

# **The effect of 'Body Positive' images on body appreciation and appearance comparison in men and women**

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# Declaration

This thesis is entirely my own work, and has not been previously submitted to this or any other third level institution.

Sign: \_\_\_\_\_

Date: 29/04/2019

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Thank you.

To my younger self,

“You can't be what you can't see.”

— Marian Wright Edelman

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# Abstract

Since the advent of social media, the problem of body dissatisfaction has undoubtedly worsened. The purpose of this study was to explore the potential of body positive content to improve body appreciation for gender and sexuality groups. Additionally, the relationship between trait appearance comparison and body appreciation in male and female sexuality groups was examined. 195 participants were recruited online and divided into groups as follows: 76 females in the experimental and 61 in the control group; 24 males in the experimental and 34 in the control group. A quantitative, factorial, repeated-measures, experimental design was used to measure scores on The Physical Appearance Comparison Scale - Revised by Schaefer & Thompson (2014) and Body Appreciation Scale-2 by Tylka & Wood-Barcalow (2015). The findings show that women and sexual minority men are especially vulnerable to making appearance-based social comparison which is associated with lower levels of body appreciation. Finally, body positive images are able to promote body appreciation across gender and sexuality.

# Literature review

## **Body Image**

Body image is a multidimensional construct that refers to the perception, attitudes, and behavioural aspects related to one's physical appearance (Cash & Fleming, 2002; McCabe et al., 2007). Schilder (1950) defined body image as the way in which the body appears in the mind of an individual and is conceptualized by a cognitive, social, emotional model (Riva, 1998). Body image is most commonly studied in association with body dissatisfaction, a normative experience which is characterized by the negative perceptions and emotions a person associates with how they experience their own body (Grogan, 2016). Much of the previous literature focused on body image disturbance, due to the false assumption that body image was a continuum with negative and positive body image at opposite ends which meant that a reduction in one would lead to an increase in the other. However, recent research has since recognized these constructs as distinctly separate (Tylka, 2011; Tylka & Wood-Barcalow, 2015a). According to Webb (2015), 'body image flexibility' explains the coexistence of these variables and also partially mediates the link between body dissatisfaction and body appreciation. Therefore, research is now aimed at the exploration of positive body image.

## **Body Dissatisfaction**

Since the 1990s, the prevalence of body dissatisfaction has been increasing steadily up to the normative levels seen today (Grabe, Ward, & Hyde, 2008). This problem is especially pervasive among women and girls - whereby 50% report being dissatisfied with their bodies (Grabe et al., 2008). Studies show that body dissatisfaction increases for females across bodyweight which reflects a predominant desire to be thinner (Kostanski, Fisher, & Gullone, 2004). In contrast, overweight males desire to be thinner while those who are underweight tend to desire being more muscular (Leit, Pope, & Gray, 2001). According to the Diagnostic and Statistical Manual of Mental Disorders, 5<sup>th</sup> Edition, body dissatisfaction is one of

the main clinical characteristics and prognostic features of eating disorders such as anorexia, bulimia, body dysmorphia, and obesity (American Psychiatric Association, 2013). Indeed, body dissatisfaction has been linked to depression, sexual dysfunction, substance use, lower levels of physical activity, steroid abuse, cosmetic surgery, smoking, and unhealthy dieting behaviours such as restrictive and binge eating (Dittmar, 2009; Thompson & Stice, 2001; Neumark-Sztainer, Paxton, Hannan, Haines, & Story, 2006; Moradi & Huang, 2008; Stice & Shaw, 2002). This is particularly concerning since dissatisfaction has been shown to develop early in children as young as 7 years old, and exists across diverse body shapes and races (Grabe et al., 2008). Therefore, body dissatisfaction has emerged as a core aspect of physical and psychological well-being (Grabe et al., 2008).

### **The role of appearance comparisons in body dissatisfaction**

Festinger's social comparison theory (1954) proposes that people are driven to determine their social standing in life and so will seek out standards to which they can compare themselves to. Social comparisons refer to the cognitive judgments made by people in order to evaluate their own attributes in comparison to those of others. Festinger described two types of social comparisons whereby upward social comparisons occur towards those considered to be better and downward social comparisons are towards individuals regarded as worse off (Myers & Crowther, 2009). The Tripartite Influence Model (Thompson, Heinberg, Altabe, & Tantleff-Dunn, 1999; van den Berg, Thompson, Obrowski-Brandon, & Covert, 2002) explains that body dissatisfaction is the result of appearance comparisons made to unrealistic body ideals of thin women and muscular men as created by mass media, which individuals are likely to perceive their own appearance as inferior in comparison (Cash & Smolak, 2011). According to Dougherty and Krawczyk (2018), appearance comparison is a critical vulnerability for experiencing body dissatisfaction - depending on the type of media an individual is exposed to and their gender.

Among women, appearance comparison was shown to moderate the relationship between television exposure among women (Myers & Biocca, 1992; Dougherty & Krawczyk, 2018). Meta-analyses of a substantial body of literature



demonstrate that exposure to thin-idealized images such as those found in television, magazines, and advertisements, has a small yet consistent effect of declining mood, body satisfaction, self-esteem, as well as increasing weight anxiety, thin-ideal internalisation, self-objectification, body dissatisfaction, and disordered eating behaviours in women (Grabe et al., 2008; Groesz, Levine, & Murnen, 2002; Harper & Tiggemann, 2008; Tiggemann, Polivy, & Hargreaves, 2009; Tiggemann & McGill, 2004; Dittmar, 2009; Yamamiya, Cash, Melnyk, Posavac, & Posavac, 2005; Halliwell, Dittmar, & Howe, 2005). Among men, appearance comparison moderated the relationship between internet use and body dissatisfaction (Dougherty & Krawczyk, 2018).

Researchers have also emphasized the influence of sexual orientation on appearance comparison tendencies. Smith, Telford, and Tree (2017) found that lesbian and bisexual women were just as vulnerable to mainstream body ideals and appearance norms as heterosexual women. On the other hand, researchers have asserted that sexual minorities are just as susceptible to making appearance-based comparisons as women (Griffith, Murray, Krug, Mclean, 2018); Connor, Johnson, & Grogan, 2004; Peplau et al., 2009). Since research on the differences between trait appearance comparisons across gender sexuality groups is limited, it will be explored further by this study.

### **Online appearance comparisons**

The rise of the social networking sites (SNSs) has undoubtedly intensified the issue of body dissatisfaction for men and women (Myers & Crowther, 2009; Jones, 2001). Firstly, most idealized images on SNSs are products of selective self-presentation since users tend to post their most attractive photos for an imagined audience (Ashraf Sadat Ahadzadeh, Saeed Pahlevan Sharif, & Fon Sim Ong, 2016). According to Fox and Vendemia (2016), women edit their photos more frequently than men and also tend to feel worse after upward social comparison to idealized images. This is further supported by Chua and Chang (2016) who found teenage girls to be especially receptive to peer norms of beauty of bright eyes, flawless skin, and thinness, that pressure them to partake in curated self-productions and image

editing to bring themselves closer to their own ideal beauty. Thirdly, typical online behaviours such as checking other users' profile photos and engaging with online content (by liking, sharing or commenting) cause individuals to make appearance comparisons more frequently than traditional forms of media (Kim & Chock, 2015).

Indeed, studies on Facebook show that frequent use is associated with greater social comparison and greater self-objectification (Hanna et al., 2017). An experimental study found higher levels of body dissatisfaction after short-term exposure to Facebook, but only for women high in trait appearance comparison (Fardouly, Diedrichs, Vartanian, & Halliwell, 2015). Correlational studies by Tiggemann and Slater (2013; 2014) found a positive correlation between social media consumption and body dissatisfaction in female students, which supported similar findings of a longitudinal study that associated maladaptive usage of Facebook with increased body dissatisfaction in young women (Smith et al., 2013). Additionally, the study found that the frequent use of image-centric social media platforms like Facebook, Instagram, Snapchat, as well as dating applications, corresponded to greater body dissatisfaction and eating disorder symptoms in men (Griffith et al., 2018).

These findings affirm the sentiment that social media images are just as influential as, if not more than, traditional mediums in establishing social norms of beauty (Sastre, 2014). Instagram, one of the most popular online photo sharing social media applications worldwide, has been identified as an especially potent means of disseminating information on body image (Hempel, 2014). The site allows users to engage with various types of media posted on the site such as images, videos, and text in the form of comments and captions. Instagram is especially effective at promoting norms and trends since it allows users to tag and categorize content using hashtags. Researchers have taken particular interest in groups of body focused content that manifest online in the form of popular hashtags such as #fitspiration and #thinspiration (Tiggemann & Zaccardo, 2018). Derived from the word 'inspiration', these types of images are considered 'genres' of beauty standards that aim to inspire others to obtain a specific type of body. Content analyses of these hashtags reveal that they often contain elements of objectification

that focus on thin or toned bodies, as well as messages that stigmatize fat and advocate for weight loss (Tiggemann & Zaccardo, 2018). While hashtags such as #thinspo are recognized as dangerously pro-anorexic and are removed from searches, #fitspo images are extremely popular and are not forbidden since they are deemed to promote a 'healthy' lifestyle by motivating people to exercise. On the contrary, researchers have found that 'fitspiration' contents to be just as harmful to mental health as 'thinspiration' content since they are both associated with body dissatisfaction (Dignard, 2017).

### **Body Positivity**

'Body positivity' is another type of body-focused content which gained popularity on Instagram as a reprisal to the fitspiration trend. A recent search of #bodypositive on Instagram yielded over 9.4 million posts, while related hashtags such as #effyourbeautystandards and #bodypositivity yielded over 3.7 million and 2.9 million posts, respectively (Instagram, April 2019). Typically, body positive content encompasses a diverse range of shapes, sizes, colours, features, and abilities, and advocates for the acceptance and appreciation of all body types (Cwynar-Horta, 2016). A recent study conducted on young women demonstrated an association between body positive posts and improved mood, body satisfaction as well as body appreciation relative to thin-ideal and appearance-neutral image exposure (Cohen, Fardouly, Newton-John, & Slater, 2019).

As highlighted by Sastre (2014), body positive content has the ability to present more diverse representations of bodies that may broaden conceptualisations of beauty as well as resonate with the positive body image theoretical construct as described by Tylka and Wood-Barcalow (2015a). This content can be found in many other forms such as viral video trends like #donthatetheshake started by @bodyposipanda who first danced in a bikini in her bedroom, artworks and memes with quotes such as "All bodies are good bodies", as well as the enumerable captioned selfies that detail personal journeys to self-acceptance. The body positivity trend has since been haphazardly adopted by mainstream media, with positive projects such as Embrace the documentary by

Taryn Brumfitt (2016) and JCPenney's "Here I Am" campaign (2016), to more moot endeavours like the movie "I Feel Pretty" starring Amy Schumer (2018) and Dove's "Real Beauty Bottles" campaign (2017).

### **Body Appreciation**

As body positivity continues to move into public awareness, so too has body image research shifted its focusing onto the positive. Positive body image is simply described as having love and respect for one's body (Tylka & Wood-Barcalow, 2015b). This multifaceted construct is operationalized as 'body appreciation' which measures the ability to appreciate the body's features, functionality, and health instead of primarily valuing the attractiveness of one's appearance (Avalos, Tylka, & Barcalow, 2005). Preliminary research shows that body appreciation can safeguard against the harmful effects of media exposure (Andrew, Tiggeman, & Clark, 2015; Halliwell, 2013; Paraskeva, Lewis-Smith, & Deidrichs, 2017). Additionally, it is associated with greater psychological well-being as well as an increase in health-seeking behaviours like intuitive eating, increased physical activity, and a reduction in dieting, alcohol consumption, and smoking (Swami, Weis, Barron, & Furnham, 2017; Andrew, Tiggemann, & Clark, 2016a, 2016b). Therefore, body appreciation can provide a foundation for interventions that aim to reduce body dissatisfaction as well as promote positive body image (Halliwell, 2015).

To date, few studies have investigated gender differences in body appreciation. One study conducted on an Indonesian population found no significant ethnic differences compared to Western populations, and showed that men had significantly higher body appreciation than women (Swami & Jaafar, 2012). Among female sexuality groups, Winter, Satinsky, and Jozkowski (2015) found significant differences in body appreciation between sexual minority and heterosexual women, and no significant differences between bisexual women and other sexual minority women. Since no studies have been conducted investigating body appreciation across male sexuality, this will be explored by the present study.

## **The Present Study**

Considering the gaps in the literature discussed above, the present study will investigate the differences between trait appearance comparison and body appreciation across gender and sexuality. Secondly, the study will explore the effect of body positive Instagram content on body appreciation in men, women, and sexuality groups, will be investigated. Lastly, the relationship between trait appearance comparison and body appreciation in light of viewing body positive content will be illuminated. Therefore, the study proposes the following research questions and hypotheses:

### **1. Are there differences in trait appearance comparison and body appreciation for gender and sexuality?**

H1 - There will be significant differences in PACS-R scores between male and female groups.

H2 - There will be a significant difference in PACS-R scores across male sexuality groups and no significant difference across female sexuality groups.

H3 - There will be significant differences in BAS-2 pre-test scores between male and female groups.

H4: There will be a significant difference in pre-test BAS-2 scores across sexuality groups.

### **2. Do body positive images affect body appreciation in female and male groups differently?**

H5 - Body positive images will have a significant effect on female scores on the BAS-2 after viewing.

H6 - Body positive images will have a significant effect on male scores on the BAS-2 after viewing.

H7 - Control images will not have a significant effect on BAS-2 scores after viewing for males and females control groups.

H8 - There will be a significant difference between post-test BAS-2 scores of the experimental group and control group for both females and males

H9 - There will be significant differences between experimental and control group post-test scores on the BAS-2 for males and females.

H10 - There will be significant differences between pre and post BAS-2 scores across sexuality.

H11 - There will be significant differences in between post BAS-2 scores across sexuality groups.

