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College in the media: the relationship between repeated exposure and college expectations

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ABSTRACT

Media consumption can influence viewer perceptions and attitudes. Recent research on media's effect on college students has failed to address gender differences. Using Mere Repeated Exposure Theory (traditionally used in marketing research), this study aims to answer three research questions regarding college media consumption and college perceptions: What types of fictional college media do college students consume? How does college media consumption differ by gender? How does fictional college media consumption relate to perceived college expectations? Results suggest that college students who consume high amounts of fictional college media are more likely to have positive attitudes towards partying and socializing in college. High consumers of college media, however, do not believe that college media influences their college perceptions. Men are more likely to socialize in college and are more aware than women that college media influences their college perceptions. Women are more likely to believe that college is difficult regardless of media consumption.

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According to the Motion Picture Association of America (2013), high school and college-aged students are increasing in numbers as movie-goers, continuing to oversample in movie-going versus their proportion of the population. There is also growing evidence in the literature that demonstrates that university students consistently overestimate alcohol use and positive attitudes toward alcohol use on campuses (Wasylikiw & Currie, 2012), as well as feeling isolated, alone, and worrying about college relationships and economic prospects of the future (Tobolowsky, 2001). Popular culture found in college media provides a lens to view college that may or may not be accurate, influencing college expectations for those that plan to go or are going to college. Due to its entertainment value, students are continually exposed to college life through college novels, TV shows, and movies, believing

college to be a certain way, and then becoming disillusioned when the reality of college sinks in (Byers, 2005).

Recent advances in technology have allowed the American population more access to media than ever before. New mediums have allowed the dissemination of media in a variety of ways. More than two-thirds of the US population (68%), for example, went to the movies at least once in 2013 (Motion Picture Association of America, 2013). Furthermore, the average person watches four hours of television a day (Herr, 2008). Media research suggests that there is a link between media and perceptions (Williams, 1986), making it important to understand what the media is teaching our consumers.

This study aims to understand how repeated consumption of college-themed media influences college students' perceptions and expectations of college and how consumption differs between men and women. The distinction between genders is important due to the differences in attitudes and behaviors between college men and women (Colby, Swanton, & Colby, 2012; Keiser, Sackett, Kuncel, & Brothen, 2016; Locke & Mahalik, 2005; Ronen, 2010). By analyzing the interaction between the amount and type of college-themed media consumption and gender, a more specific conclusion may be drawn regarding the possible relationships between media consumption on college attitudes and behaviors.

This study attempts to answer three research questions: What types of fictional college media do college students consume? How does college media consumption differ by gender? How does fictional college media consumption relate to perceived college expectations?

Theoretical framework

Several theories and constructs have been used to explain the effects of college fiction on student perceptions of college. This literature review will focus on the construct of (mis)education, used specifically to describe how college students are affected by the media they consume. Mere repeated exposure theory (Zajonc, 1968), used almost exclusively in marketing and consumer research, complements (mis)education and serves to fill in some of the gaps in the research to understand the influence of college fiction. (Mis)education helps to explain how the consumption of inaccurate portrayals of higher education in college media alter student perceptions of college. Mere repeated exposure theory serves to explain why students choose to continue watching inaccurate portrayals of college in media.

Mere repeated exposure theory

The basic principle of mere repeated exposure theory is that the mere repeated exposure of an individual to a stimulus object enhances his or her attitudes towards it (Zajonc, 1968). The theory suggests that repeated exposure is accompanied by learning about the stimulus, which in turn increases the pleasantness of the

stimulus exposed (Stang, 1975). However, overexposure to a particular stimulus may have a negative effect, causing negative evaluation of the stimulus under these situations (Miller, 1976). This theory was illustrated in a study which showed that the letters belonging to one's own name were generally preferred to those who were not because of the repeated exposure of those letters (Nuttin, 1985). Obermiller (1985) further suggested that repeated exposure specifically facilitated learning under low involvement conditions, such as by watching a television show or commercial. Repeated exposure of a stimulus also has an indirect effect on other stimuli since incidental exposure to stimulus objects alters their assumed familiarity to others, without conscious processing (Kwan, Yap, & Chiu, 2015). In the case of college fiction, for example, watching the campus environment of a fictional college in a particular film may cause the viewer to generalize those traits to other colleges that may not have been highlighted in the movie.

