used to determine destiny (Yenor 2017). In this belief, the term "sex" refers to a person's biological characteristics that determine whether they are male or female, such as their genitalia, hormonal profiles, or genetic design. By contrast, the term "gender" refers to social and cultural definitions of femininity and masculinity rather than anatomical ones ("Webmed" 2016). Though this differentiation has recently become more widely accepted, these terms are still used interchangeably by some. The desire to divide sex and gender began with feminists like Beauvoir who denied that a woman's place in the world should be designated by her biology. However, the deconstruction of the binary gender system eventually expanded into the realm of transgender issues in the 1990s (Yenor 2017). Since then, gender-equality has become a highly politicized topic in mainstream media. Same-sex marriage, gender-neutral restrooms, gendered pronouns, adoption rights, and healthcare are just a few of the many headlines that have sparked global debate in the last ten years.

Marketing

In terms of social and political change, the evolution of gender issues can be seen as a linear progression. Contrastingly, the advancement of gender nonconformity in the form of

marketing is much more irregular. This can be seen by many studies but is most apparent in the

change of marketing to children overtime. A 2014 analysis that looked at Sears catalogs from the

early 20th century to present-day found this to be true. From the 1920s to the 1960s, toy

advertisements along with the products themselves were focused heavily on gender stereotypes

(Sweet 2014). Dr. Elizabeth Sweet provides the example of a 1925 Sears ad for a toy broom-and-

mop set that's text reads: "*Mothers! Here is a real practical toy for little girls. Every little girl*

likes to play house, to sweep, and to do mother's work for her" (2014). An equivalent example

for boys is another 1925 Sears ad that states, "*Every boy likes to tinker around and try to build*

things. With an Erector Set he can satisfy this inclination and gain mental development without

apparent effort. He will learn the fundamentals of engineering" (Sweet 2014). In these cases, the

marketing tactics match the gender norms of the times: women take care of the home while men

work in the industry. However, the 1970s saw a remarkable turn in gender marketing. Due to a

number of contributing factors like demographic shifts, second-wave feminism, and the

exponential increase of women in the labor force, segmenting the market based on children's

gender became an unpopular strategy (Sweet 2014). Sweet writes, "In the Sears catalog ads from

1975, less than 2% of toys were explicitly marketed to either boys or girls" (2014). Even more,

the 70s were marked by toy ads that went further by challenging gender norms with their

depictions of boys in domestic roles and girls dressed as scientists or builders (Sweet 2014).

However, this progression was lost in post-feminist 1984, when laws allowing toy companies to

run program-length commercials for their products were instated and, once again, gender became

a useful tool in differentiating TV shows and their corresponding advertisements (Sweet 2014).

By 1995, neutral ads were replaced by highly gendered toy ads that made up about half of the

Sears catalog, the same fraction as during the 20s-60s. This statistic reigns true to present-day,

however, the biggest difference between now and the 20s-60s period of marketing is its subtle

nature. Sweet writes, "late-century marketing relied less on explicit sexism and more on implicit

gender cues, such as color, and new fantasy-based gender roles like the beautiful princess or the

muscle-bound action hero" (2014).

All of this is to say that current gendered marketing tactics are simply outdated. A 2012

study of toys for sale on the Disney website found that even though a handful of toys were on

both lists "for boys" and "for girls," the website still explicitly marketed them according to

gender (Auster, Mansbach 2012). The researchers suggest that toy companies have the

capability to market toys in a more gender-neutral way but simply choose not to (Auster,

Mansbach 2012). In the Cassandra Gender Report, a survey given to 14 to 34-year-olds found

that 60% agree with the statement: "the lines of gender have been blurred and men and women

no longer need to conform to traditional roles and behaviors" (Follows 2017). Another 2018

study on gender representation in English-language fiction found that, "gender divisions between

characters have become less sharply marked over the last 70 years" (Reichley 2018). These

reports prove that recent times have been characterized by an evolving social consciousness

towards gender equality. Therefore, in the same way marketers adapted to the 70s period of

gender nonconformity, companies should reflect the worldview by choosing to use

advertisements that market towards need, personality traits, interests, and skills, not gender.

A good example of this common sense marketing can be seen in the food industry. Food

companies have recently had to adapt to environmentalist and sustainability trends by providing

organic food options and engaging in Corporate Social Responsibility. Why can't marketers who

deal with gender as an audience practice the same relevant tactics?