**3. Is there a relationship between trait physical appearance social comparison and body appreciation?**

H12- There will be a negative correlation between PACS-R scores and BAS-2 scores (pre and post).

H13 - PACS-R scores will predict significant amounts of variance in BAS-2 scores

# Methodology

**Design.** This study used a quantitative, factorial, repeated-measures, and experimental design to investigate the effect of body-positive images on body appreciation. The design was composed of two separate interventions for males and females since gendered sets of images served as the independent variable. The dependent variable - trait body appreciation - was measured by the Body Appreciation Scale-2 (BAS-2) by Tylka & Wood-Barcalow (2015). In addition, trait physical appearance social comparison was measured by the Physical Appearance Comparison Scale (PACS-R) by Schaefer & Thompson (2013). The research was conducted online in order to recruit a diverse sample.

**Participants.** 199 participants took part in the online study. Convenience and snowball sampling methods were used to recruit participants by circulating a link on social networking sites such as Instagram, Facebook, and Whatsapp. Participants were included on the basis that they were above the age of 18 and identified as either male or female. Four participants were excluded from the sample because they identified as non-binary or had incomplete data. Therefore, the final sample had 195 participants in total: with 76 females in the experimental group and 61 in the control group, and 24 males in the experimental and 34 in the control group.

**Materials.** An online questionnaire containing an information sheet (Appendix A), consent form (Appendix B), demographic questionnaire (Appendix C), and debrief sheet (Appendix I) was compiled using Google forms. In addition to these, the questionnaire operationalized the variables with the following:

**PACS-R.** The Physical Appearance Comparison Scale by Schaefer & Thompson (2013) measured the tendency to make appearance comparisons (Appendix D). The scale is made up of 11 items that are answered using a 5 point Likert scale ranging from 'Strongly Agree' (0) to 'Strongly Disagree' (4). Items were scored by calculating the total score. According to Schaefer & Thompson (2013), the scale has good

internal consistency, with a Cronbach alpha coefficient of .97. In the current study, the Cronbach alpha coefficient was .96.

**BAS-2.** The Body Appreciation Scale-2 by Tylka & Wood-Barcalow (2015) measured trait body appreciation (Appendix E). The scale is made up of 10 items that are answered using a 5 point Likert scale ranging from 'Strongly Agree' (1) to 'Strongly Disagree' (5). Items were scored by calculating the mean score. According to (Tylka & Barcalow, 2015), the BAS-2 has good internal consistency, with a Cronbach alpha coefficient reported of .97 (.97 for women, .96 for men). In the current study, the Cronbach alpha coefficient was .95.

**Images.** A set of 20 images were selected for the groups of each condition. In the experimental condition, participants viewed a set of body-positive images which differed depending on gender - female (Appendix F) or male (Appendix G). Images were sourced from popular Instagram hashtags (e.g. #bodypositive, #bodypositivity, #bopo, #bodyposi, #bopowarrior, #bopomen, #bodyacceptance, #effyourbeautystandards, #allbodiesaregoodbodies etc.) and body-positive influencers (e.g. @bodyposipanda, @nonairbrushedme, @recoverybrainfood, @johnasavoia, @bopo.boy, @abearnamedtroy etc.). Images were selected by a focus group on the basis that they highlighted physical 'flaws', were not sexualized, and did not objectify the subject. In the control condition, both male and females viewed the same set of nature images (Appendix H).

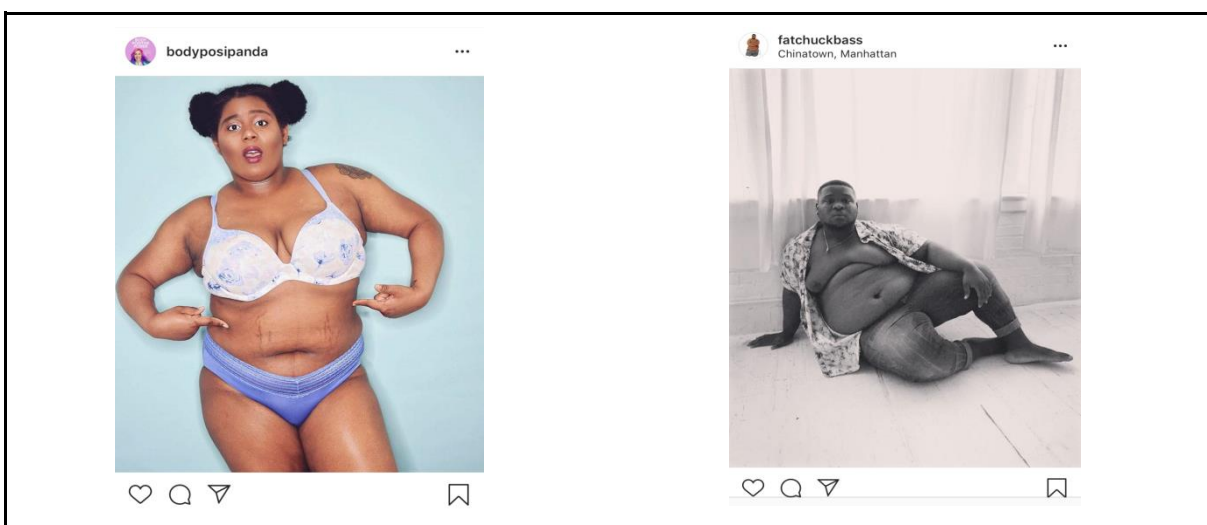


Figure 1: Female and male bopo Image.



**Procedure.** Once participants clicked on the Google Form link, they completed a consent form and demographic questionnaire. Participants were then directed to the PACS-R and BAS-2. Participants then viewed a set of 20 images, depending on their group assignment. Finally, after a post-test measure of the BAS-2, participants were debriefed. This design is summarized by Figure 2:

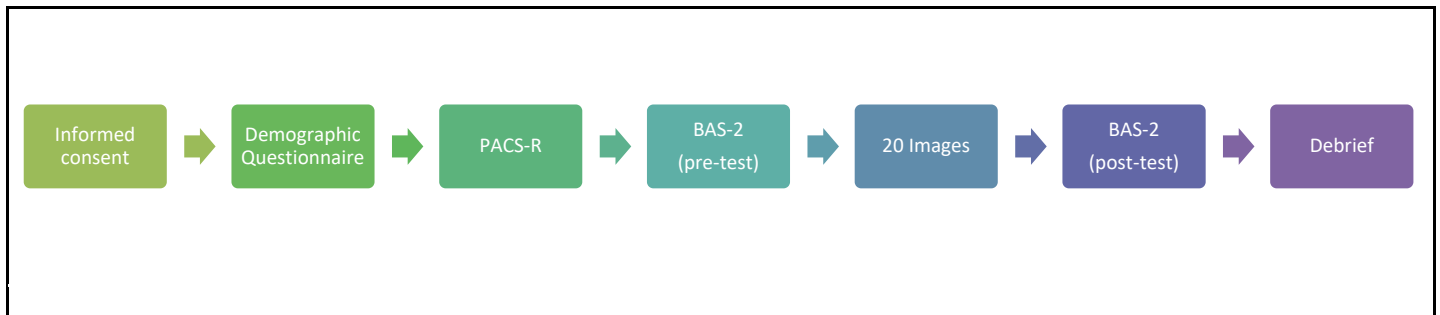


Figure 2: Research Design Flow Diagram

**Ethical considerations.** Due to the sensitive nature of the topic of body image, a lot of ethical considerations were made in the design of the study. Ethical approval for this study was given by IADT Institute Research Ethics Committee. Participation was voluntary and no compensation was given for taking part. Participants were assured of their anonymity and that their raw data would remain confidential. Formal consent was obtained from participants who were given the opportunity to ask questions at the beginning and end of the questionnaire. Participants were told that the purpose of the study was “to investigate the effects of Instagram images on self-perceptions”. Participants were debriefed and informed of the exact nature of the study at the completion of questionnaire.

In particular, the psychological effect of self-objectification was expected to occur after viewing body focused images since they participant’s to direct attention onto their own bodies as a result of social comparison. While these effects were unavoidable, the potentially positive outcomes made this endeavour worthwhile. The body focused images selected were also considered to be sensitive due to the fact that some of them contained partial nudity. However, since they were publically

available on Instagram, they can be deemed appropriate since they would have passed Instagram's strict community guidelines.

# Results

This chapter outlines the results of participant's demographic information, as well as analyses of scores on the Body Appreciation Scale-2 (BAS-2) by Tylka & Wood-Barcalow (2015) and the Physical Appearance Comparison Scale (PACS-R) by Schaefer & Thompson (2013). Statistical tests were performed on the data gathered using Statistics Package for the Social Sciences (SPSS) Version 25, (2017). The results are ordered by research questions and hypotheses.

## Participant Demographics

Gender separated the experiment into four groups; (1) male experimental (N = 24), (2) female experimental (N = 76), (3) male control (N = 34), and (4) female control (N = 61) (Figure 3). These 195 participants are described as follows: age ranged between 18 and 61 (M = 29.78, SD = 8.98) (Figure 4), ethnicity was 90.8% Caucasian and 9.2% were from other backgrounds (Figure 5, Appendix J), and sexual orientation was 67.7% heterosexual, 8.2% homosexual, 21% bisexual, 0.5% asexual, and 2.6% 'other' (Figure 6, Appendix J).

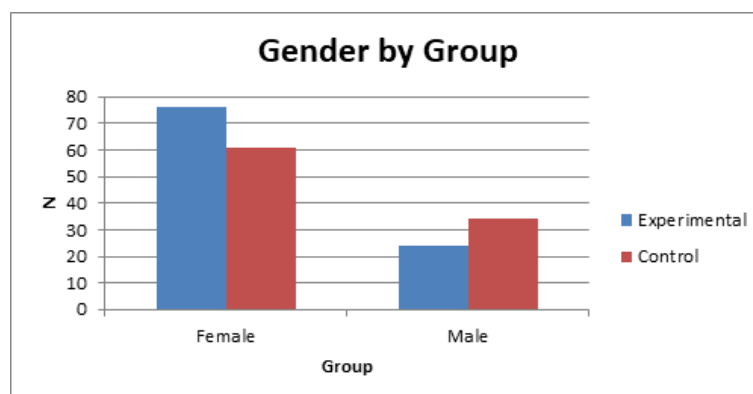


Figure 3: Gender by Group

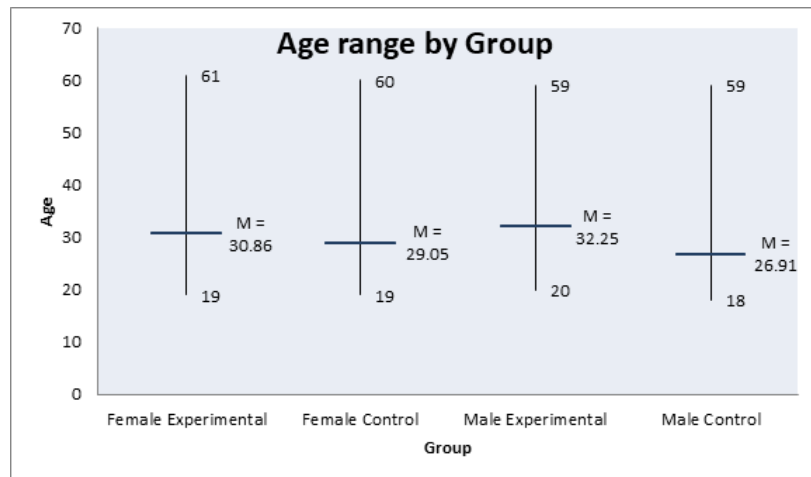


Figure 4: Age Range and Mean by Group

### Analysis

#### ***1. Are there differences in trait appearance comparison and body appreciation for gender and sexuality?***

H1 - There will be significant differences in PACS-R scores between male and female groups.

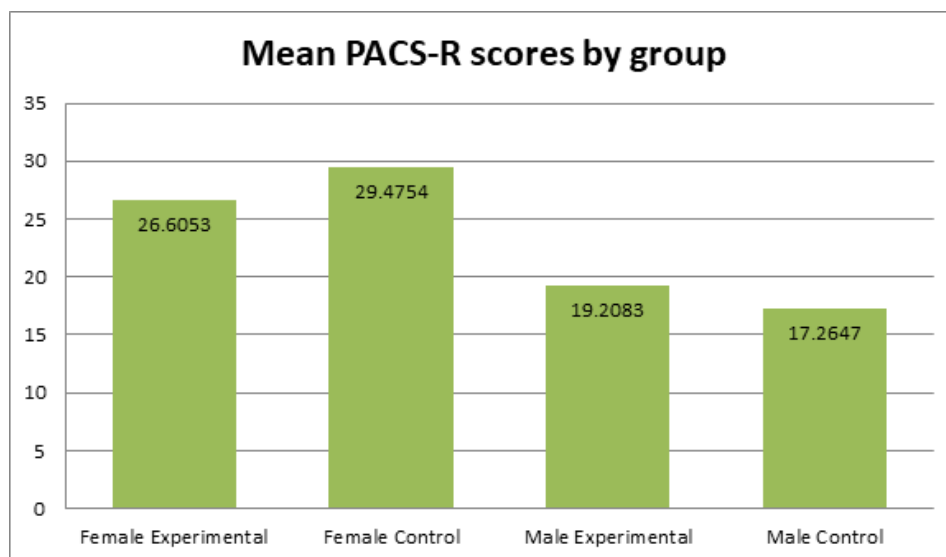


Figure 7: Mean PACS-R scores by gender

An independent-samples t-test was conducted to compare the PACS-R scores for male and female experimental groups. There was a significant difference in scores for the female experimental group ( $M = 26.6053$ ,  $SD = 10.85182$ ) and male

experimental group ( $M = 19.2083$ ,  $SD = 10.63211$ ;  $t(98) = -2.925$ ,  $p = .97$ , two-tailed). The magnitude of the differences in the means (mean difference = 7.39693, 95% CI: -12.41552 to -2.37834) was moderate ( $\eta^2 = 0.08$ ). Therefore, the hypothesis was supported.