(Mis)education

The construct of (mis)education was introduced to higher education research by Byers (2005) through her analysis on various television shows that take place in a college setting. (Mis)education refers to the process by which media images concretize themselves into everyday life. A person's identity is thought of as fragmented, pieced together by the various types of media that the individual consumes. The images offered by television screens and billboards provide moments that individuals will combine to form potential identities. This allows reality to slowly become synonymous with the elaborate realities and identities provided by the media. Television often offers a distorted view of the world, which can aid in the (mis)education of viewers. However, Byers also argues that it is "one way in which viewers learn about the experiences outside their own immediate purview" (p. 82). Through this statement, Byers acknowledges that television can have positive effects on viewers, not just negative effects.

Methodology

The purpose of this study was to examine any potential relationships between fictional college media consumption with perceptions of college life. Several steps had to be conducted to create the items used for the instrument, data collection, and data analysis. Principal Axis Factoring was conducted as part of an Exploratory Factor Analysis to determine the factor structure of the data and to find any relationships among survey items, reduce redundant items, and remove items with weak correlations to other items. After data collection, the data were cleaned by removing incomplete data observations and checking for assumptions of ANOVA and multivariate analysis. Afterwards, analysis of variance and multivariate analysis were conducted to determine relationships between college media consumption and college perceptions.

After appropriate IRB approval was granted, a survey was created and sent out to popular college forums where participants were asked to name the first five college-themed fictional media in each category (movie, TV show, and novel). Responses were compiled and a list was created with the 10 most popular movies, the 10 most popular TV shows, and the 5 most popular novels (Table 1). Participants were not as aware of college-themed novels so a smaller list was created. Finally, the movies, shows, and novels were re-categorized based on the focus of their plots. Three categories were created: movies that focus on college partying, movies that focus on college in general, and movies that do not focus on college at all but merely use college as a background setting for other plots (Table 2). These categories were not used for the survey. They were created for data analysis.

Next, the instrument was created using survey items based on conversations with high school students about college expectations. Items measuring college perceptions and expectations were developed based on recurrent, consistent themes that the students brought up regarding their expectations of college. A total of 18 items were developed and administered through a survey. The items used a Likert scale with responses consisting of Strongly Agree, Agree, Neither Agree nor Disagree, Disagree, and Strongly Disagree. The items ranged from asking participants to rate how influential media was in their perceptions of college (i.e. “movies about college helped me understand what college is like”) to behaviors in college (i.e. “I attended many college parties during my first semester”). The survey included the 18-item questionnaire as well as participant demographic data and a list of the most popular college-themed media (movies, TV shows, and novels) collected using the method described above.

The survey was sent out electronically through email to students in the College of Education at a large, research university in the central plains. The survey was open for 30 days and students were able to receive course credit for participation. A sample of 156 college students submitted the survey. Data were analyzed using SPSS software (version 22). Six survey responses were removed due to incomplete and missing data, leaving 150 ($N = 150$) complete survey responses to use in the data analysis. A total of 57 (38%) men and 93 (62%) women participated in the survey. College students from every year were surveyed. Participants included 21

Table 1. Most popular college-themed media in each category.

Movies	TV shows	Novels
Animal House	Community	Gossip Girl
Pitch Perfect	Greek	Joe College
Accepted	Saved by the Bell: The College Years	Rules of Attraction
The House Bunny	Undeclared	The Magicians
Admission	Felicity	On Borrowed Wings
Neighbors	A Different World	
Van Wilder	Blue Mountain State	
Old School	Resident Advisors	
Monsters University	Veronica Mars	
Rudy	Gilmore Girls	

Table 2. Re-categorized media based on emphasis.

