A Template Paper with Comments for Illustrating the 6th Edition of APA Style

Jordan Buess and Rick Froman

In the Fall of 2008, Jordan Buess, an undergraduate student in my [Rick Froman] Research Methods class, conducted a research project as a course requirement. Part of the assignment was to report her research findings in an APA style research paper. The 5th edition of the APA manual was in force at that time. Her paper was eventually accepted for publication in the fifth volume of our psychology department’s student-run, peer-reviewed online research journal: Initial Forays into Psychological Science (at: http://acadweb.jbu.edu/psychology/ifps/ifps.htm).

The purpose of the journal is to encourage high level research worthy of publication, give advanced students experience in a peer review process and to provide subsequent Research Methods students with examples of previous student work worthy of emulation. I also usually provide a word processing template using one of the previously published works so that students can see the differences between a manuscript before and after publication. I used Jordan’s paper as a template for this purpose. Jordan was the author of the paper.

When the sixth edition of the APA Publication Manual was released, I decided to alter Jordan’s paper (with her permission) to fit the revised guidelines (so it could still be used as a template) and to add comments explaining the various requirements of APA style (6th ed.) as they were illustrated throughout the paper. This turned out to be very useful when the first printing of the 6th edition of the publication manual was eventually shown to contain a number of errors with regard to the included sample papers. Moreover, this resource has more extensive explanations of APA style than the sample papers in the APA Publication Manual. Jordan was the author of the paper and my contribution was to alter some aspects of the paper to reflect 6th edition style and to provide comments throughout the paper explaining elements related to APA style. I also benefitted from the expertise of Ruth Ault and reviewers who suggested a number of corrections to the original draft. However, my intent was not to make the paper perfect or fully professional but to use a student paper to illustrate the use of APA style.

I am using this template with explanatory comments in both the Research Methods class with students who are learning APA Style for the first time and Research Seminar with students who initially learned the 5th edition so the comments do not allude to changes in the editions but just to the guidelines of the 6th edition. In both classes, I use the paper as both a guide to the details of APA style and as a template students can use for their own research reports.
Factors Correlated With a Tendency Toward Eating Disorders in a Nonclinical Setting

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I would like to acknowledge the Psychology department at John Brown University for its approval of this study. I would also like to thank Dr. Rick Froman for his advice in designing the study and his assistance in analyzing the data. Finally, I would like to thank the 44 participants who completed the online survey as partners with me in this research.

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Abstract

Previous researchers have found that previous abuse, perceived pressure to be thin, and academic pressure all related to the development of disordered eating behaviors. I sought to determine whether these factors correlated with a tendency toward eating disorders at John Brown University. The hypothesis was that women who had been exposed to abuse and perceived pressure from others on campus to succeed and be thin would be more likely to have a tendency toward disordered eating. Analyses revealed no significant difference between abused and nonabused participants. Pressures to be thin and to achieve academically correlated positively with overall eating disorder scores. Future researchers might study samples from public universities and male populations.

Keywords: physical abuse, sexual abuse, emotional abuse, verbal abuse, peer pressure, eating attitudes, eating disorders.
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Factors Correlated With a Tendency Toward Eating Disorders in a Nonclinical Setting

A great concern for many people in the United States is the rate at which Americans are becoming obese; yet Americans continue to idealize an image of thinness. The desire to be thin has become so strong that, according to the National Association of Anorexia Nervosa and Associated Disorders (ANAD, 2008), eating disorders are endemic in the United States.

The three most common types of eating disorders are anorexia nervosa, bulimia nervosa, and binge eating disorder (American Psychological Association [APA], 2004, p. 1). People suffering from anorexia nervosa usually have inaccurate body images, seeing themselves as being overweight when they are often underweight in reality. Starvation, excessive exercise, and substantial weight loss usually accompany this disease. Sufferers of bulimia nervosa generally eat vast amounts of food before ridding their bodies of the food with excessive exercise, vomiting, laxatives, or other methods of purging. Feelings of disgust and shame often accompany binging episodes, and purging is the method by which sufferers seek to reduce these negative emotions. People with binge eating disorder have episodes of extreme overeating similar to those of bulimic individuals. However, sufferers from binge eating disorder do not use unnatural methods to rid their bodies of the food they consume.