An independent-samples t-test was conducted to compare the PACS-R scores for male and female control groups. There was a significant difference in scores for the female experimental group ( $M = 29.4754$ ,  $SD = 10.77436$ ) and male experimental group ( $M = 17.2647$ ,  $SD = 9.01618$ ;  $t(93) = -5.602$ ,  $p = .000$ , two-tailed). The magnitude of the differences in the means (mean difference = 12.21070, 95% CI: -16.53950 to -7.88191) was large ( $\eta^2 = 0.25$ ). Therefore, the hypothesis was supported.

H2 - There will be a significant difference in PACS-R scores across male sexuality groups and no significant difference across female sexuality groups.

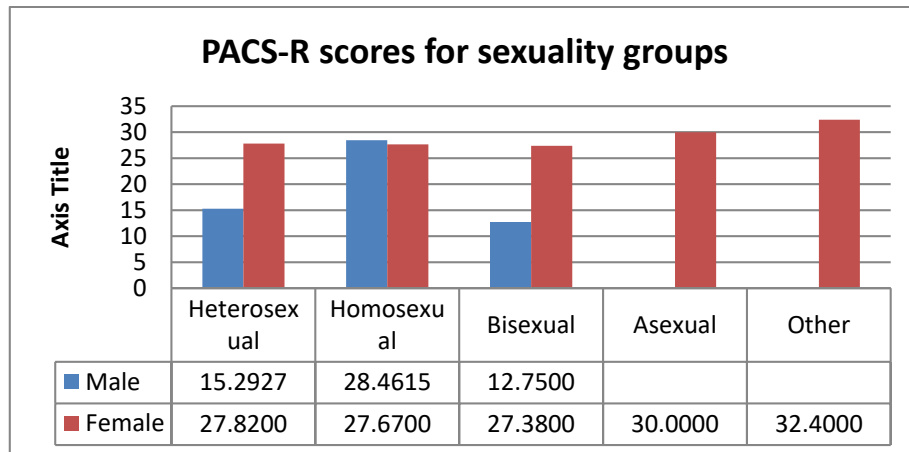


Figure 8: Mean PACS-R scores for male and female sexuality groups

A one-way between-groups analysis of variance was conducted to explore the impact of male sexuality on PACS-R scores. Participants were divided into three groups according to sexuality (Group 1: heterosexual; Group 2: homosexual; Group 3: bisexual). There was a statistically significant difference at the  $p < .05$  level in PACS-R scores for the three sexuality groups:  $F(2, 55) = 14.394$ ,  $p = .000$ . The effect

size, calculated using eta squared, was large at .34. Post-hoc comparisons using the Tukey HSD test indicated that the mean score for heterosexuals ( $M = 15.2927$ ,  $SD = 7.48747$ ) was significantly different from homosexuals ( $M = 28.4615$ ,  $SD = 9.26117$ ). Bisexuals ( $M = 12.7500$ ,  $SD = 8.77021$ ) were significantly different from homosexuals but not heterosexuals. Therefore, the hypothesis was supported for male sexuality.

A one-way between-groups analysis of variance was conducted to explore the impact of female sexuality on PACS-R scores. Participants were divided into five groups according to sexuality (Group 1: heterosexual; Group 2: homosexual; Group 3: bisexual; Group 4: asexual; Group 5; other). There was no statistically significant difference at the  $p < .05$  level in PACS-R scores for the three sexuality groups:  $F(4, 132) = .241$ ,  $p = .915$ . The effect size, calculated using eta squared, was very small at .007. Post hoc tests are not performed for female sexuality. Therefore, the hypothesis was supported for female sexuality.

H3 - There will be significant differences in BAS-2 pre-test scores between male and female groups.

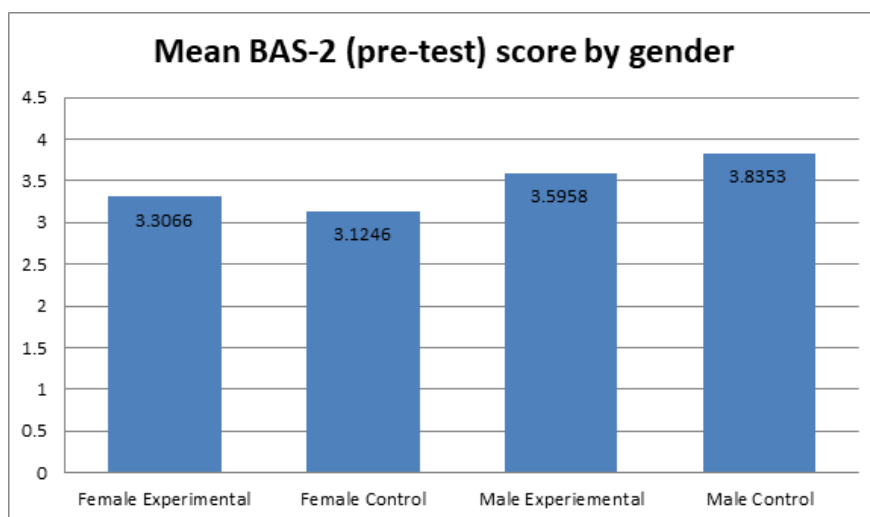


Figure 9: Mean BAS-2 pre-test scores by group

An independent-samples t-test was conducted to compare the pre-test BAS-2 scores for male and female experimental groups. There was no significant difference in scores for the female experimental group ( $M = 3.3066$ ,  $SD = .85328$ ) and male experimental group ( $M = 3.5958$ ,  $SD = .78435$ ;  $t(98) = 1.475$ ,  $p = .14$ , two-

tailed). The magnitude of the differences in the means (mean difference = .28925, 95% CI: -.09995 to .67846) was small (eta squared = 0.02). Therefore the hypothesis was unsupported for the experimental group.

An independent-samples t-test was also conducted to compare the pre-test BAS-2 scores for male and female control groups. There was a significant difference in scores for the female control group ( $M = 3.1246$ ,  $SD = .89604$ ) and male control group ( $M = 3.8353$ ,  $SD = .70233$ ;  $t(98) = 3.989$ ,  $p = .20$ , two-tailed). The magnitude of the differences in the means (mean difference = .71070, 95% CI: .35690 to 1.06451) was large (eta squared = 0.15). Therefore the hypothesis was supported for the control group.

H4 - There will be a significant difference in pre-test BAS-2 scores across sexuality groups.

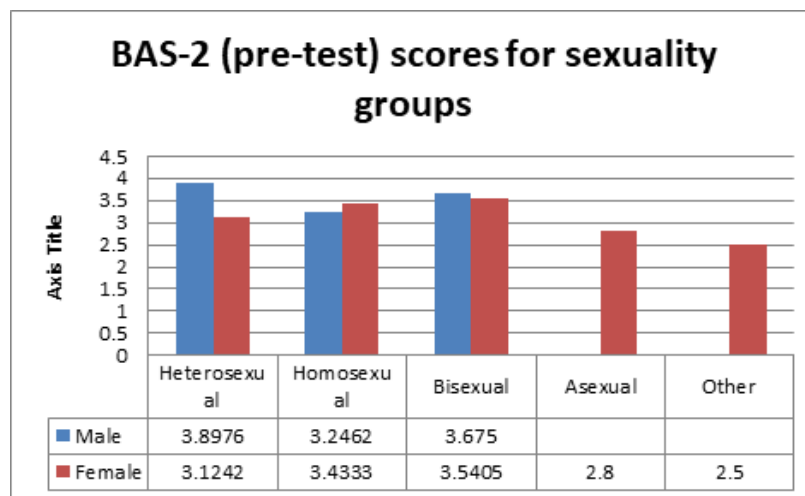


Figure 10: Mean BAS-2 pre-test scores for male and female sexuality

A one-way between-groups analysis of variance was conducted to explore the impact of male sexuality on pre-test BAS-2 scores. Participants were divided into three groups according to sexuality (Group 1: heterosexual; Group 2: homosexual; Group 3: bisexual). There was a statistically significant difference at the  $p < .05$  level in BAS-2 scores for the three sexuality groups:  $F(2, 55) = 4.278$ ,  $p = .019$ . The effect size, calculated using eta squared, was large at .14. Post-hoc comparisons using the

Tukey HSD test indicated that the mean score for heterosexuals ( $M = 3.8976$ ,  $SD = .71396$ ) was significantly different from homosexuals ( $M = 3.2462$ ,  $SD = .72413$ ). Bisexuals ( $M = 3.6750$ ,  $SD = .34034$ ) were not significantly different from homosexuals and heterosexuals. Therefore, the hypothesis was supported for male sexuality.

A one-way between-groups analysis of variance was conducted to explore the impact of female sexuality on pre-test BAS-2 scores. Participants were divided into five groups according to sexuality (Group 1: heterosexual; Group 2: homosexual; Group 3: bisexual; Group 4: asexual; Group 5; other). There was a statistically significant difference at the  $p < .05$  level in BAS-2 scores for the five sexuality groups:  $F(4, 132) = 2.641$ ,  $p = .037$ . The effect size, calculated using eta squared, was small at .07. Post hoc tests were not performed for female sexuality. Therefore, the hypothesis was supported for female sexuality.

## ***2. Do body positive images affect body appreciation in female and male groups differently?***

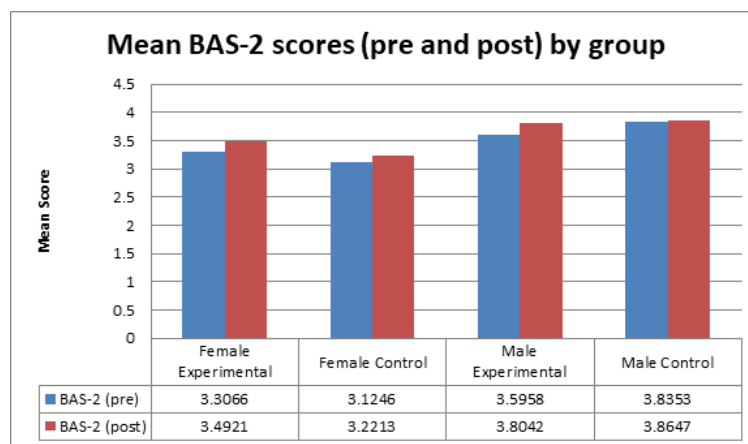


Figure 11: Mean BAS-2 scores (pre and post) by group

H5 - Body positive images will have a significant effect on female scores on the BAS-2 after viewing.

A paired-samples t-test was conducted to evaluate the impact of the intervention on BAS-2 scores for females. There was a statistically significant



increase in BAS-2 scores from Time 1 ( $M = 3.3066$ ,  $SD = .85328$ ) to Time 2 ( $M = 3.4921$ ,  $SD = .89663$ ).  $T(75) = -4.244$ ,  $p < .0005$  (two-tailed). The mean increase in BAS-2 was 0.1855 with a confidence interval ranging from -.27262 to -.09844. The eta squared statistic (0.11) indicated a large effect size. Therefore, the hypothesis was supported.

H6 - Body positive images will have a significant effect on male scores on the BAS-2 after viewing.

A paired-samples t-test was conducted to evaluate the impact of the intervention on BAS-2 scores for males. There was a statistically significant increase in BAS-2 scores from Time 1 ( $M = 3.5958$ ,  $SD = .78435$ ) to Time 2 ( $M = 3.8042$ ,  $SD = .80568$ ).  $T(23) = -2.781$ ,  $p < .0005$  (two-tailed). The mean increase in BAS-2 was 0.2084 with a confidence interval ranging from -.36332 to -.05335. The eta squared statistic (0.14) indicated a large effect size. Therefore, the hypothesis was supported.

H7 - Control images will not have a significant effect on BAS-2 scores after viewing for males and females control groups.

A paired-samples t-test was conducted to evaluate the impact of control images on BAS-2 scores for females. There was a no statistically significant difference in BAS-2 scores from Time 1 ( $M = 3.1246$ ,  $SD = .89604$ ) to Time 2 ( $M = 3.2213$ ,  $SD = .95116$ ).  $T(60) = -2.231$ ,  $p < .0005$  (two-tailed). The mean increase in BAS was 0.0967 with a confidence interval ranging from -.18344 to -.01000. The eta squared statistic (0.04) indicated a small effect size. Therefore, the hypothesis was supported for females.

A paired-samples t-test was conducted to evaluate the impact of control images on BAS-2 scores for males. There was a no statistically significant difference in BAS-2 scores from Time 1 ( $M = 3.8353$ ,  $SD = .70233$ ) to Time 2 ( $M = 3.8647$ ,  $SD = .74218$ ).  $T(33) = -.675$ ,  $p < .0005$  (two-tailed). The mean increase in BAS was 0.0294

with a confidence interval ranging from  $-.11807$  to  $.05925$ . The eta squared statistic ( $0.01$ ) indicated a small effect size. Therefore, the hypothesis was supported for males.

H8 - There will be a significant difference between post-test BAS-2 scores of the experimental group and control group for both females and males

An independent-samples t-test was conducted to compare the post-test BAS-2 scores of females in the experimental group and females in the control group. There was no significant difference in scores for the experimental group ( $M = 3.4921$ ,  $SD = .89663$ ) and control group ( $M = 3.2213$ ,  $SD = .95116$ ;  $t(135) = 1.71$ ,  $p = .09$ , two-tailed). The magnitude of the differences in the means (mean difference =  $0.27$ ,  $95\%$  CI:  $-.042$  to  $.58$ ) was small (eta squared =  $0.02$ ). Therefore, the hypothesis was not supported for females.

An independent-samples t-test was conducted to compare the post-test BAS-2 scores for males in the experimental group and males in the control group. There was no significant difference in scores for the experimental group ( $M = 3.8042$ ,  $SD = .80568$ ) and control group ( $M = 3.8647$ ,  $SD = .74218$ ;  $t(56) = -.295$ ,  $p = .77$ , two-tailed). The magnitude of the differences in the means (mean difference =  $0.06$ ,  $95\%$  CI:  $-.47$  to  $.35$ ) was very small (eta squared =  $0.002$ ). Therefore, the hypothesis was not supported for males.