College party focus	General college focus	College as background focus
Animal House	Pitch Perfect	Admission
Neighbors	Accepted	Saved by the Bell: the College years
Van Wilder	The House Bunny	Felicity
Old School	Monsters University	Veronica Mars
Blue Mountain State	Rudy	Gilmore Girls
Rules of Attraction	Undeclared	Gossip Girl
	Greek	The Magicians
	Community	On borrowed Wings
	A Different World	
	Resident Advisors	
	Joe College	

(14%) freshmen, 37 (24%) sophomores, 41 (27%) juniors, 32 (31%) seniors, 17 (11%) graduate students, and 2 (1%) students who did not list a classification.

Results

Exploratory factor analysis

An Exploratory Factor Analysis (EFA) was conducted using the 18-item questionnaire for the purpose of grouping the items into related factors to be used for multivariate analysis. Principle Axis Factoring (PAF) was the most appropriate extraction method to use to account for underlying factors affecting correlation of items and provide for more accurate item grouping with less error. An examination of skewness and kurtosis as well as Q–Q plots demonstrated linearity. The large sample size also allows for the assumption of linearity to be met (Osborne & Costello, 2009). There were no observable outliers in the data. There is no consensus on the appropriate minimum sample size for EFA. Osborne and Costello (2009) surveyed two years' worth of articles and determined that a popular and consistent guideline is 10 samples per one item. This initial extraction of factors with 18 items resulted in poor model fit. Items that did not correlate well with other items were removed. A second PCA was conducted with the remaining 15 items, and the results were favorable.

In the second extraction, assumptions of linearity were met, Barlett's test was significant ($p < .001$), KMO statistic was high ($p = .822$), and the determinant was greater than zero. Factor extraction was determined using Kaiser's criterion, scree plot analysis, and parallel analysis (Table 3). The Kaiser Criterion and scree plot analysis recommended extracting four factors, while parallel analysis recommended extracting three factors. Both three and four factors were extracted and compared (see Table 4 for factor loadings). Based on evaluation of the item loadings through each extraction, the four-factor model was chosen.

Based on item groupings, the four factors were renamed (from left to right): college media influence, social expectations, difficulty expectations, and party expectations. The item groups for each factor were tested for internal reliability by

Table 3. Results of parallel analysis for second extraction.

Eigen values	Simulated Result
4.620	1.580
3.298	1.444
1.579	1.340
1.005	1.252
0.676	1.176
0.631	1.104
0.604	1.035
0.551	0.972
0.452	0.912
0.432	0.851
0.362	0.791
0.242	0.733
0.227	0.672
0.172	0.606
0.150	0.531

computing the Cronbach's alpha. College media influence had a reliability statistic of .928 (excellent), social expectations had a reliability statistic of .789 (acceptable), difficulty expectations had a reliability statistic of .623 (weak), and party expectations had a reliability statistic of .814 (good). The factor "college media influence" had the strongest reliability statistic while the factor "difficulty expectations" had the weakest. The "difficulty expectations" factor was kept despite its weaker correlation due to its ability to provide at least a starting basis for relationships between college media and perceived academic performance in college. Although social development in college is important, many college retention efforts focus on academic development and a student's belief in their own academic ability can improve or decrease academic persistence (Banks, 2005). The four factors were used to conduct a multivariate analysis to answer the research questions.

Chi-square test

A chi-square test was performed to find differences between media consumption between men and women. Analysis revealed that males were significantly more likely ($p < .05$) to watch *Animal House* (.013), *Van Wilder* (.001), *Old School* (.005), *Rudy* (.019), and *Blue Mountain State* (.032). Males were also significantly more likely to read the novel *Joe College* (.010) than females. Females were more likely to watch *Pitch Perfect* (<.001), *Greek* (.048), *The House Bunny* (<.001), and *Gilmore Girls* (<.001) than males. Initial observations suggest that males are more likely to consume college media with an emphasis on partying (refer to Table 5), whereas females are more likely to consume college media with a more general college emphasis. Further analysis was required to find any potential relationships between the type of college movie, show, and book consumed by gender.