Color

One intersection of gender marketing research is color psychology. Color is a powerful, omnipresent source of information. This is because color is a huge part of the visual sense, which makes up about 80% of the information we consume daily (Khouw 2002). To understand color psychology, one must first understand what color is and how it works. Essentially, color is light. Light is carried on wavelengths through the atmosphere that are then absorbed by cones and rods in the eyes and converted into an image by the brain (Singh 2006). For marketers, color is a strategic and heavily researched subject that is taken into account in every step of the product development and advertising process. To communicate specific messages, marketing professionals engage in consumer behavior analysis to understand which colors fit their idea best. This can be difficult specifically because the way in which one person experiences color may be completely different from another person's perception. There are a lot of different reasons for this, both biological and cultural. For one, it has been found that individuals have different numbers and different kinds of color-sensitive cones in their eyes. While most people are "trichromats," meaning they have 3 types of cone cells in their eyes, each including around 100 distinctive shades, making their total color count to be about 1 million, neuroscientists in the UK believe they have found a woman who is a "tetrachromat," indicating she has an extra cone cell that allows her to see 99 million more colors than the average person (Macdonald 2016). Researchers speculate this woman is only one of a number of people in the world with super-vision; these tetrachromats just don't know it yet. Amongst the spectrum of color-seers are also "dichromats," people that are considered colorblind. Like dogs, monkeys, and most mammals, dichromats only have 2 functioning types of cone cells. This means they can only see about 10,000 shades of a color (Macdonald 2016).

It is almost impossible to know exactly how another person understands color, especially with biological differences such as eyes themselves. This scientific conundrum has sprouted many theories and studies. Previously, scientists thought that, "our brains had a default way of processing the light that hits cells in our eyes" and that "our perceptions of the light's color are tied to universal emotional responses" (Wolchover 2012). This essentially means that people with "normal" vision see all the same colors, an unalterable characteristic from birth. However, in a recent study where red color-blind monkeys were injected with DNA that made the green-sensitive cone cells in their eyes become red-sensitive, the researchers found that neurons can adapt to new signals, enabling the monkeys to see different colors through gene therapy (Wolchover 2012). The implication of this study is twofold. For one, it indicates that the human brain isn't designed to react to color in a routine way. Instead, people develop their own unique impression of color. This could mean that one person's blue is not another person's blue, and could even be another person's red. The other consequence of this study is the development of gene therapy in the curing of color blindness. About 19 million Americans suffer from some form of color-blindness, making color perception even more varied and difficult to test for market researchers (Singh 2006).

Another big part of color perception is culture. Culture is a vague term that encompasses a number of different behaviors and social norms for a particular community. From religion, art, customs, traditions, and language, to government systems and economic structures, the presence of color and its significance to each part of a society can be seen in almost everything. Just a few examples include the Celt's ceremonial use of green in weddings, the Inuit community's language that includes 17 different words for the color white, and the combination of red and white for representing the Sacred Heart of the Catholic Church in Mexico (Singh 2006). Due to

the varying symbolism of each color in each culture, global communication through color can be tricky. A good example of a cross-cultural color disconnect is orange. Orange is an extremely sacred color to the Hindu religion in India, while its existence is not even recognized by the Ndembo tribe in Zambia (Singh 2006). Is the entire Ndembo tribe comprised of dichromats? The answer is no. The difference in color perception here is due to nature and language. Recent evidence shows that ancient humans probably didn't see the color blue simply because they did not have a word for it in their language (Macdonald 2018). Scholars like William Gladstone and Lazarus Geiger analyzed ancient texts from around the world and found no mention of the word blue (Macdonald 2018). They hypothesized that pure blue isn't very common in nature and is more often a reflection of other colors; therefore, ancient societies had no need to recognize it. To test this, a study conducted in 2006 found that the members of the Himba tribe from Namibia, another community with no translation for the word blue, could not point out the obvious blue square in a circle of 11 green squares and 1 blue (Macdonald 2018). Interestingly enough, in the same study reversed, English speakers were shown 11 green squares and could not differentiate the green square of a different shade. This was an easy task for the Himba tribe (Macdonald 2006). The study indicated a strong connection between color and language, an ancient connection that continues to affect cross-cultural relations in present day.