H9 - There will be significant differences between experimental and control group post-test scores on the BAS-2 for males and females.

An independent-samples t-test was conducted to compare the post-test BAS-2 scores for male and female experimental groups. There was no significant difference in scores for the female experimental group ( $M = 3.4921$ ,  $SD = .89663$ ) and male experimental group ( $M = 3.8042$ ,  $SD = .80568$ ;  $t(98) = 1.521$ ,  $p = .13$ , two-tailed). The magnitude of the differences in the means (mean difference =  $0.31206$ ,

95% CI: -.09504 to .71916) was small ( $\eta^2 = 0.02$ ). Therefore, the hypothesis was not supported for the experimental groups.

An independent-samples t-test was conducted to compare the post-test BAS-2 scores for male and female experimental groups. There was a significant difference in scores for the female control group ( $M = 3.2213$ ,  $SD = .95116$ ) and male control group ( $M = 3.8647$ ,  $SD = .74218$ ;  $t(98) = 3.406$ ,  $p = .16$ , two-tailed). The magnitude of the differences in the means (mean difference = .64339, 95% CI: .26825 to 1.01854) was large ( $\eta^2 = 0.11$ ). Therefore, the hypothesis was supported for the control groups.

H10 - There will be significant differences between pre and post BAS-2 scores across sexuality.

Figure 12 summarizes the mean BAS-2 pre-test scores for experimental male and female group across sexuality. Individual summaries (Figure 13, 14, 15, and 16) are found in Appendix J.

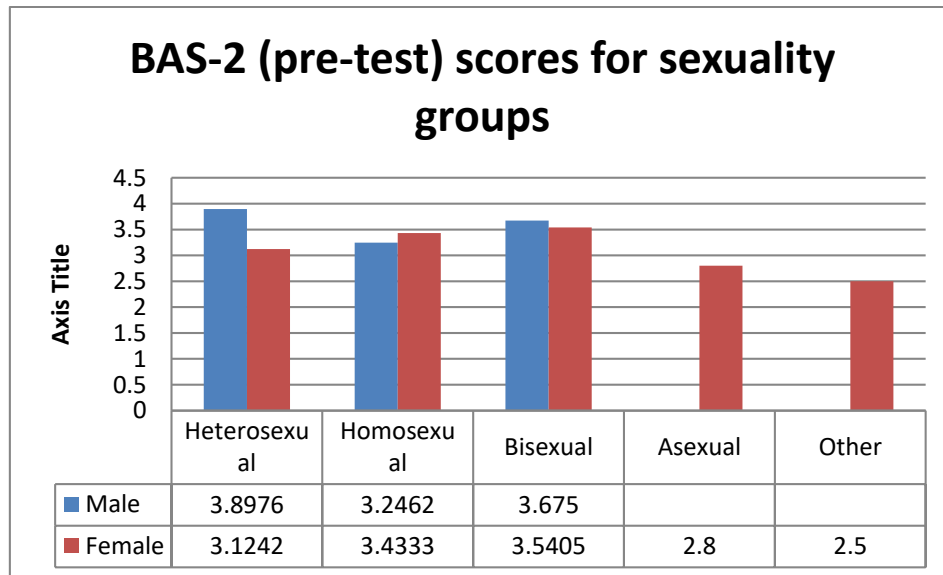


Figure 12: Mean BAS-2 pre-test scores for experimental male and female sexuality

Paired-samples t-tests were conducted to evaluate the impact of body positive images on the BAS-2 across sexuality. There was a statistically significant increase for heterosexuals from Time 1 ( $M = 3.3644$ ,  $SD = .88102$ ) to Time 2 ( $M =$

3.5114, SD = .90585),  $t(131) = -5.123$ ,  $p < .0005$  (two-tailed). The mean increase in BAS-2 scores was .147 with a 95% confidence interval ranging from -.20372 to -.09022. The eta squared statistic (0.09) indicated a moderate effect size. There was a statistically significant increase for homosexuals from Time 1 ( $M = 3.2812$ , SD = .67845) to Time 2 ( $M = 3.4625$ , SD = .82209),  $t(15) = -1.714$ ,  $p < .0005$  (two-tailed). The mean increase in BAS-2 scores was .181 with a 95% confidence interval ranging from -.40667 to .04417. The eta squared statistic (.09) indicated a moderate effect size. There was a statistically significant increase for bisexuals from Time 1 ( $M = 3.5537$ , SD = .79439) to Time 2 ( $M = 3.6537$ , SD = .80128),  $t(40) = -1.637$ ,  $p < .0005$  (two-tailed). The mean increase in BAS-2 scores was 0.1 with a 95% confidence interval ranging from -.22346 to .02346. The eta squared statistic (.03) indicated a small effect size. Therefore, the hypothesis was supported.

H11 - There will be significant differences between post BAS-2 scores across sexuality groups.

A one-way between-groups analysis of variance was conducted to explore the impact of male sexuality on post-test BAS-2 scores. Participants were divided into three groups according to sexuality (Group 1: heterosexual; Group 2: homosexual; Group 3: bisexual). There was no statistically significant difference at the  $p < .05$  level in BAS-2 scores for the three sexuality groups:  $F(2, 55) = 2.524$ ,  $p = .089$ . The effect size, calculated using eta squared, was medium at .084. Post-hoc comparisons using the Tukey HSD test indicated that the mean score for heterosexuals ( $M = 3.9780$ , SD = .73298), homosexuals ( $M = 3.4615$ , SD = .85102), and bisexuals ( $M = 3.6500$ , SD = .25166) were not significantly different. Therefore, the hypothesis was not supported for male sexuality.

A one-way between-groups analysis of variance was conducted to explore the impact of female sexuality on post-test BAS-2 scores. Participants were divided into five groups according to sexuality (Group 1: heterosexual; Group 2: homosexual; Group 3: bisexual; Group 4: asexual; Group 5; other). There was a statistically significant difference at the  $p < .05$  level in BAS-2 scores for the five sexuality groups:

$F(4, 132) = 2.664, p = .035$ . The effect size, calculated using eta squared, was small at .07. Therefore, the hypothesis was supported for female sexuality.

**3. Is there a relationship between trait physical appearance social comparison and body appreciation?**

H12- There will be a negative correlation between PACS-R scores and BAS-2 scores (pre and post).

The relationship between physical appearance social comparison (as measured by the PACS-R) and body appreciation (as measured by the BAS-2) was investigated using Pearson correlation coefficient. Preliminary analyses were performed to ensure no violation of the assumptions of normality, linearity and homoscedasticity. There was a strong, negative correlation between the PACS-R and pre-test BAS-2 scores,  $r = -0.54, n = 195, p < .0005$ , with high levels of physical appearance social comparison associated with lower levels of body appreciation pre-test. Interestingly, the correlation to PACS-R scores and post-test BAS-2 scores after the intervention reduced with a medium, negative correlation between the two variables,  $r = -0.448, n = 195, p < .0005$ . Therefore, the hypothesis was supported.

**Pearson Correlations**

	1. PAC-R	2. BAS-2 (pre)	3. BAS-2 (post)
1. PACS-R	-	-.537	-.448*
2. BAS-2 (pre)		-	.905**
3. BAS-2 (post)			-

Table 1: Pearson Correlations between PACS-R and BAS-2 (pre and post)

H13 - PACS-R scores will predict significant amounts of variance in BAS-2 scores

A multiple linear regression was calculated to predict BAS-2 scores based on PACS-R scores and images. The results of the regression indicated that the model explained 35% of the variance and that the model was a significant predictor of BAS-2 scores ( $F(4,190) = 26.281, p < .000$ ), with an  $R^2$  of .356. Therefore, the hypothesis was supported.

# Discussion

## Key Findings

The first aim of the study was to investigate the differences in appearance comparison and body appreciation across gender and sexuality. There was a significant difference between male and female trait appearance comparison, with women scoring higher than men. These findings support the evidence that women tend to make more upward appearance-related comparisons than men (Strahan, Wilson, Cressman, & Buote, 2006). Across female sexuality, there were no significant differences in trait appearance comparison, which lends support to the idea that females are equally susceptible to making appearance comparisons, independent of sexuality (Smith et al., 2017). In contrast, the analysis showed significant differences across male sexuality, whereby homosexual men were higher in appearance comparison compared to heterosexual and bisexual men. These findings support Griffith et al. (2018) in that sexual minority men are just as vulnerable to making appearance-based comparisons as women. On average, men scored higher than women in trait body appreciation, however this difference was only significant in the control group and not in the experimental. Across male sexuality, heterosexual men scored significantly higher body appreciation than homosexual men, and bisexual men were not significantly different from either. Across female sexuality, there was a small but significant difference in body appreciation.

The second aim of the study was to examine the impact of body positive images on body appreciation for women and men. On average, body appreciation increased in all groups between pre-test and post-test measures. For both males and females, there was a significant increase in body appreciation after exposure to body positive images, and no significant difference in the control group. Comparisons between post-test body appreciation scores of the experimental and control groups indicated that there was no significant difference. An analysis of the impact of body positive images across sexuality groups revealed significant increases in body

appreciation after exposure. There was a statistically moderate increase for heterosexuals and homosexuals, and small increase among bisexuals between pre and post-test measures. Across male sexuality, there was no significant difference in body appreciation after exposure. In contrast, there was a significant, yet small, difference in body appreciation across female sexuality. This demonstrates that body positive content is an effective means of improving body appreciation that is sensitive to the differences in sexuality and gender.

Finally, the third aim of the study was to investigate the relationship between body appreciation and appearance comparisons. A strong, negative correlation was found between appearance comparison and body appreciation whereby higher trait appearance comparison was associated with lower body appreciation scores. Furthermore, the correlation between appearance comparison and appearance comparison reduced after exposure to body positive images. These results demonstrate the key role of appearance comparisons in body image satisfaction.

### **Theoretical Contributions and Practical Implications**

Firstly, while Myers and Crowther (2009) found social comparison to be related to higher levels of body dissatisfaction, this study is the first to demonstrate an association between trait appearance comparison with lower levels of body appreciation. Additionally, the study contributed important differences in trait appearance comparison and trait body appreciation across gender and sexuality. Therefore, researchers and clinicians should be cognizant of these factors when investigating body image.

Secondly, the outcomes of the study provide further support for Cohen et al. (2019) findings that body positive content can benefit body appreciation in women, and extends this finding to a similar impact on men. Therefore, those who are vulnerable to making appearance comparisons should consider following body



positive accounts to benefit from the protective effects of body appreciation (Paraskeva et al., 2017).

### **Strengths and Limitations**

This study is the first to examine differences in appearance comparison and body appreciation for both gender and sexuality groups. The strengths lie in the factorial, experimental design which demonstrated the effect of body positive images on body appreciation across multiple factors, such as gender, sexuality, and trait appearance comparison. Additionally, the BAS-2 and PACS-R both have good reliability and validity across gender, culture, ethnicity, and sexuality (Tylka & Barcalow, 2015; Schaefer & Thompson, 2013).

The study was limited by a small male sample and a lack of diversity in sexual orientation in order for findings to be conclusive and generalizable. Practice effects of the repeated BAS-2 measure may have influenced body appreciation scores to increase in both the experimental and control groups. The small effect size of the impact of body positive images on body appreciate may have resulted from a lack of control over the time spent viewing the images. Finally, the scope of the study is limited by the non-inclusion of body satisfaction measures which means the effect of body positive images cannot be generalized to the body image construct as a whole.

### **Future Directions**

Future studies should also aim to investigate the ability of body positive content to reduce trait social comparison as a result of broadening conceptualisations of beauty. Additionally, the impact of other body positive content such as art images, quotes, and memes should also be investigated. A qualitative design would be preferable in order to investigate the direction of appearance comparisons made to body positive images, and a longitudinal approach is needed to understand how long these effects on body appreciation last. Moreover, it is recommended that research be conducted in the social media setting in order to

examine the potency of body positive content despite the real-life abundance of idealized images. As elucidated by the literature, body image concerns have intensified since the rise of social media. Therefore, it is important that body image research go beyond the effects of image exposure and take into consideration other impacts of social media use such as taking, editing, and posting images of oneself, as well as the effects of interacting with other users online.

### **Conclusion**

In conclusion, women and sexual minority men are particularly vulnerable to making appearance comparisons which impacts their body image. Fortunately, body positive content has the potential to broaden conceptualisations of beauty which can influence how individuals compare themselves to others. As an inexpensive and widely accessible means of fostering body appreciation, body positivity can help protect those who are especially vulnerable to making appearance comparisons against body dissatisfaction. Therefore, body positive images can increase body appreciation in men and women.

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## Appendix A: Information sheet

**Study Title:** The effects of Instagram images on self-perceptions

### **Purpose of the Research**

Research shows that traditional media images can powerfully influence our self-perceptions. However, since the rise of social networking sites such as Instagram, people are being exposed to new types of images not otherwise found in traditional media. More research is needed to understand how exposure to these images found on social networking sites influence the way we think about ourselves. Therefore, the aim of this study is to investigate the effect of Instagram content related to popular hashtags on self-perceptions.

### **Invitation**

You are being invited to consider taking part in this research study. This project is being undertaken by Lara Visser in order to achieve a Masters in Cyberpsychology from IADT and has received ethical approval from DTPEC Before you decide whether or not you wish to take part, it is important for you to understand why this research is being done and what it will involve. Please take time to read this information carefully and discuss it with friends and relatives if you wish. Ask us if there is anything that is unclear or if you would like more information contact email: laravisser92@gmail.com or mobile number +353833075973. This study has been approved by the IADT Institute Research Ethics Committee.

### **Do I have to take part?**

You are free to decide whether you wish to take part or not. If you do decide to take part you will be asked to indicate your consent through completion of a short form. You are free to withdraw from this study at any time and without giving reasons. If you experience any negative emotions it is recommended that you discontinue participating in the research.