ANOVA tests were completed between gender and the three categories of college media (college party focus, general college focus, and college as background focus) to determine if males and females were more or less likely to watch different

Table 4. PAF factor loadings with direct oblimin rotation.

Three factor extraction		Four factor extraction					
Variables	1	2	3	1	2	3	4
TV shows about college helped me understand what college is like.	.890			.900			
Movies about college helped me understand what college is like.	.853			.894			
I think that college was presented realistically in movies about college.	.847			.849			
Fictional college novels helped me understand what college is like.	.817			.831			
I felt that college is just like they show it in the movies.	.790			.737			
I attended many college parties during my first semester.		.840			.818		
College parties are an essential part of the college experience.		.688			.642		
My friends attended many college parties during my first semester.		.667			.622		
I had an easy time making friends when I started college.		.498			.598		
Now that I'm in college, I feel that college was a lot of fun.		.403	.357			.597	
Before I attended college, I expected college was going to be very difficult.			.577			.591	
On the first day of college, I felt like I didn't know what I was doing.			.567			.566	
Before I attended college, I expected college was going to be very difficult.		.394	.518				.962
Now that I'm in college, I feel that college was very difficult.			.496				.654
Making friends are an essential part of the college experience.		.419	.455				.548

Table 5. Media consumption by gender.

Movie	Gender likely to view	Media focus
Animal House	Males	College Party Focus
Van Wilder	Males	College Party Focus
Old School	Males	College Party Focus
Rudy	Males	General College Focus
Blue Mountain State	Males	College Party Focus
Joe College	Males	General College Focus
Pitch Perfect	Females	General College Focus
Greek	Females	General College Focus
The House Bunny	Females	General College Focus
Gilmore Girls	Females	College as Background Focus

Table 6. MANOVA results for amount of college media consumed.

Factor	Wilk's Lambda	Power (%)
College media influence	0.642	41.4
Social expectations	0.011	91.0
Difficulty expectations	0.061	73.7
Party expectations	0.016	85.7

categories of media. The hypothesis, based on the chi-square test above, was that males were more likely to consume media with a college party focus and females were more likely to consume media with a general college focus. A Levene's test for homogeneity of variances showed that variances were not equal in college party focus and general college focus, so the Welch statistic was used. After correcting for Type I error rate, a significant difference was found between gender and college party focus ($p < .05$) as well as college as background focus ($p < .001$). Males were more likely to consume college media which emphasized partying, whereas females were more likely to consume college media that involved a college in some capacity but was not used as a central plot point. No significant difference was found between gender and media with a general college focus (.849).

Multivariate analysis

A one-way multivariate analysis was conducted to determine relationships between amount of media consumption and college perception. Participants were placed into three categories based on the total number of popular movies, shows, and novels they consumed from a provided list out of a possible 25: low consumers (none to four), average consumers (five to eight), and high consumers (nine or more). The amount of consumption was then compared to each of the four extracted factors (college media influence, social expectations, difficulty expectations, and party expectations) using a one-way MANOVA (see Table 6). The independent variables were the amount of consumption, and the dependent variables were the items within each of the four extracted factors. The decision was made to complete four separate MANOVA tests for each factor instead of one MANOVA test including all four factors because the interest was more focused on understanding the relationships between amount of consumption and different

college expectations independent of each other. For example, amount of consumption may affect social expectations differently than difficulty expectations, but the results may be skewed when analyzed together. For the purpose of this study, I was interested in how consumption affected each expectation separately. Assumptions for MANOVA were met unless otherwise noted. Wilks' lambda was used for analysis.

The first factor, college media influence, was used to measure participant awareness of the influence college media had on their perceptions of college. A one-way MANOVA did not result in a significant relationship between amount of college media consumption and perceived influence of college media ($p = .642$). However, it is important to note the power was low enough that it is possible a relationship was there but the test was unable to detect it.