While some colors vary culture to culture, there are a few colors that market researchers believe communicate a universal meaning. Reds and yellows are used by fast food chains to "stimulate appetite because of [their] affect on metabolism" while blues are employed by more formal restaurants "to calm and relax their customers" (Singh 2006). Similarly, greens are typically used by products that wish to communicate being earth-friendly and natural.

There have been a plethora of studies and experiments done on the relationship between gender and color in the past century, however, the results are varied enough to make the findings inconclusive. In her overview of this research, Khouw details an early study in 1897 that found "men preferred blue to red and women, red to blue" (Jastrow 1897). One 1926 study found that, "yellow had a higher affective value for men than for women" (Dorcus 1926). Another 1938 study maintained that, "blue for men stands out far more than for women" (St. George 1938). A 1940s experiment discovered only one gender difference in their results with, "yellow being preferred to orange by women, and orange to yellow by men" (Eysenck 1941). Though one could gather from these studies that there simply is a difference between the color preferences of men and women, the color findings themselves are ambiguous. There has been no widely accepted evidence of one color correlating with one gender. Even more, the studies are outdated and thus not helpful to current marketing professionals, a field dedicated to keeping up with trends.

The uncertain findings of early color studies seem to extend into the 21st century as well. A 2002 color study by Khouw found that, "men were more tolerant of gray, white, and black than women" and that, "women reacted to the combinations of red and blue more frequently" (Khouw 2002). In a more recent 2011 experiment that altered the hue of a set of fictitious logos, the researchers discovered that, "multivariate tests show significant differences for familiarity and likability, though we find no multivariate differences for gender or most/least liked colors" (Labrecque et. al., 2011). Both of these studies took into account factors like saturation, shape, size, and lighting, which is an important and influential set of characteristics that were excluded from previous studies. They also each have larger sample sizes than the previous research, which almost always increases the success of an experiment. Both studies agree that further research on

the emphasis of color psychology in its determination of personality as an audience would benefit the marketing field in general.

Method

A random sampling of 50 students at the University of North Georgia was surveyed in an attempt to assess the young adult generation's cognitive response to different colors. To ensure the fairness of data, 25 men and 25 women were assessed. A local website frequented by students attending the Dahlonega campus was chosen and replicated in different color formats to create a realistic scenario. The website chosen was *Dahlonegarents.com*, a popular rental properties business for students living in the area. Six altered websites in 6 different color schemes were created in Adobe Illustrator and then shown to participants, 2 that have previously been accepted as "gender neutral" colors (orange and green), 2 that have been considered "feminine" colors (pink and purple), and 2 "masculine" colors (blue and gray). The colors were chosen according to previous research and socially accepted gender-color norms true to present day America. The options were differentiated by letter choices (A, B, C, D, E, F) and shown in equal sizes to students who were then asked to pick a favorite, followed by a question asking which gender they most closely identify with. **Hypothesis:** There will be a slight correlation between color and gender in this scenario.
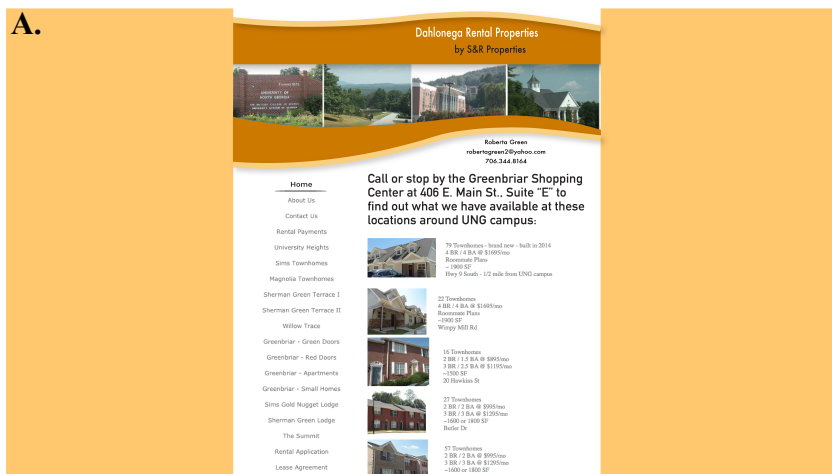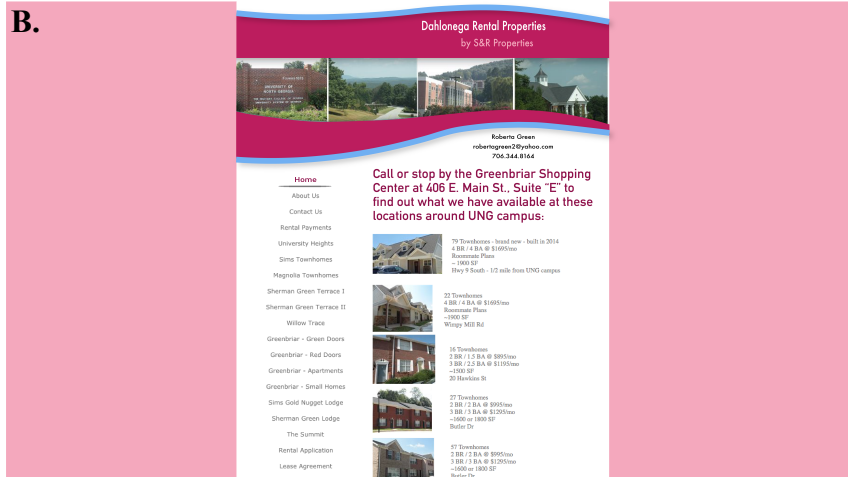
Websites shown