**If I take part, what do I have to do?**

You will be asked to complete a series of forms, some of which may include questions of a sensitive nature. You will also be asked to view a set of 20 images. At the end of the study you will be informed of the exact details of the study's purposes.

**The study can be broken down into the following steps:**

1. A consent form and background questionnaire (2 minutes).
2. Questionnaire 1 (2 minutes)
3. View a set of 20 images (2 minutes).
4. Questionnaire 2 (3 minutes)
5. Debrief (>1 minute).

**Total time: ±10 minutes**

**What are the benefits and risks (if any) of taking part?**

You may feel uncomfortable answering some questions as they may be of a sensitive nature. Additionally, the images may temporarily influence your self-perceptions. However, the researcher strongly believes that the risk of taking part of this study is negligible.

**How will information about me be used and who will have access to it?**

Your anonymity in the raw data will be ensured through the using of coding and you will remain unidentifiable. Your data will only be accessible to the researcher and supervisor of this project. Your data will be kept confidential and secure on a password locked computer. Your data will be retained for a period of at least one year. If the study is to be published your data will be kept for a period of five years. Afterwards, your data will be destroyed and will not be used for future studies. These results will be used to complete a thesis in fulfilling the requirements of a Masters in Cyberpsychology at Dun Laoghaire Institute of Art, Design &

Technology. If the study is published, you will be notified and given access to the published paper.

**What if there is a problem?**

If you have a concern about any aspect of this study, or if you feel any overwhelming negative emotions, you may wish to speak to the researchers who will do their best to answer your questions or provide you with the necessary assistance. You should contact Lara Visser, mobile: +353833075973, email address: [laravisser92@gmail.com](mailto:laravisser92@gmail.com) or their supervisor Liam Challenor at [liam.challenor@dcu.ie](mailto:liam.challenor@dcu.ie)

**Thank you**

## Appendix B: Consent form

Please tick the following boxes:

	I confirm that I have read and understand the information sheet for the above study and have had the opportunity to ask questions.
	I understand that my participation is voluntary and that I am free to withdraw at any time.
	I am over the age of 18 years and I agree to take part in this study.

## Appendix C: Demographic questionnaire

DIRECTIONS: Please answer each question as accurately as possible.

1. What is your age? \_\_\_\_\_
2. What is your ethnic background? \_\_\_\_\_
3. What is your nationality? \_\_\_\_\_
4. What is your gender identity?
  - ☐ Female
  - ☐ Male
  - ☐ Other
5. What is your sexual orientation?
  - ☐ Heterosexual
  - ☐ Homosexual
  - ☐ Bisexual
  - ☐ Asexual
  - ☐ Other

## Appendix D: The Physical Appearance Comparison Scale - Revised (PACS-R)

Instructions: For each item, please circle the number that best characterizes your attitudes or behaviours using the following scale:

Never	Seldom	Sometimes	Often	Always
0	1	2	3	4

1. When I'm out in public, I compare my physical appearance to the appearance of others.

0    1    2    3    4

2. When I meet a new person (same sex), I compare my body size to his/her body size.

0    1    2    3    4

3. When I'm at work or school, I compare my body shape to the body shape of others.

0    1    2    3    4

4. When I'm out in public, I compare my body fat to the body fat of others.

0    1    2    3    4

5. When I'm shopping for clothes, I compare my weight to the weight of others.

0    1    2    3    4

6. When I'm at a party, I compare my body shape to the body shape of others.

0    1    2    3    4

7. When I'm with a group of friends, I compare my weight to the weight of others.

0      1      2      3      4

8. When I'm out in public, I compare my body size to the body size of others.

0      1      2      3      4

9. When I'm with a group of friends, I compare my body size to the body size of others.

0      1      2      3      4

10. When I'm eating in a restaurant, I compare my body fat to the body fat of others.

0      1      2      3      4

11. When I'm at the gym, I compare my physical appearance to the appearance of others.

0      1      2      3      4



## Appendix E: Body Appreciation Scale - 2 (BAS-2)

Instructions: For each item, please circle the number that best characterizes your attitudes or behaviours using the following scale:

Never	Seldom	Sometimes	Often	Always
0	1	2	3	4

1. I respect my body:

1	2	3	4	5
---	---	---	---	---

2. I feel good about my body:

1	2	3	4	5
---	---	---	---	---

3. I feel that my body has at least some good qualities

1	2	3	4	5
---	---	---	---	---

4. I take a positive attitude towards my body

1	2	3	4	5
---	---	---	---	---

5. I am attentive to my body's needs

1	2	3	4	5
---	---	---	---	---

6. I feel love for my body

1	2	3	4	5
---	---	---	---	---

7. I appreciate the different and unique characteristics of my body

1	2	3	4	5
---	---	---	---	---

8. My behaviour reveals my positive attitude toward my body; for example, I walk holding my head high and smiling.

1      2      3      4      5

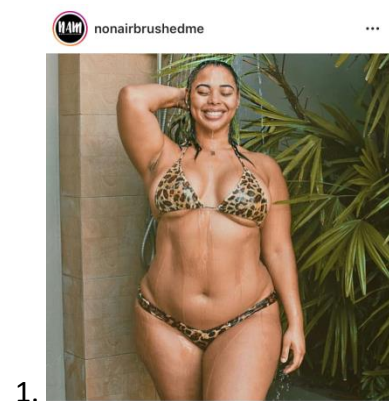
9. I am comfortable in my body.

1      2      3      4      5

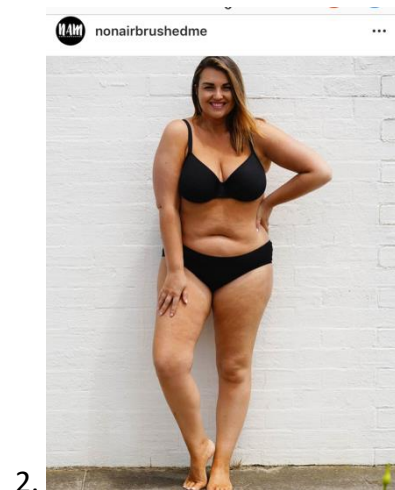
10. I feel like I am beautiful even if I am different from media images of attractive people (e.g., models, actresses/actors).

1      2      3      4      5

## Appendix F: female body positive mages



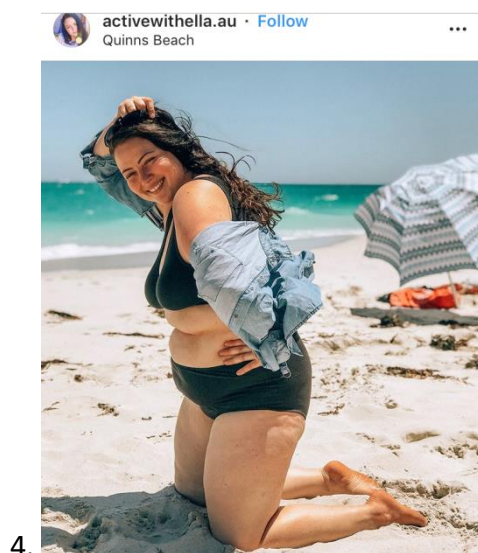
Tabria posing under a shower next to plants. (2018). [image] Available at:  
[https://instagram.com/p/BqasZtkFb\\_9/](https://instagram.com/p/BqasZtkFb_9/) [Accessed 28 Nov. 2018]



Amber posing in front of white wall. (2018). [image] Available at:  
<https://instagram.com/p/BqmmkZPFu13/> [Accessed 28 Nov. 2018].



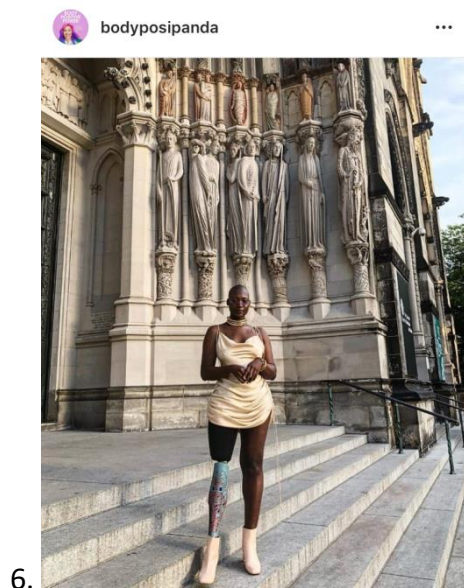
Clare's comfortable selfie. (2018). [image] Available at:  
<https://instagram.com/p/BfZqqM4hLhA/> [Accessed 28 Nov. 2018].



Ella in a bikini and denim jacket on a windy beach. (2018). [image] Available at:  
[https://instagram.com/p/BqMjsu\\_Abgr/](https://instagram.com/p/BqMjsu_Abgr/) [Accessed 28 Nov. 2018].



Michelle wearing a sports bra and flexing in front of buildings. (2018). [image]  
Available at: <https://instagram.com/p/BoUSQ5QFT-U/> [Accessed 28 Nov. 2018].



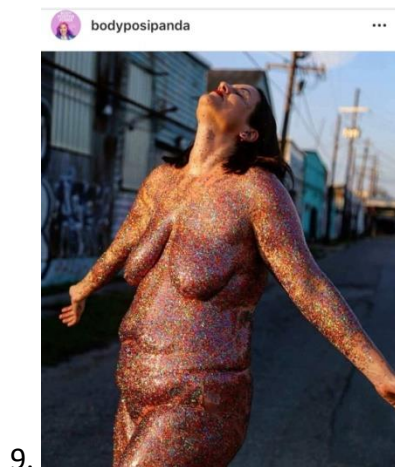
Cax is standing in a champagne minidress and pink boots. (2018). [image] Available  
at: <https://instagram.com/p/BkszoHVnFDR/> [Accessed 28 Nov. 2018].



Lara stands in grand Las Vegas lobby. (2018). [image] Available at: <https://instagram.com/p/BimzAycAf7o/> [Accessed 28 Nov. 2018].



Erin wears blue shoes and poses against a wall in her wheelchair. (2018). [image] Available at: <https://instagram.com/p/BgegkkWAdOc/> [Accessed 28 Nov. 2018]



Model covered in glitter. (2018). [image] Available at: <https://instagram.com/p/BfYyQMMFOWu/> [Accessed 28 Nov. 2018]



10.

Lee covers up and smiles on a beach. (2018). [image] Available at:  
<https://instagram.com/p/BdvbjZzlNb2/> [Accessed 28 Nov. 2018]



11.

Diverse ladies pose laughing in bralettes. (2018). [image] Available at:  
<https://instagram.com/p/BbP6NzElJuB/> [Accessed 28 Nov. 2018]



12.

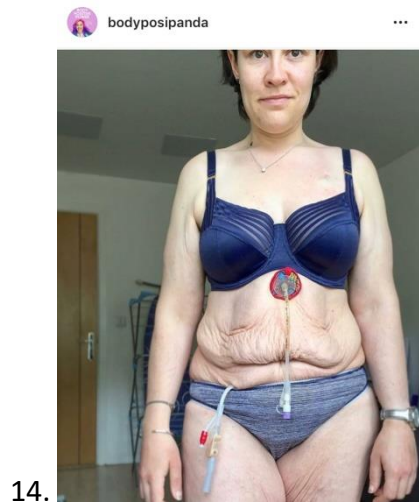
Sara surrounded by sunflowers. (2018). [image]  
Available at: <https://instagram.com/p/BY6hOj1Bl5I/> [Accessed 28 Nov. 2018]





Jessamyn on a bridge. (2018). [image] Available at:

[https://instagram.com/p/BX\\_MKBDP6o/](https://instagram.com/p/BX_MKBDP6o/) [Accessed 28 Nov. 2018]



Imogen shows off her scars. (2018). [image] Available at:

<https://instagram.com/p/BU-DVeJhflU/> [Accessed 28 Nov. 2018]





15.

Jasmine with an idgaf attitude (2018). [image] Available at:

<https://instagram.com/p/BUKrxQxhNYI/> [Accessed 28 Nov. 2018]



16.

Anni untouched in a light pink bikini(2018). [image] Available at:

<https://instagram.com/p/Bo4RySxgRdB/> [Accessed 28 Nov. 2018]



17.

Allison in a floral two piece bathing suit. (2018). [image] Available at:  
<https://instagram.com/p/Bo-SorNHTHq/> [Accessed 28 Nov. 2018]



18.

Sarah feeling happy in her skin. (2018). [image] Available at:  
<https://instagram.com/p/BqnzaUjZ/> [Accessed 28 Nov. 2018]



19.

Model confidently shows off skin condition. (2018). [image] Available at:  
<https://instagram.com/p/BqTFJnFh6CX/> [Accessed 28 Nov. 2018]



20.

Kenzie taking a mirror selfie in her bedroom. (2018). [image] Available at:  
<https://instagram.com/p/Bj5TIFLAGUU/> [Accessed 28 Nov. 2018]

## Appendix G: male body positive images



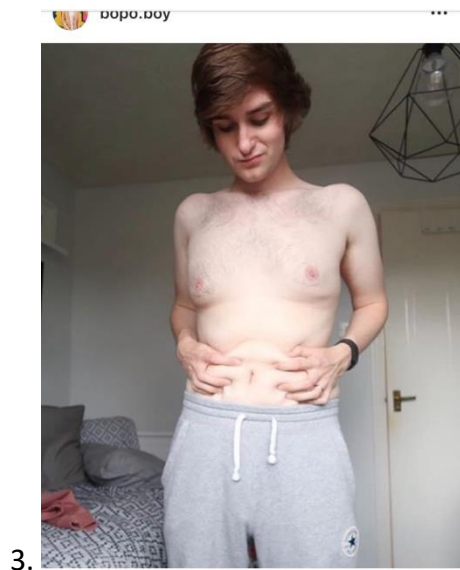
1.

Tevin sits on the floor with an open shirt. (2018). [image] Available at: <https://instagram.com/p/BoRKYdZnjFb/> [Accessed 28 Nov. 2018]



2.