According to a 10-year study conducted by ANAD, these eating disorders typically present in people by the age of 20 (ANAD, 2008). Approximately 43% of the participants in this study reported their eating disorders between the ages of 16 and 20. It seems clear that the college years are a period of life when eating disorders are not uncommon, especially among women (APA, 2005).

Many researchers have attempted to determine factors that seem to influence the occurrence of eating disorders. Some researchers have found that early childhood experiences...
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seem to relate to eating disorders later in life. For example, Treuer, Koperdak, Rozsa, and Furedi (2005) used standardized procedures to conduct interviews and administer tests that indicated the participants’ exposure to physical abuse and sexual abuse as well as the frequency with which they exhibited disordered eating behaviors. Their sample included only those diagnosed with an eating disorder based on the Diagnostic and Statistical Manual (DSM-IV; American Psychiatric Association, 1994) criteria. The results showed that 29% of their sample had experienced sexual abuse and 57% had experienced physical abuse. In this particular study, they discovered that the physical abuse had a negative impact on body image and the sexual abuse appeared to have no impact at all. They concluded that eating disorders correlated with both sexual abuse and physical abuse, but that physical abuse was more related than expected. Similarly, Wiederman, Sansone, and Sansone (1998) found substantially higher levels of disordered eating behavior in women who indicated that they had personally witnessed violence as a child or had experienced physical, sexual, or emotional abuse as children than women who had not had those experiences.

In addition to early experiences, research has demonstrated that the pressures in a person’s present environment influence eating behavior. One study involved only college students and sought to determine the factors specific to students’ universities that contribute to disordered eating behavior (Kashubeck, Walsh, & Crowl, 1994) using standardized testing to examine students on two university campuses. At one school, a high emphasis on physical appearance and characteristics that are more feminine both correlated positively with disordered eating. At the other school, masculinity correlated negatively with disordered eating. Both schools’ results demonstrated how pressure for high achievement related to eating disorders.

Previous research has identified a number of factors that may contribute to disordered eating behavior. The previously mentioned study of separate university campuses by Kashubeck
et al. (1994) confirms that these factors may vary from location to location. With this in mind, the purpose of the present study was to discover factors on a small Christian university campus related to disordered eating behavior among students. The hypothesis was that students with higher EDI survey scores would also reveal higher incidences of exposure to previous abuse, as well as perceived pressures for appearance and academic achievement.

Method

Participants

A random sample of 100 female students was chosen from the undergraduate population of John Brown University (JBU). Out of the 100 female students invited through campus email to take the anonymous online survey, 44 actually completed the survey. The age range of actual participants in the survey was between 18 and 26 years old, with an average age of 20.07 years.

Materials

The participants completed an online survey consisting of Garner and Olmstead's (1984) Eating Disorder Inventory (EDI) and supplemental questions that explored the factors hypothesized to correlate with eating disorders. The instrument posed 70 questions and contained demographic items sufficient to describe the sample.

Procedure

The random sample of female college students received an e-mail explaining the survey and providing a link to it. The students read the informed consent that explained that they would indicate their consent by completing the survey.
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Results

In order to test the hypothesis, the supplemental questions on the survey regarding previous physical, sexual, or emotional abuse combined to form one score indicating any previous abuse. A t-test compared the abused participants with the nonabused participants for the total survey score, comprised of the summed values of the responses for each participant. Item scores were reversed so that the highest value for all items indicated the most disordered response to the question. In addition to the t-test comparing the total survey score, eight additional t-tests compared the scores of the two groups on each of the eight subscales of the EDI (Bulimia, Maturity Fears, Interoceptive Awareness, Drive for Thinness, Body Dissatisfaction, Perfectionism, Ineffectiveness, and Interpersonal Distrust). Pearson r correlations determined the degree of each of the relationships between perceived pressures for academic success and thinness with the total EDI survey score.

Forty students responded to all questions on the survey and contributed data to the test comparing responses of abused and nonabused participants on the survey. A two-tailed t test compared the overall scores of the abused and nonabused students. The t test revealed no significant difference between the abused and nonabused participants’ scores, $t(38) = .41, p = .68$.