A.
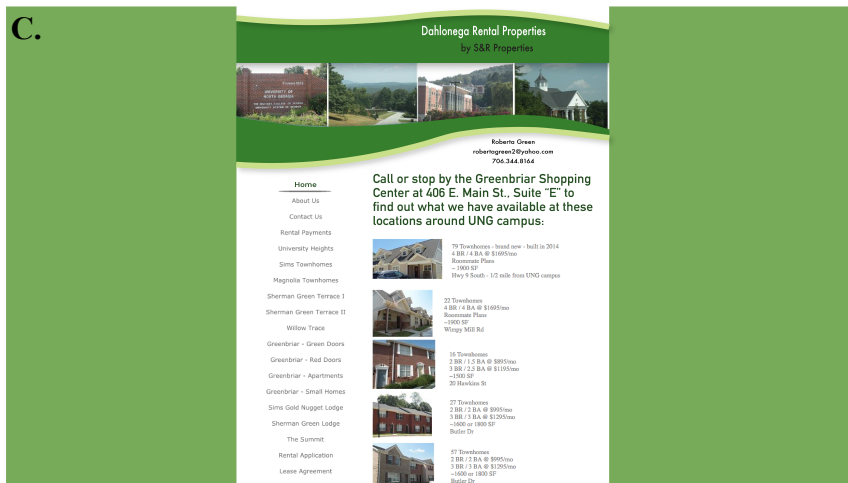

Figure 1. Website "A"

Figure 2. Website "B"
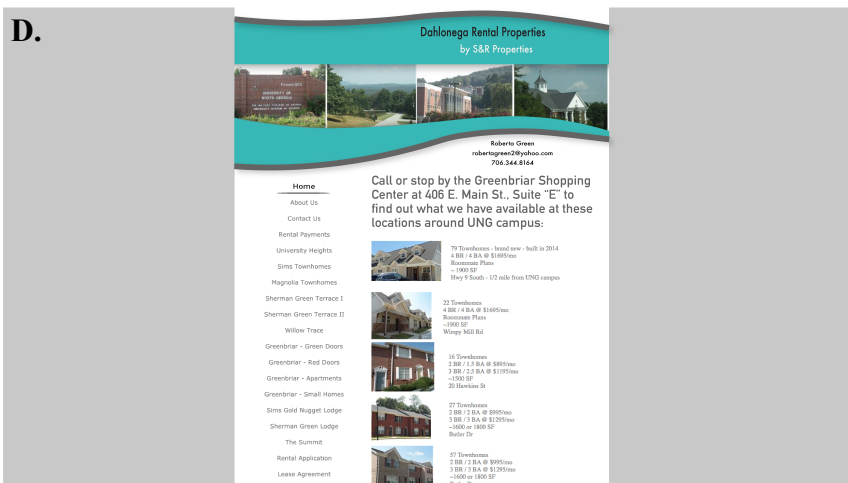

Figure 3. Website "C"