TGIF Oz. (2018). [image] Available at: <https://instagram.com/p/BqPs67VgyUR/> [Accessed 28 Nov. 2018]



Stevie embracing his squishy belly. (2018). [image] Available at:  
<https://instagram.com/p/BpSpOg6AtaY/> [Accessed 28 Nov. 2018]



Rishi demonstrates changing bodies. (2018). [image] Available at:  
<https://instagram.com/p/BlbHDpBn7OG/> [Accessed 28 Nov. 2018]



5.

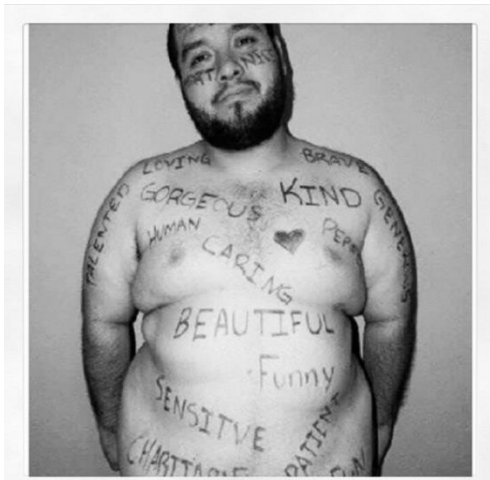
Benjamin enjoying the perfect beach day. (2018). [image] Available at: [https://instagram.com/p/BkG3\\_ozH7dE/](https://instagram.com/p/BkG3_ozH7dE/) [Accessed 28 Nov. 2018]



6.

Eleven men show different body types to model underwear, (2018). [image] Available at: <https://instagram.com/p/BmOKu8Wglyx/> [Accessed 28 Nov. 2018]





7.

Man poses with writing on his body. (2018). [image] Available at:  
<https://instagram.com/p/1JQEXLkbl2/> [Accessed 28 Nov. 2018]



8.

Bryan takes a mirror selfie in shorts. (2018). [image] Available at:  
<https://instagram.com/p/BKKRZC5gOZd/> [Accessed 28 Nov. 2018]



What society sees versus what I see. (2018). [image] Available at:  
<https://instagram.com/p/BhpskdQHEjl/> [Accessed 28 Nov. 2018]



Black and white open shirt. (2018). [image] Available at:  
<https://instagram.com/p/Bg98ZRuFgss/> [Accessed 28 Nov. 2018]





bodyposipanda



11.

Kelvin sits with his feet in a pool. (2018). [image] Available at:  
<https://instagram.com/p/BTj2eYslOwF/> [Accessed 28 Nov. 2018]



bigandblunt · Follow



12.

Shirtless for the water roller coaster. (2018). [image] Available at:  
[https://instagram.com/p/BG3GB\\_KxRxY/](https://instagram.com/p/BG3GB_KxRxY/) [Accessed 28 Nov. 2018]



13.

Man poses with hands in pockets. (2018). [image] Available at:  
<https://instagram.com/p/BhLmTOZhCxx/> [Accessed 28 Nov. 2018]



14.

Tyler feeling beautiful. (2018). [image] Available at:  
<https://instagram.com/p/Bi7TIZTgp7s/> [Accessed 28 Nov. 2018]



15.

TruthorDereck in green jacket jacket, shorts, and sneakers. (2018). [image] Available at: <https://instagram.com/p/BjVZ93OgXKG/> [Accessed 28 Nov. 2018]



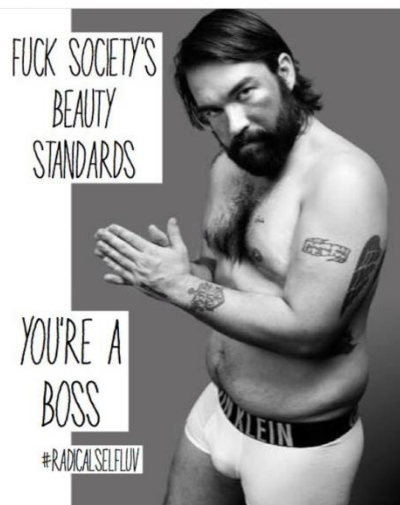
16.

Bopoman smiling in denim shorts. (2018). [image] Available at: <https://instagram.com/p/BmmCmHenQ2w/> [Accessed 28 Nov. 2018]



17.

Man with angel wings and halo graffiti.(2018). [image] Available at:  
<https://instagram.com/p/Bhbv7LznQOE/> [Accessed 28 Nov. 2018]



18.

You're a boss. (2018). [image] Available at: <https://instagram.com/p/BgMLMbHjs8J/>  
[Accessed 28 Nov. 2018]



19.

Different body types at different ages. (2018). [image] Available at: <https://instagram.com/p/Bg4g6LPImwb/> [Accessed 28 Nov. 2018]

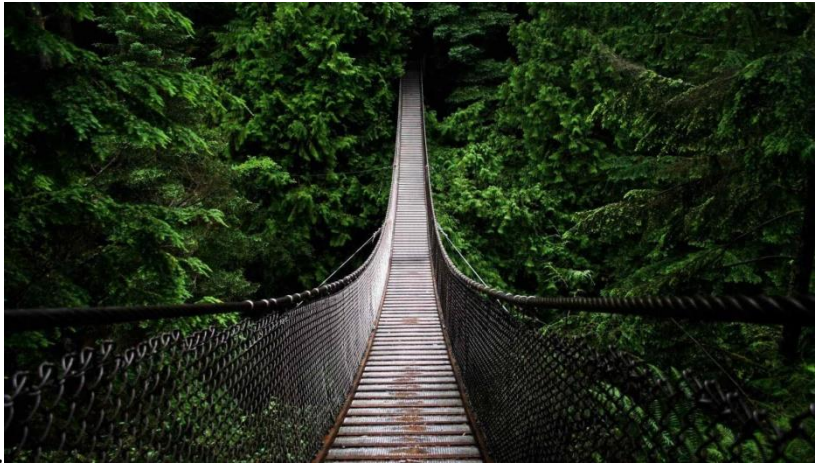


20.

Body mirror selfie. (2018). [image] Available at: [https://www.instagram.com/p/Br-zR0AF\\_Nr/?utm\\_source=ig\\_share\\_sheet&igshid=gfu7r1n34w40](https://www.instagram.com/p/Br-zR0AF_Nr/?utm_source=ig_share_sheet&igshid=gfu7r1n34w40) [Accessed 29 Dec. 2018]



## Appendix H: Control images



1.

Suspension bridge in forest. (2018). [image] Available at: <https://www.hd-wallpapersdownload.com/script/new-wallpaper/desktop-free-nature-hd-wallpaper-download.jpg> [Accessed 28 Nov. 2018]



2.

Lake cloud reflections. (2018). [image] Available at: <http://www.cicc.ca/wp-content/uploads/2013/10/best-of-nature-widescreen-in-resolution1.jpg> [Accessed 28 Nov. 2018]



3.

Small forest waterfall (2018). [image] Available at: [http://explorewestcork.ie/wp-content/uploads/2015/02/Glengarriff\\_nature-reserve-474x194.jpg](http://explorewestcork.ie/wp-content/uploads/2015/02/Glengarriff_nature-reserve-474x194.jpg) [Accessed 28 Nov. 2018]



4.

Scenic lake with forest and blue mountain. (2018). [image] Available at:  
<https://rwallpapers.com/wp-content/uploads/2018/05/Beacch-Wallpaper-Nature-Hd-Free-Download-From-rwallpapers.jpg> [Accessed 28 Nov. 2018]



5.

Green forest trees with sunlight filtering through. (2018). [image] Available at:  
<https://thewallpaper.co/nature-backgrounds-view-amazing-landscape-widescreen-mac-desktop-images-free-nature-images-download-nature-wallpapers-download-images-1206x722/> [Accessed 28 Nov. 2018]



6.



Canyon sunset. (2018). [image] Available at: <https://static.independent.co.uk/s3fs-public/thumbnails/image/2017/07/29/11/the-grand-canyon-arizona-usa.jpg>  
[Accessed 28 Nov. 2018]



7.

Autumn tree colours. (2018). [image] Available at:  
<https://www.aaronreedphotography.com/images/640/Dragons-Breath-1800.jpg>  
[Accessed 28 Nov. 2018]



8.

Sunflowers at sunset. (2018). [image] Available at: <https://cpb-us-w2.wpmucdn.com/blogs.egusd.net/dist/0/713/files/2013/05/nature-photography-fields-sunflowers-yellow-flowers-1mi99dn.jpg> [Accessed 28 Nov. 2018]





9.

African sunset. (2018). [image] Available at:

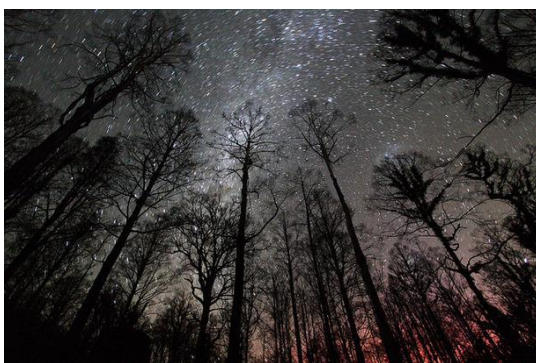
[https://c2.staticflickr.com/2/1467/25292000313\\_3ca22bf530\\_b.jpg](https://c2.staticflickr.com/2/1467/25292000313_3ca22bf530_b.jpg) [Accessed 28 Nov. 2018]



10.

Blue and white flowers with snowy mountains. (2018). [image] Available at:

<https://agc.creativelive.com/agc/courses/5521-1.jpg> [Accessed 28 Nov. 2018]



11.

Trees looking up at the Milky Way. (2018). [image] Available at:

<https://favim.com/610/201107/15/Favim.com-black-and-white-dark-photography-sky-starsm-forest-trees-106053.jpg> [Accessed 28 Nov. 2018]



12.

Mist autumn reindeer. (2018). [image] Available at:

<https://cadinalvarado2.files.wordpress.com/2015/01/alex9.jpg> [Accessed 28 Nov. 2018]



13.

Snowy mountains and lake reflection. (2018). [image] Available at: <http://urdu-mag.com/blog/wp-content/uploads/2013/01/nature-photography-004.jpg> [Accessed 28 Nov. 2018]



14.

Tranquil green pool. (2018). [image] Available at:

<https://wallpapercave.com/wp/wp3100680.jpg> [Accessed 28 Nov. 2018]



15.

Big waterfall view. (2018). [image] Available at:

<https://images.pexels.com/photos/414061/pexels-photo-414061.jpeg?auto=compress&cs=tinysrgb&h=350> [Accessed 28 Nov. 2018]



16.

(2018). [image] Available at:

<https://cdn.cnn.com/cnnnext/dam/assets/140420205944-02-stunning-nature---glowing-plankton---restricte.jpg> [Accessed 28 Nov. 2018]





17.

Looking through trees at the sun. (2018). [image] Available at: <http://dmg.ma/wp-content/uploads/2017/07/nature-dmg.jpg> [Accessed 28 Nov. 2018]



18.

Scotland nature. (2018). [image] Available at: <https://historiek.net/wp-content/uploads-phistor1/2017/11/The-Flower-of-Scotland-het-onoffici%C3%A4le-volkslied-van-Schotland-cc-Pixabay-750x480.jpeg> [Accessed 28 Nov. 2018]

19.



Blue beach sunset. (2018). [image] Available at:

<https://eng.naturstyrelsen.dk/media/232793/fanoe.png?width=678> [Accessed 28 Nov. 2018]

20.



Orange forest road. (2018). [image] Available at:

[https://adminassets.devops.arabiaweather.com/sites/default/files/autumn\\_road.jpg](https://adminassets.devops.arabiaweather.com/sites/default/files/autumn_road.jpg) [Accessed 28 Nov. 2018]

## Appendix I: Debrief

### **Thank you very much for taking part in this research study.**

The study in which you just participated was designed to investigate how viewing 'Body Positive' images from Instagram impacts body appreciation.

If you have questions about this study or you wish to have your data removed from the study, please contact me at the following email address:

lararavisser92@gmail.com or mobile: +353899481036, alternatively, you may contact my supervisor, Liam Challenor at IADT, at 01-8842168

We thank you sincerely for contributing and assure you that your data is confidential and anonymous, and if published the data will not be in any way identifiable as yours.