The second factor, social expectations of college, was used to measure participant beliefs that college was primarily a social environment. MANOVA results showed a significant relationship between amount of college media consumption and social perceptions of college ($p = .011$). A post hoc analysis was conducted to further analyze the differences using a Tukey test, with corrections made to account for type 1 error rate ($p < .017$). For the statement "Before I attended college, I expected college was going to be fun," there was a significant difference between low consumers of fiction and high consumers of fiction ($p = .001$). In general, those who watched more movies and TV shows about college and read more novels were more likely to place higher value in the social nature of college than low consumers.

The third factor, difficulty expectations, measured participant perceptions that college was a difficult environment, academically speaking. MANOVA results showed no significant difference between amount of media consumption and perception of college difficulty ($p = .061$).

The fourth factor, party expectations, was used to measure participant expectations that college is an environment primarily conducive to partying. MANOVA results showed a significant difference between amount of college media consumption and expectation that college is an environment conducive to partying ($p = .016$). A Tukey Test was performed for post hoc analysis, with corrections made to account for type 1 error rate ($p < .017$). A significant difference was found between low and high consumption for the statement "I attended many college parties during my first semester" ($p = .009$). High consumers of college media were more likely to value partying in college than low consumers of college media.

Discussion

The purpose of this study was to answer three questions relating to fictional college media consumption and perceptions of college in an effort to understand the impact of college media on college students. Based on the results, each research question will be discussed below.

(1) What types of fictional college media do college students consume?

A survey sent out that asked participants to list popular college movies, TV shows, and novels was used to compile the top 10 most popular movies and TV shows and the top 5 most popular novels. The media listed by participants varied in genre and style. However, the most common works listed fell into one of three general categories: media that emphasized the party aspect of college life, media that emphasized a more general view of college life, and media that did not emphasize the college at all (refer to Table 2).

Media in the first category consisted primarily of comedy movies such as *Animal House*, *Van Wilder*, and *Old School*. These works often involved a campus fraternity, and scenes of partying and heavy drinking were emphasized. The plot usually involved a college student trying to gain fulfillment by having fun, and the antagonist was usually a university official or a rival group of students.

Media in the second category was comprised of more variety of fiction. These movies, shows, and novels took place in a college, and the plot focused around the college. However, viewers were exposed to more general areas of the college than they would in the first category. TV shows such as *Community* and *Undeclared* focused on a group of college students trying to survive the daily struggles of college life. Movies such as *Pitch Perfect* and *Monsters University* focused on a variety of college-related struggles such as making friends, succeeding in school, joining campus organizations, and self-fulfillment.

The final category is unique in that although the plot takes place in a college, the college aspect is downplayed or secondary to the plot. Although the issues faced by the protagonists may be similar to those of the second category, the world created by these movies, shows, and books is not contained within nor centered on the college. Many of these are TV shows that starred high school students that eventually moved on to college, such as *Saved by the Bell*, *Gilmore Girls*, and *Veronica Mars*. These shows all had seasons that took place in college, but most viewers would not associate the college setting as the primary focus of the shows. Other works, such as *Admission*, *The Magicians*, and *On Borrowed Wings*, use the college as a setting for the plot to take place but does not actually emphasize college life.

These works of college media were presented to a different set of participants in a survey and asked to mark down each one they had seen or read. Twenty-five works of media were listed (10 movies, 10 shows, and 5 novels). Participants who consumed up to four works of media were labeled as low consumers ($N = 35$). Participants who consumed between five and eight works of media labeled as average consumers ($N = 74$). Participants who consumed nine or more works of media were labeled as high consumers ($N = 41$).

Overall, the participants in the study, consisting of college students ranging from freshmen to graduate students, viewed or read less than half of the most popular college movies, shows, and novels. The average rate of consumption was between five and eight works of media.

(2) How does college media consumption differ by gender?