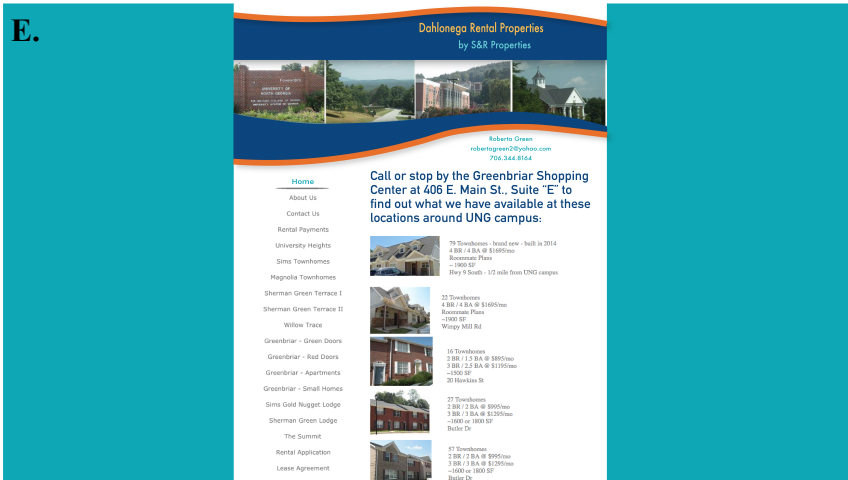Figure 4. Website "D"

E.

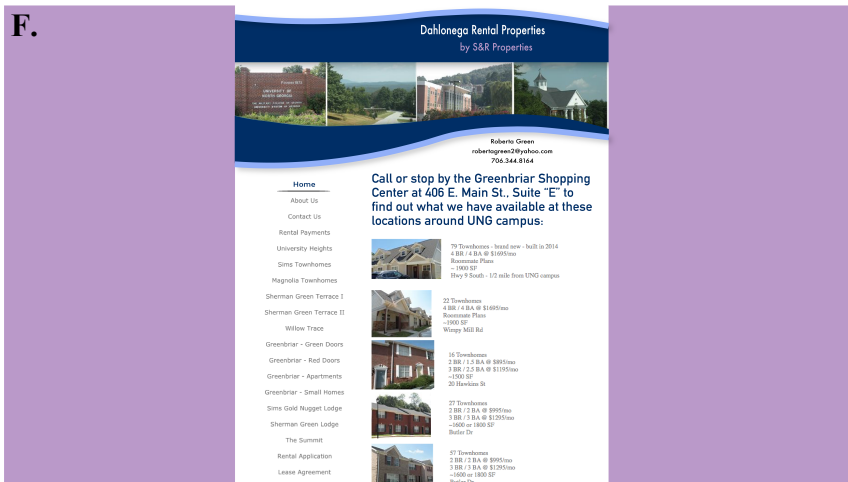Figure 5. Website "E"

F.

Figure 6. Website "F"

Survey Given

1. Which website would you prefer to use?

A

B

C

D

E

F

2. What gender do you most closely identify with?

Woman

Man

Figure 7. Survey Questionnaire

Results

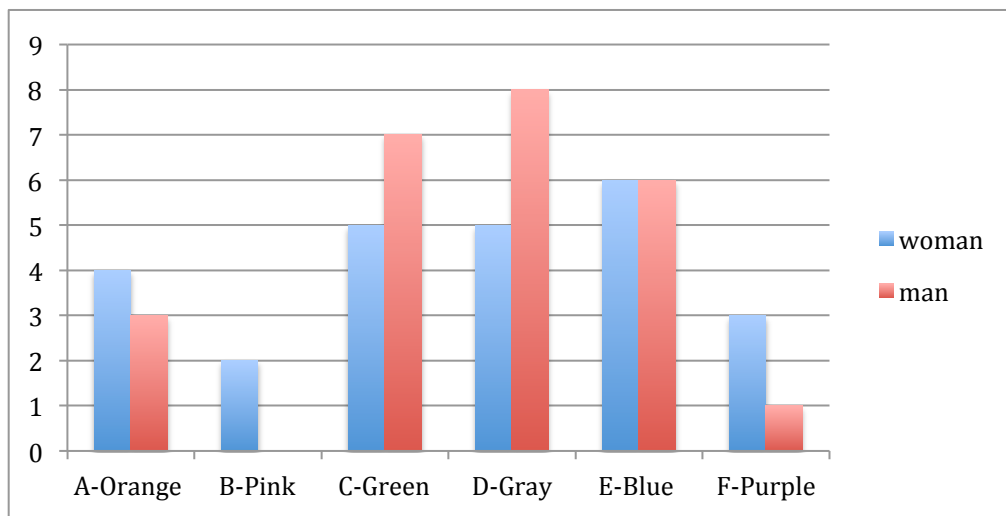|	A-Orange	B-Pink	C-Green	D-Gray	E-Blue	F-Purple
woman	4	2	5	5	6	3
man	3	0	7	8	6	1
total	7	2	9	13	12	4