If you have been affected by the content of this study in any way, please refer to the contacts below for assistance:

#### Connect Counselling:

- Republic of Ireland: 1800 477 477
- UK and Northern Ireland: 00800 477 477 77
- Outside RoI and UK: 00353 (0) 1 865 7495 (Int. call rates apply)

#### Bodywhys:

- Phone number: 1890 200 444
- Email: alex@bodywhys.ie

#### Psychological Society Ireland's Chartered Psychologist Online Directory:

<https://www.psychologicalsociety.ie/footer/PSI-Chartered-Psychologist-Online-Directory>

Regards,

*Lara Visser*

Appendix J: Ethnicity and Sexual Orientation

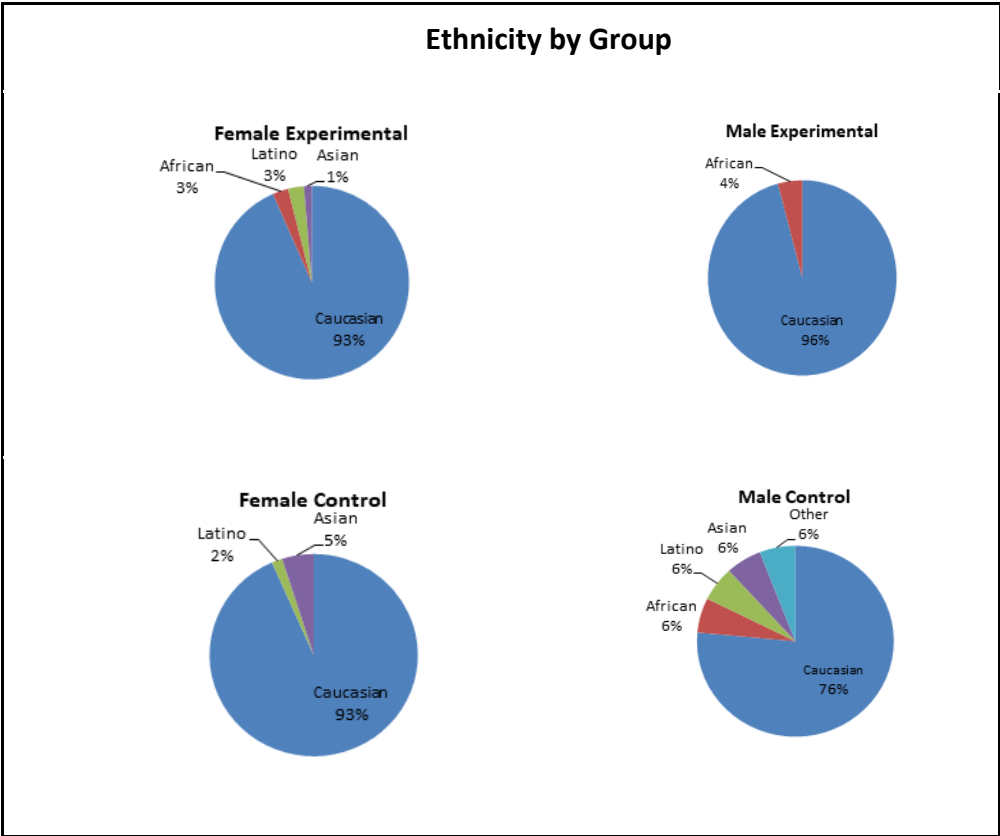


Figure 5: Ethnicity by Group

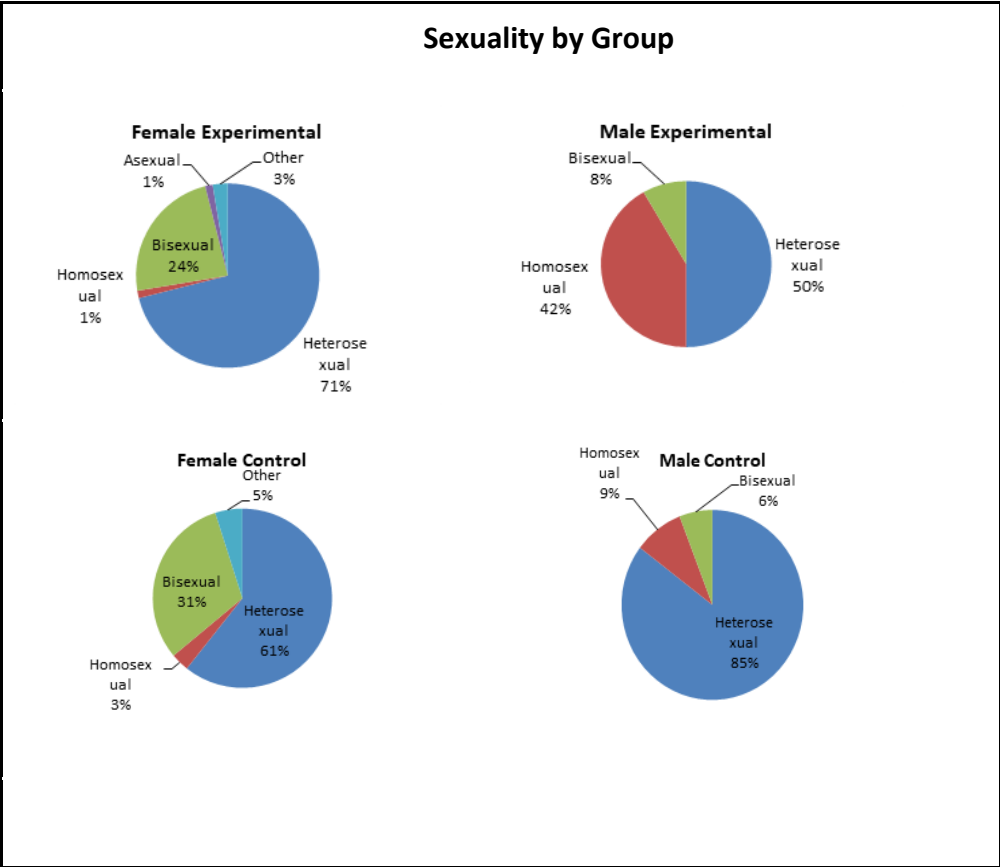


Figure 6: Sexuality by Group

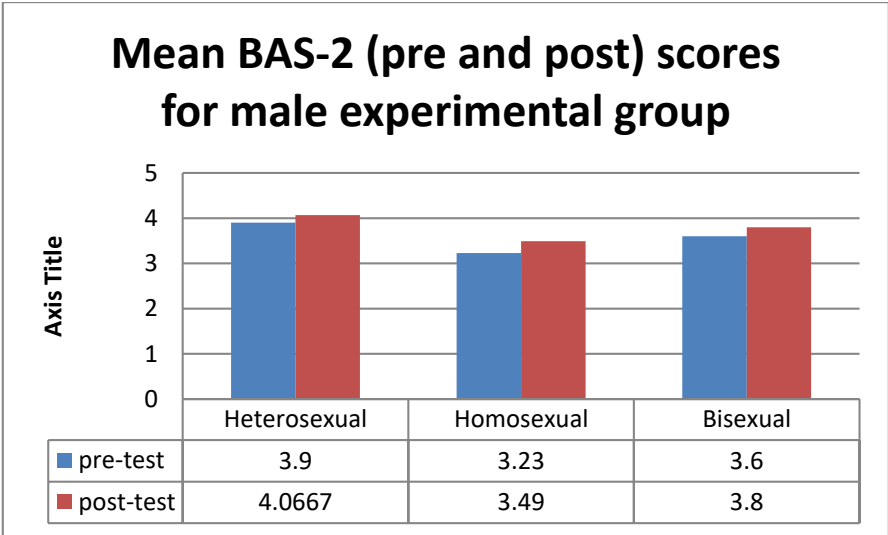


Figure 13: Mean BAS-2 (pre and post) scores for male experimental group

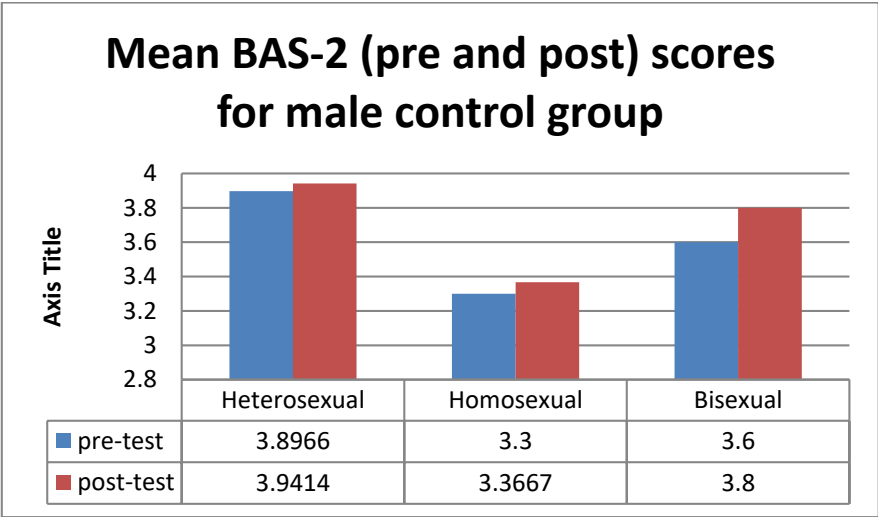


Figure 14: Mean BAS-2 (pre and post) scores for male control group



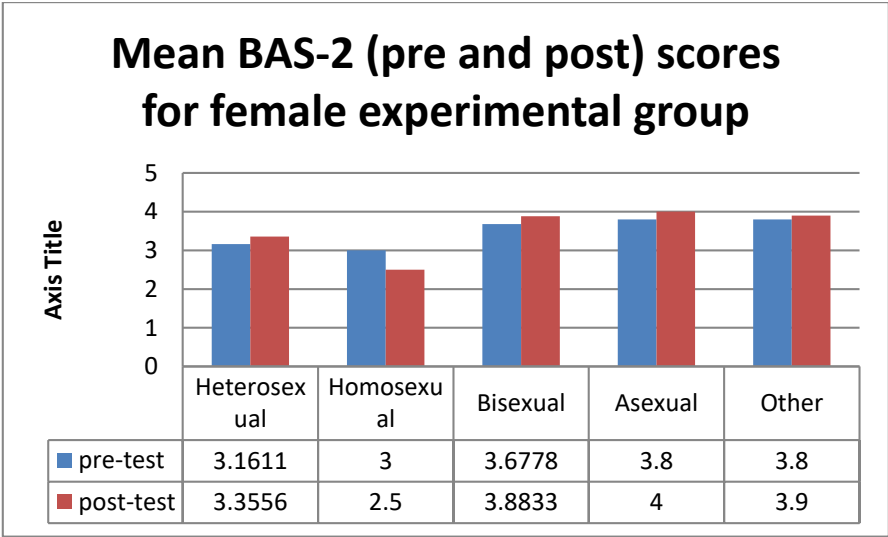


Figure 15: Mean BAS-2 (pre and post) scores for female experimental group

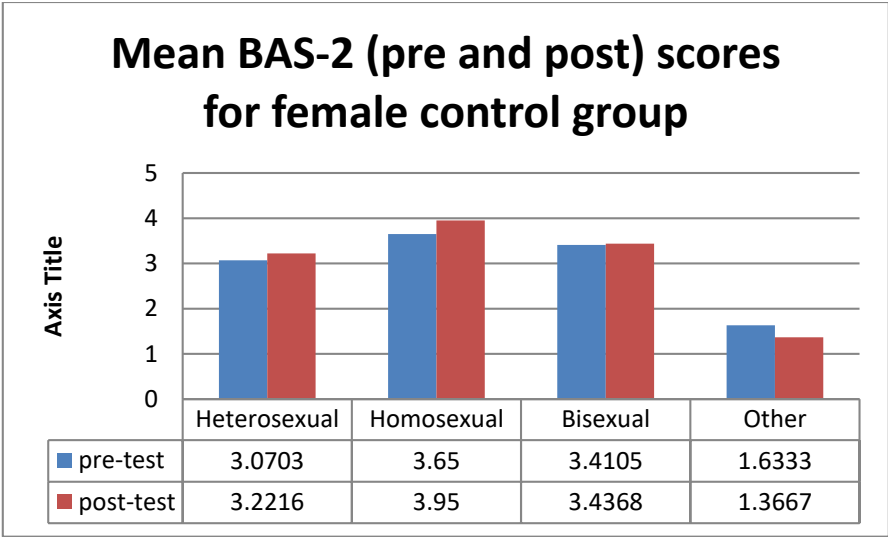


Figure 16: Mean BAS-2 (pre and post) scores for female experimental group

## Appendix K: Spss Outputs

**FREQUENCIES AND DESCRIPTIVES****Descriptive Statistics**

	N	Minimum	Maximum	Mean	Std. Deviation
AGE	195	18.00	61.00	29.7744	8.98397
Groups	195	1.00	4.00	2.6769	1.04695
GroupIC	195	1.00	2.00	1.4872	.50112
PACSQ1	195	.00	4.00	2.4462	1.11268
PACSQ2	195	.00	4.00	2.4615	1.15424
PACSQ3	195	.00	4.00	2.2513	1.16364
PACSQ4	195	.00	4.00	2.2615	1.27962
PACSQ5	195	.00	4.00	2.1897	1.43946
PACSQ6	195	.00	4.00	2.3179	1.19769
PACSQ7	195	.00	4.00	1.9744	1.27803
PACSQ8	195	.00	4.00	2.3846	1.20599
PACS9	195	.00	4.00	2.1026	1.21407
PACS10	195	.00	4.00	1.7231	1.31024
PACSQ11	195	.00	4.00	2.8513	1.21564
PACSTOTAL	195	.00	44.00	24.9641	11.42811
BASPREQ1	195	2.00	5.00	3.5692	.82429
BASPREQ2	195	1.00	5.00	3.0974	1.00296
BASPREQ3	195	1.00	5.00	4.0769	.94117
BASPREQ4	195	1.00	5.00	3.4205	1.07818
BASPREQ5	195	1.00	5.00	3.2462	1.01581
BASPREQ6	195	1.00	5.00	3.2359	1.11491
BASPREQ7	195	1.00	5.00	3.3487	1.06075

BASPREQ8	195	1.00	5.00	3.2718	1.12743
BASPREQ9	195	1.00	5.00	3.2154	1.13281
BASPREQ10	195	1.00	5.00	3.2923	1.13596
PRETESTAV	195	1.20	5.00	3.3774	.86680
BASPQ1	195	1.00	5.00	3.5897	.93384
BASPQ2	195	1.00	5.00	3.4256	1.01451
BASPQ3	195	1.00	5.00	3.8821	.95865
BASPQ4	195	1.00	5.00	3.4974	1.05701
BASPQ5	195	1.00	5.00	3.3641	.99262
BASPQ6	195	1.00	5.00	3.4667	1.06619
BASPQ7	195	1.00	5.00	3.5949	1.03793
BASPQ8	195	1.00	5.00	3.4051	1.10992
BASPQ9	195	1.00	5.00	3.3641	1.07729
BASPQ10	195	1.00	5.00	3.5179	1.07139
POSTTESTAV	195	1.00	5.00	3.5108	.90573
Valid N (listwise)	195				

## Frequencies

### Statistics

		AGE	Groups	GroupIC	ETHNIC	GENDER	SEXO	PACSQ1
N	Valid	195	195	195	195	195	195	195
	Missing	0	0	0	0	0	0	0
Mean		29.7744	2.6769	1.4872				2.4462
Std. Error of Mean		.64336	.07497	.03589				.07968
Median		27.0000	2.0000	1.0000				3.0000
Mode		26.00	2.00	1.00				3.00