Eight additional two-tailed t tests compared the abused and nonabused participants on the eight subscales comprising the EDI. The t-test results revealed no significant difference between the abused and nonabused groups’ survey scores for any subscale: Bulimia, $t(42) = .35, p = .73$; Maturity Fears, $t(42) = .47, p = .64$; Interoceptive Awareness, $t(41) = 1.71, p = .09$; Drive for Thinness, $t(41) = .27, p = .79$; Ineffectiveness, $t(41) = .60, p = .55$; Body Dissatisfaction, $t(41) = .005, p = .996$; Perfectionism, $t(40) = 1.61, p = .12$; Interpersonal Distrust, $t(42) = .93, p = .36$. 

Comment [Richard L47]: Another first level header.

Comment [Rick From48]: Italicize statistical symbols like $t$ for the $t$ distribution.

Comment [Rick From49]: When necessary, transformations required for the analysis (like summing scores or reversing scales) are detailed first.

Comment [Rick From50]: These words are capitalized because they are the names of subscales.

Comment [Richard L51]: Would normally be in numeral form if it wasn’t the first word in the sentence.

Comment [Richard L52]: Need to specify the number of participants from the original sample.

Comment [Richard L53]: Statistical phrase includes the distribution used ($t$ in this case), the degrees of freedom in parentheses, the value of the relevant statistic ($t = .41$ in this case) and the exact $p$ value whether the result is significant or not. Non-Greek letter statistical symbols ($t$ and $p$ in this case) are both italicized. There is one space on both sides of each $=$ sign and after the $t$.

Comment [Richard L54]: Use hyphen here because “t-test” modifies “results” but no hyphen if you say “results of the t-tests” because “t-tests” are not modifying “results.”

Comment [Richard L55]: Capitalize names of subscales of a test.

Comment [Richard L56]: Semicolon used to separate elements in a series that already contains commas.
Forty participants responded to the item on the survey asking about perceived pressure from others on campus to be thin. The data analysis revealed a significant moderate positive correlation between participants’ perceived pressure from others on campus to be thin and EDI survey score, \( r(38) = .65, p < .001 \) (see Figure 1). The \( r^2 \) value for this correlation was .43, indicating that the variance in perceived pressure to be thin accounted for approximately 43% of the variance in total EDI survey scores. The same number of participants responded to the item on the survey asking about perceived pressure from others on campus to achieve academic success. The data analysis revealed only a weak significant positive correlation between participants’ perceived pressure from others on campus to achieve academic success and EDI survey score, \( r(40) = .34, p = .03 \) (see Figure 2). The \( r^2 \) value of .12 for this correlation indicates that perceived pressure for academic success accounts for only approximately 12% of the variance in total EDI survey score.

**Discussion**

A series of two-tailed \( t \) tests found no significant differences between abused and nonabused participants with regard to overall survey scores and scores on the eight subscales of the EDI. This is contradictory to what previous research in this area found.

Treuer et al. (2005) found that those who had been physically abused had a significantly more negative body image compared to those who had not been physically abused. They found that both physical and sexual abuse positively correlated with the frequency with which participants exhibited disordered eating behavior. Their study differed from the present study in several ways, especially in the population from which they selected their sample. The sample for their study included only participants who received eating disorder diagnoses prior to the study. Because the use of the EDI questions in the present study was primarily for comparison instead
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of for diagnosis, it is not possible to determine whether any of the participants in the current study had eating behaviors as severe as those in Treuer et al.’s study. It is a fair assumption that their diagnosed participants exhibited much more severe eating behaviors than the present sample due to the increased frequency of previous abuse.

The study by Weiderman et al. (1998) was similar to the present study; however, it involved women who were not necessarily college students and who visited a gynecologist regularly. In the study, they asked women if they had ever experienced the various forms of abuse and if they had ever participated in disordered eating behavior. The significant difference between abused and nonabused participants was perhaps a result of the fact that researchers defined disordered eating behavior as one or more attempts by participants to starve themselves, purge, or take laxatives in order to get rid of food. In the present study, 64 questions analyzed the degree of disordered eating behavior on a 7-point scale, so that participants who performed disordered eating behaviors only occasionally did not receive high scores. Perhaps the low-scoring participants of the present study would have been considered disordered in the Weiderman et al. study, possibly leading to significant results that fail to take into account the degree of disordered behavior.