A chi-square test of the individual works of media consumed by men and women showed that men were much more likely to watch movies focusing on college parties than women. Men were significantly more likely to watch party movies like *Animal House* and *Van Wilder* and football-based media such as *Rudy* and *Blue Mountain State*. However, men were also more likely to read college novels than females, with *Joe College* being statistically significant. A follow-up ANOVA using gender as the independent variable and movies with a party focus as the dependent variables supported the finding that men were more likely to watch “college party” movies than women.

Individual media analysis using a chi-square test suggested that women were more likely to watch movies such as *Pitch Perfect* and *The House Bunny*. They were also more likely to watch TV shows such as *Greek* and *Gilmore Girls*. These movies and shows fell into the category of movies with a general college focus, suggesting that women were more likely to watch general college movies compared to men. Follow-up analysis using ANOVA which included gender and movies with a general college focus did not result in any statistical significance. However, movies that use college as a background but not as the main focus was significantly higher among female consumption in the ANOVA test. This means that, when taken in aggregate versus individual titles, women were more likely to consume media that had glimpses of college but did not use college as the main focus.

This distinction is important because it may provide insight into the movie-watching, TV-watching, and novel-reading trends between men and women. Neither men nor women read many college-themed novels, though men read college novels in slightly higher frequency than women. Men were more likely to watch movies that emphasized heavy alcohol use and partying, whereas women were more likely to watch movies and shows where college was in the background. Through repeated exposure theory, one would suggest that repeated exposure of women to college settings in the background may unintentionally create a specific idea of college based on those TV shows. Similarly, the repeated exposure of men to college party movies may be more likely to influence partying in college.

(3) How does fictional college media consumption relate to perceived college expectations?

The amount of media consumption did not seem to result in significant differences in perceptions of difficulty in college nor acknowledgment of media’s influence in participants’ understanding of college. However, those who consumed higher amounts of college media were more likely to see college as a social environment and as a party environment. The disparity between participant responses in media’s influence and their actual perceptions led to an interesting finding. High consumers of college media did not believe that the media they consumed had a significant impact in their perception of college. However, there was a significant difference in their perception of college as a social and party environment. This

suggests that higher college media consumption could, indeed, influence college perceptions, but participants are unaware of that influence.

Since the college media used for the survey highly emphasized the use of college partying and various social themes in college (such as making friends, building relationships, and joining organizations), mere repeated exposure theory suggests that those who consume this media regularly are more likely to have positive attitudes towards partying in college and engaging in social activities. This is confirmed by the data showing that higher consumers of college media were also more likely to place high value on the partying and social aspects of college. Very few of the college media listed focused on the academic aspects of college, so it is understandable that a significant difference was not found between amount of college media consumption and expectation of college to be difficult.

The results of this study suggest that college students who consume larger amounts of fictional college media are more likely to have positive attitudes towards partying and socializing in college. High consumers of college media, however, do not believe that college media influences their college perception, despite their higher scores in college perceptions than low consumers. This supports mere repeated exposure theory which suggests that learning happens subconsciously by being repeatedly exposed to favorable images that help consumers create a new identity using these images. The process of creating a new identity by being presented with numerous images is explained through the construct of (mis)education, which suggests that students consuming higher amounts of college media are (mis)educated into believing that academics are not as important in college as socialization and partying.

Limitations and suggestions for future research

This study aims to better understand how college media consumption frequency can affect student expectations of college. One limitation to this study is that the participants were already in college, so many of the expectations attained through college media could have been diluted or even reversed by experiencing college firsthand. In order to minimize the effects of this, survey items were included that asked participants to think back to before they were in college as well as their current opinion in college. Principal Axis Factoring showed that there was a strong correlation between both results (opinion before attending college and opinion during college), resulting in stronger reliability to the responses. However, this leads to the second limitation of the study. Responses were based on self-report measures, which have the potential to compromise the reliability of results. Lastly, the third limitation is based on the works of college media selected for the study. Only the most popular movies, shows, and novels were selected for the study. It is possible that students may have consumed college media that were not on the provided list, and could have skewed the results.