Figure 8. Table of Results

Figure 9. Bar Graph of Results for Men and Women

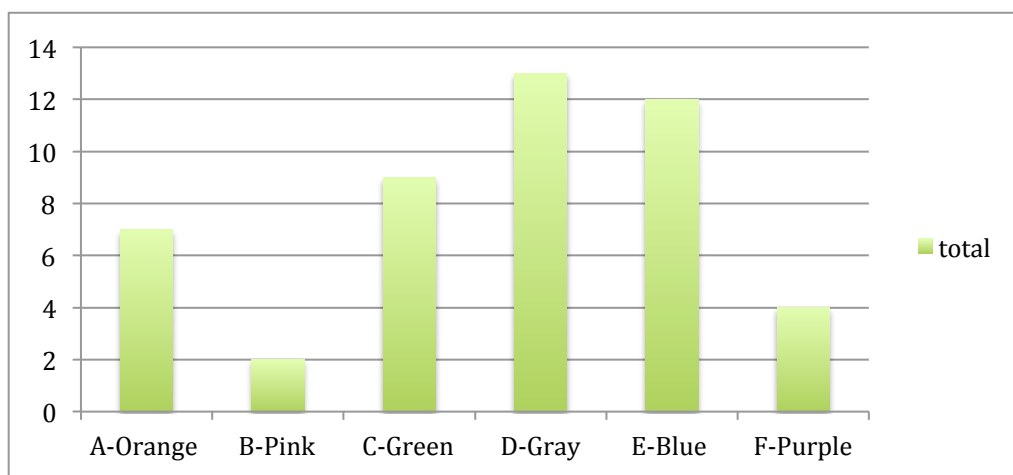Figure 10. Bar Graph of Total Results

Analysis

Surveys were counted and data was recorded and stored in Microsoft Excel. For women, the blue color scheme website was the most popular with 6 votes, the green and gray websites tied for second most popular with 5 votes, orange had 4, purple had 3, and pink had 2. For men, the results were slightly less varied with 8 votes for gray, 7 votes for green, 6 votes for blue, 3 for orange, and 1 for purple. In total, the most popular website color scheme was gray with 13 votes, blue had 12 votes, green 9, orange 7, purple 4, and pink 2. Bar graphs were chosen to visually represent the data.

The most popular color scheme for men was gray, a previously accepted "masculine" color. This finding could be used to solidify the belief that gender still determines color, even in our evolving socially conscious world. However, the most popular color scheme for women was also a previously accepted "masculine" color, blue. This finding could suggest that other factors were involved in determining the success of these colors on a website, not just gender. For one, both blue and gray have been classified by psychologists as "cool" colors, colors that, when compared to red and yellow hues, have a colder temperature (Singh 2006). Color psychologists believe that cool colors have a tendency to bring a sense of calm to their audience. Potentially, this could mean that both men and women chose blue and gray due to their desire for a more relaxing looking website.

The least popular color overall was pink. It only received 2 votes from 2 women. Because it received no votes from men, this could indicate a strong correlation between color and gender, as pink has been previously accepted as a "feminine" color. Purple was also one of the lowest ranking colors in this study with only 4 votes overall. Also a "feminine" color, 3 of its 4 votes

were from women. This could once again suggestion a correlation between gender and color for women in this scenario.

The "gender neutral" colors, green and orange, were fairly popular by both genders with orange being on the lower end of the ranking system. Green was the second most popular color for men and tied for second most popular with blue for women as well. Orange was third most popular for women and fourth most popular for men. These results indicate a strong correlation between the concept of "gender neutral" colors and the mid-range varied responses from both genders. This could mean that these colors are not indicative of gender and were chosen based off other factors like personality, logic, personal taste, background, and even biological characteristics like cones cells in the eyes as discussed before.