The present study on the JBU campus showed that the EDI survey scores of the participants correlated positively with perceived pressure from others on campus to be thin. This is consistent with the research of Kashubeck et al. (1994), who found similar results at one of the campuses in their study. The relationship between perceived pressure to be thin and higher survey scores may seem obvious, but this is still something to which the JBU community should be sensitive. It is possible for the community of JBU and similar communities to offer services and adopt attitudes that can help to reduce negative responses in women who feel such pressure.

Comment [Richard L65]: No need to include year of publication since the study was cited earlier in this paragraph.

Comment [Richard L66]: Two complete sentences that are closely related can be combined with a semicolon.

Comment [Rick From67]: Numeral used to represent a number less than 10 when describing points on a scale.

Comment [Richard L68]: Address the practical ramifications of the study.
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The current research also revealed a weak positive correlation between EDI survey scores and perceived pressure from others on campus to achieve academically, a result that Kashubeck et al. (1994) found on both campuses in their study. It seems that pressure from others still influences students on the JBU campus. Because academic pressure is an ongoing characteristic of university life, this result is not surprising and may not have much of a direct influence on eating behaviors. It is also possible that academic pressures lead students to miss meals, overeat during stressful times, or fail to devote time to exercise. All of these responses to pressure are maladaptive and could lead to feelings and behaviors related to eating disorders.

Although the community of JBU has no control over various forms of abuse that happen before a student enrolls or the pressure from outside sources (e.g., media) to be thin, it does have the opportunity to equip students to respond appropriately and healthily to these issues. Although there have been temporary support groups on campus for women who have experienced sexual assault, in addition to opportunities for counseling offered free of charge, no permanent support groups are available at this time for those who have experienced physical, sexual, or emotional abuse. The JBU community could use these groups to reach out to women who have been victims of abuse. Out of the 44 women who completed the study, 25% reported previous abuse. It would be wise for the JBU community to discover the needs of these women and look for additional ways to provide for them. In addition to this, the community should train students to cope appropriately with academic pressure, perhaps by providing stress and time management courses. Students should refrain from making discriminatory comments about others that may cause some students to feel pressure regarding appearance. The university should offer courses or support groups dealing with body image or nutrition. An anonymous online moderated discussion board might be an option for students who wish to discuss these
issues without revealing their identities.

Future researchers might give the same survey from the present study to a secular university in order to test for the same hypotheses, as well as to determine the difference between JBU responses and the responses of a larger secular university. It is possible that the Christian beliefs that JBU emphasizes had an effect on the research. For example, students may cope better with previous abuse and perceived pressure because their faith provides them with coping techniques such as prayer or meditation. Students who believe that God personally created them may have more appreciation and respect for their bodies. Students may also have been less than honest in responses to questions about sensitive issues, because Christians consider physical, emotional, and sexual violence as sins. Students who inappropriately place blame for these experiences on themselves may not be comfortable with admitting being involved in abusive situations. Participants may also have been less likely to report previous abuse or maladaptive behaviors because of perceived pressure from the Christian community to forgive others and put the past behind them.

Future researchers should provide definitions for physical, sexual, and emotional abuse, because the students who indicated abuse might have actually experienced different levels of abuse. Subsequent studies might also seek to determine the effects of abuse on eating behaviors for men. However, it might first be beneficial to study the differences between men and women in their opinions on what constitutes abuse. A study with this research question in mind might provide scenarios to both males and females, asking them to decide whether each situation is abusive. One potential problem with such a study is the sensitivity of the issues it would present to participants.

Regardless of the fact that most of the results of this study were statistically insignificant,
this research provided valuable information to JBU regarding its community. The results of this study were not consistent with some of the previous research mentioned, but it is important to realize that JBU is a unique community that specifically stands out from other communities because of its emphasis on Christianity. The JBU community should continue to take into account the diverse lives of its students as it considers how to equip them to respond healthily and appropriately to their abusive experiences and to the pressures they currently perceive on campus.

Comment [Richard L75]: Even with statistically insignificant results, it is possible to end the article with a strong statement summarizing what the research accomplished.
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References


Figure 1: Significant moderate positive correlation between pressure from others on campus to be thin and total survey score.

$y = 15.69x + 151.1$

$R^2 = 0.426$
Figure 2. Significant but weak positive correlation between pressure from others on campus to achieve academic success and total survey score.