Suggestions for future research include replicating the study with high school students, or a different population that had not attended college, and determine if the results remain the same. Future studies can use more concrete data instead of self-report measures, such as student GPA or confirmation of fraternity or sorority membership. To overcome the college media limitation, future studies can use an experimental design where all participants consume the same college media in a laboratory setting to control for previous media consumption.

The results of this study suggest that much more work must be completed to understand the influence of fictional college media on college perceptions. Although this study focused on movies, shows, and novels, increasing technology has created new avenues for college media, including the internet and social media. These new avenues could have increasing influence on college students as they become more connected to the internet for information acquisition.

Disclosure statement

No potential conflict of interest was reported by the author.

References

- Banks, J. (2005). African American college students' perceptions of their high school literacy preparation. *Journal of College Reading and Learning*, 35(2), 22–37.
- Byers, M. (2005). Those happy golden years: Beverly Hills, 90210, college style. In S. Edgerton, G. Holm, T. Dasplit, & P. Farber (Eds.), *Imagining the academy: Higher education and popular culture* (pp. 67–88). New York, NY: RoutledgeFalmer.
- Colby, S. M., Swanton, D. N., & Colby, J. J. (2012). College students' evaluations of heavy drinking: The influence of gender, age, and college status. *Journal of College Student Development*, 53(6), 797–810.
- Herr, N. (2008). *The sourcebook for teaching science: Strategies, activities and instructional resources*. San Francisco, CA: Jossey-Bass.
- Keiser, H. N., Sackett, P. R., Kuncel, N. R., & Brothen, T. (2016). Why women perform better in college than admission scores would predict: Exploring the roles of conscientiousness and course-taking patterns. *Journal of Applied Psychology*, 101(4), 569–581.
- Kwan, L. Y.-Y., Yap, S., & Chiu, C.-Y. (2015). Mere exposure affects perceived descriptive norms: Implications for personal preferences and trust. *Organizational Behavior and Human Decision Processes*, 129, 48–58.
- Locke, B. D., & Mahalik, J. R. (2005). Examining masculinity norms, problem drinking, and athletic involvement as predictors of sexual aggression in college men. *Journal of Counseling Psychology*, 52(3), 279–283.
- Miller, R. L. (1976). Mere exposure, psychological reactance and attitude change. *Public Opinion Quarterly*, 40(2), 229–233.
- Motion Picture Association of America. (2013). *Theatrical market statistics*. Retrieved from http://www.mpa.org/wp-content/uploads/2014/03/MCAA-Theatrical-Market-Statistics-2013_032514-v2.pdf
- Nuttin, J. M. (1985). Narcissism beyond gestalt and awareness: The name letter effect. *European Journal of Social Psychology*, 15(3), 353–361.

- Obermiller, C. (1985). Varieties of mere exposure: The effects of processing style and repetition on affective response. *Journal of Consumer Research*, 12(1), 17–30.
- Osborne, J. W., & Costello, A. B. (2009). Best practices in exploratory factor analysis: Four recommendations for getting the most from your analysis. *Pan-Pacific Management Review*, 12(2), 131–146.
- Ronen, S. (2010). Grinding on the dance floor gendered scripts and sexualized dancing at college parties. *Gender & Society*, 24(3), 355–377.
- Stang, D. J. (1975). Effects of 'mere exposure' on learning and affect. *Journal of Personality and Social Psychology*, 31(1), 7–12.
- Tobolowsky, B. F. (2001). *The influence of prime-time television on Latinas' college aspiration and expectations* (Doctoral dissertation). University of California, Los Angeles.
- Wasylikiw, L., & Currie, M. (2012). The animal house effect: How university-themed comedy films affect students' attitudes. *Social Psychology of Education*, 15(1), 25–40.
- Williams, T. M. (1986). *The impact of television: A natural experiment in three communities*. Orlando, FL: Academic Press.
- Zajonc, R. B. (1968). Attitudinal effects of mere exposure. *Journal of Personality and Social Psychology*, 9(2), 1–27.