Limitations

Limitations of this study must be recognized. For one, the administration of the questionnaire could have been better formatted to fit the scenario. If the websites were shown on a computer screen rather than on physical paper, the representation of the marketing scenario may have been more accurate to a real life economic decision-making moment.

Another limitation is the exclusion of important aspects of color like saturation, hue, value, and chroma. For example, saturation refers to the intensity of color in an image. The light gray colored website won the most votes overall and it was by far the least saturated. This could suggest that both men and women are more attracted to less color-saturated websites. However, the other less-saturated website colors were purple and pink. Neither of these options received many votes by either gender. The green, blue, and orange options had the highest saturations. Their results varied but were around the average number of votes. These outcomes indicate an inconclusive understanding of saturation and its role in gender marketing. To complete a more

in-depth study with conclusive results, saturation and other components of color would need to be taken into account.

Another limitation to this study is the lack of statistical analysis. If a correlation coefficient method were used in analyzing the data, the conclusions drawn from the results could be more clear and concise. Needless to say, numbers rather than vague suggestions like a "strong" or "weak" correlation are always more efficient in determining the outcomes of an experiment. Even more, the statistical findings may translate better to the more math-savvy scientific and market research communities.

Other limiting factors to the study include the sample size and population. Though college students should still be used to create an accurate representation of the current snapshot of color and gender marketing, the study would benefit from a population not exclusive to the University of North Georgia in Dahlonega, GA. As the designated Georgia State Military College, UNG is a historically socially and politically conservative school. This could be a limiting factor on the study due to the controversial nature of gender nonconformity and its political divisiveness. Though participants were not made aware of the intent of the study, the influence of a historically conservative school could indicate an allegiance to traditional gender roles and thus affect results. If more college students could be surveyed from different schools and types of schools across the globe, a better understanding of the topic would be achieved. Even more, if there were simply a larger sample size administered at UNG, a truer snapshot would be given.

Conclusion

Though the gender nonconformity revolution is much alive in the world today, needless to say, this does not mean all of mankind has caught up with the trend. Marketers know this and

thus have to carefully segment their audience, sometimes based on gender and sometimes based on neutral characteristics like personality. However, it is clear that marketers simply choose to target the market based on gender because it is easier. One could argue that this practice of gender marketing is socially irresponsible because it emboldens gender roles and norms, which, in turn, can lead to gender inequality. If women are constantly advertised to with the color pink, this could subconsciously affect their desire to fill the role of "woman" as an exclusively physically attractive person due to the association of pink with the concepts "soft", "pretty", and "delicate". By filling this role, women essentially have valued their worth solely in outward beauty versus other important personal characteristics like strength, intelligence, and leadership, to name a few. Used by marketers to attract men, dark blues and blacks are colors indicative of power and toughness. If these colors and associated features are what men understand as an integral part of the male role in society, the underlying outcome can be toxic masculinity, a term used to describe a form of gendered behavior that results when manhood is "defined by violence, sex, status, and aggression" (Clemens 2017). Marketers in the 70s understood the social implications of gendered colors. Why can't present day marketers learn from them? Target audiences should be based on need, personality traits, interests, and skills, not gender.

The hypothesis for this study was accepted. There was a slight positive correlation between color and gender in this digital marketing scenario, the main evidence being that the most popular color for men was a masculine color and the only gender to vote for the feminine colors were women. However, once again, there remains no definitive conclusion on the correlation between one specific color and one gender. This is because the results gathered here are different from previous study results. For example, one experiment made the inference that orange was more disliked by women than men and blue stood out more for men than for women.

By contrast, the study here found that more women liked orange and blue than men. Researchers should continue to study this subject in contemporary scenarios with younger populations as a means of creating a current snapshot on the role of color psychology in the practice of gender marketing.

Closing Remarks

Color is a special field of study that combines art and science. Gender is a topic of discussion integral to the very fabric of our society. Marketing is the application of art and psychology in the real world. All of these together have been extremely difficult to synthesize but have been interesting and thought provoking, affording me a thorough comprehension of my field. I am thankful for this project and the development it has given me as a researcher and investigator. Specifically, I am thankful for the many more questions this study has raised regarding the ethical dilemmas and social responsibilities of marketers. I will continue to do research on this topic and related issues so that I am ready to take on my career with an extensive understanding of my field. I will never look at color, gender, and marketing the same.

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