Std. Deviation	8.98397	1.04695	.50112				1.11268
Variance	80.712	1.096	.251				1.238
Range	43.00	3.00	1.00				4.00
Sum	5806.00	522.00	290.00				477.00

**Statistics**

		PACSQ2	PACSQ3	PACSQ4	PACSQ5	PACSQ6	PACSQ7	PACSQ8
N	Valid	195	195	195	195	195	195	195
	Missing	0	0	0	0	0	0	0
Mean		2.4615	2.2513	2.2615	2.1897	2.3179	1.9744	2.3846
Std. Error of Mean		.08266	.08333	.09164	.10308	.08577	.09152	.08636
Median		3.0000	2.0000	3.0000	2.0000	3.0000	2.0000	3.0000
Mode		3.00	3.00	3.00	4.00	3.00	1.00	3.00
Std. Deviation		1.15424	1.16364	1.27962	1.43946	1.19769	1.27803	1.20599
Variance		1.332	1.354	1.637	2.072	1.434	1.633	1.454
Range		4.00	4.00	4.00	4.00	4.00	4.00	4.00
Sum		480.00	439.00	441.00	427.00	452.00	385.00	465.00

**Statistics**

		PACS9	PACS10	PACSQ11	PACSTOTAL	BASPREQ1	BASPREQ2
N	Valid	195	195	195	195	195	195
	Missing	0	0	0	0	0	0
Mean		2.1026	1.7231	2.8513	24.9641	3.5692	3.0974
Std. Error of Mean		.08694	.09383	.08705	.81838	.05903	.07182
Median		2.0000	2.0000	3.0000	25.0000	4.0000	3.0000
Mode		3.00	1.00	4.00	33.00	3.00	3.00
Std. Deviation		1.21407	1.31024	1.21564	11.42811	.82429	1.00296

Variance	1.474	1.717	1.478	130.602	.679	1.006
Range	4.00	4.00	4.00	44.00	3.00	4.00
Sum	410.00	336.00	556.00	4868.00	696.00	604.00

**Statistics**

		BASPREQ3	BASPREQ4	BASPREQ5	BASPREQ6	BASPREQ7
N	Valid	195	195	195	195	195
	Missing	0	0	0	0	0
Mean		4.0769	3.4205	3.2462	3.2359	3.3487
Std. Error of Mean		.06740	.07721	.07274	.07984	.07596
Median		4.0000	4.0000	3.0000	3.0000	3.0000
Mode		4.00	4.00	3.00	4.00	3.00 <sup>a</sup>
Std. Deviation		.94117	1.07818	1.01581	1.11491	1.06075
Variance		.886	1.162	1.032	1.243	1.125
Range		4.00	4.00	4.00	4.00	4.00
Sum		795.00	667.00	633.00	631.00	653.00

**Statistics**

		BASPREQ8	BASPREQ9	BASPREQ10	PRETESTAV	BASPBQ1
N	Valid	195	195	195	195	195
	Missing	0	0	0	0	0
Mean		3.2718	3.2154	3.2923	3.3774	3.5897
Std. Error of Mean		.08074	.08112	.08135	.06207	.06687
Median		3.0000	3.0000	3.0000	3.4000	4.0000
Mode		3.00	4.00	4.00	3.30	4.00
Std. Deviation		1.12743	1.13281	1.13596	.86680	.93384
Variance		1.271	1.283	1.290	.751	.872

Range	4.00	4.00	4.00	3.80	4.00
Sum	638.00	627.00	642.00	658.60	700.00

**Statistics**

		BASPQ2	BASPQ3	BASPQ4	BASPQ5	BASPQ6	BASPQ7	BASPQ8
N	Valid	195	195	195	195	195	195	195
	Missing	0	0	0	0	0	0	0
Mean		3.4256	3.8821	3.4974	3.3641	3.4667	3.5949	3.4051
Std. Error of Mean		.07265	.06865	.07569	.07108	.07635	.07433	.07948
Median		4.0000	4.0000	4.0000	3.0000	4.0000	4.0000	3.0000
Mode		4.00	4.00	4.00	3.00	4.00	4.00	3.00
Std. Deviation		1.01451	.95865	1.05701	.99262	1.06619	1.03793	1.10992
Variance		1.029	.919	1.117	.985	1.137	1.077	1.232
Range		4.00	4.00	4.00	4.00	4.00	4.00	4.00
Sum		668.00	757.00	682.00	656.00	676.00	701.00	664.00

**Statistics**

		BASPQ9	BASPQ10	POSTTESTAV
N	Valid	195	195	195
	Missing	0	0	0
Mean		3.3641	3.5179	3.5108
Std. Error of Mean		.07715	.07672	.06486
Median		3.0000	4.0000	3.6000
Mode		4.00	4.00	4.00
Std. Deviation		1.07729	1.07139	.90573
Variance		1.161	1.148	.820
Range		4.00	4.00	4.00

Sum	656.00	686.00	684.60
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a. Multiple modes exist. The smallest value is shown

## Frequency Table

AGE					
		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	18.00	1	.5	.5	.5
	19.00	3	1.5	1.5	2.1
	20.00	4	2.1	2.1	4.1
	21.00	11	5.6	5.6	9.7
	22.00	4	2.1	2.1	11.8
	23.00	8	4.1	4.1	15.9
	24.00	11	5.6	5.6	21.5
	25.00	18	9.2	9.2	30.8
	26.00	31	15.9	15.9	46.7
	27.00	22	11.3	11.3	57.9
	28.00	8	4.1	4.1	62.1
	29.00	10	5.1	5.1	67.2
	30.00	9	4.6	4.6	71.8
	31.00	7	3.6	3.6	75.4
	32.00	5	2.6	2.6	77.9
	33.00	5	2.6	2.6	80.5
	34.00	2	1.0	1.0	81.5
	35.00	4	2.1	2.1	83.6
	36.00	3	1.5	1.5	85.1
	37.00	3	1.5	1.5	86.7

38.00	3	1.5	1.5	88.2
40.00	1	.5	.5	88.7
42.00	3	1.5	1.5	90.3
44.00	1	.5	.5	90.8
45.00	1	.5	.5	91.3
46.00	3	1.5	1.5	92.8
47.00	2	1.0	1.0	93.8
49.00	1	.5	.5	94.4
52.00	1	.5	.5	94.9
53.00	1	.5	.5	95.4
56.00	3	1.5	1.5	96.9
58.00	1	.5	.5	97.4
59.00	2	1.0	1.0	98.5
60.00	1	.5	.5	99.0
61.00	2	1.0	1.0	100.0
Total	195	100.0	100.0	

**Groups**

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	1.00	24	12.3	12.3	12.3
	2.00	76	39.0	39.0	51.3
	3.00	34	17.4	17.4	68.7
	4.00	61	31.3	31.3	100.0
	Total	195	100.0	100.0	

**Group1C**



		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	1.00	100	51.3	51.3	51.3
	2.00	95	48.7	48.7	100.0
	Total	195	100.0	100.0	

**ETHNIC**

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	1	177	90.8	90.8	90.8
	2	5	2.6	2.6	93.3
	3	5	2.6	2.6	95.9
	4	6	3.1	3.1	99.0
	5	2	1.0	1.0	100.0
	Total	195	100.0	100.0	

**GENDER**

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	1	58	29.7	29.7	29.7
	2	137	70.3	70.3	100.0
	Total	195	100.0	100.0	

**SEXO**

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	1	132	67.7	67.7	67.7
	2	16	8.2	8.2	75.9
	3	41	21.0	21.0	96.9
	4	1	.5	.5	97.4

	5	5	2.6	2.6	100.0
	Total	195	100.0	100.0	

**PACSQ1**

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	.00	10	5.1	5.1	5.1
	1.00	30	15.4	15.4	20.5
	2.00	54	27.7	27.7	48.2
	3.00	65	33.3	33.3	81.5
	4.00	36	18.5	18.5	100.0
	Total	195	100.0	100.0	

**PACSQ2**

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	.00	15	7.7	7.7	7.7
	1.00	23	11.8	11.8	19.5
	2.00	51	26.2	26.2	45.6
	3.00	69	35.4	35.4	81.0
	4.00	37	19.0	19.0	100.0
	Total	195	100.0	100.0	

**PACSQ3**

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	.00	14	7.2	7.2	7.2
	1.00	44	22.6	22.6	29.7
	2.00	43	22.1	22.1	51.8
	3.00	67	34.4	34.4	86.2

	4.00	27	13.8	13.8	100.0
	Total	195	100.0	100.0	

**PACSQ4**

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	.00	26	13.3	13.3	13.3
	1.00	29	14.9	14.9	28.2
	2.00	41	21.0	21.0	49.2
	3.00	66	33.8	33.8	83.1
	4.00	33	16.9	16.9	100.0
	Total	195	100.0	100.0	

**PACSQ5**

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	.00	33	16.9	16.9	16.9
	1.00	38	19.5	19.5	36.4
	2.00	32	16.4	16.4	52.8
	3.00	43	22.1	22.1	74.9
	4.00	49	25.1	25.1	100.0
	Total	195	100.0	100.0	

**PACSQ6**

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	.00	17	8.7	8.7	8.7

1.00	35	17.9	17.9	26.7
2.00	44	22.6	22.6	49.2
3.00	67	34.4	34.4	83.6
4.00	32	16.4	16.4	100.0
Total	195	100.0	100.0	

**PACSQ7**

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	.00	26	13.3	13.3	13.3
	1.00	55	28.2	28.2	41.5
	2.00	40	20.5	20.5	62.1
	3.00	46	23.6	23.6	85.6
	4.00	28	14.4	14.4	100.0
	Total	195	100.0	100.0	

**PACSQ8**

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	.00	16	8.2	8.2	8.2
	1.00	31	15.9	15.9	24.1
	2.00	49	25.1	25.1	49.2
	3.00	60	30.8	30.8	80.0
	4.00	39	20.0	20.0	100.0
	Total	195	100.0	100.0	

**PACS9**

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	.00	19	9.7	9.7	9.7

1.00	49	25.1	25.1	34.9
2.00	48	24.6	24.6	59.5
3.00	51	26.2	26.2	85.6
4.00	28	14.4	14.4	100.0
Total	195	100.0	100.0	

**PACS10**

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	.00	40	20.5	20.5	20.5
	1.00	57	29.2	29.2	49.7
	2.00	39	20.0	20.0	69.7
	3.00	35	17.9	17.9	87.7
	4.00	24	12.3	12.3	100.0
	Total	195	100.0	100.0	

**PACSQ11**

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	.00	13	6.7	6.7	6.7
	1.00	17	8.7	8.7	15.4
	2.00	31	15.9	15.9	31.3
	3.00	59	30.3	30.3	61.5
	4.00	75	38.5	38.5	100.0
	Total	195	100.0	100.0	

**PACSTOTAL**

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	.00	6	3.1	3.1	3.1

2.00	1	.5	.5	3.6
6.00	3	1.5	1.5	5.1
7.00	5	2.6	2.6	7.7
9.00	3	1.5	1.5	9.2
10.00	5	2.6	2.6	11.8
11.00	3	1.5	1.5	13.3
12.00	3	1.5	1.5	14.9
13.00	3	1.5	1.5	16.4
14.00	6	3.1	3.1	19.5
15.00	7	3.6	3.6	23.1
16.00	9	4.6	4.6	27.7
17.00	7	3.6	3.6	31.3
18.00	1	.5	.5	31.8
19.00	3	1.5	1.5	33.3
20.00	6	3.1	3.1	36.4
21.00	3	1.5	1.5	37.9
22.00	5	2.6	2.6	40.5
23.00	6	3.1	3.1	43.6
24.00	10	5.1	5.1	48.7
25.00	4	2.1	2.1	50.8
26.00	4	2.1	2.1	52.8
27.00	2	1.0	1.0	53.8
28.00	6	3.1	3.1	56.9
29.00	5	2.6	2.6	59.5
30.00	4	2.1	2.1	61.5

31.00	10	5.1	5.1	66.7
32.00	6	3.1	3.1	69.7
33.00	16	8.2	8.2	77.9
34.00	4	2.1	2.1	80.0
35.00	7	3.6	3.6	83.6
36.00	3	1.5	1.5	85.1
37.00	1	.5	.5	85.6
38.00	2	1.0	1.0	86.7
39.00	3	1.5	1.5	88.2
40.00	1	.5	.5	88.7
41.00	1	.5	.5	89.2
42.00	5	2.6	2.6	91.8
43.00	5	2.6	2.6	94.4
44.00	11	5.6	5.6	100.0
Total	195	100.0	100.0	

**BASPREQ1**

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	2.00	15	7.7	7.7	7.7
	3.00	81	41.5	41.5	49.2
	4.00	72	36.9	36.9	86.2
	5.00	27	13.8	13.8	100.0
	Total	195	100.0	100.0	

**BASPREQ2**

		Frequency	Percent	Valid Percent	Cumulative Percent
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Valid	1.00	15	7.7	7.7	7.7
	2.00	34	17.4	17.4	25.1
	3.00	73	37.4	37.4	62.6
	4.00	63	32.3	32.3	94.9
	5.00	10	5.1	5.1	100.0
	Total	195	100.0	100.0	

**BASPREQ3**

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	1.00	3	1.5	1.5	1.5
	2.00	11	5.6	5.6	7.2
	3.00	28	14.4	14.4	21.5
	4.00	79	40.5	40.5	62.1
	5.00	74	37.9	37.9	100.0
	Total	195	100.0	100.0	

**BASPREQ4**

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	1.00	10	5.1	5.1	5.1
	2.00	29	14.9	14.9	20.0
	3.00	55	28.2	28.2	48.2
	4.00	71	36.4	36.4	84.6
	5.00	30	15.4	15.4	100.0
	Total	195	100.0	100.0	

**BASPREQ5**

		Frequency	Percent	Valid Percent	Cumulative Percent
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Valid	1.00	8	4.1	4.1	4.1
	2.00	36	18.5	18.5	22.6
	3.00	73	37.4	37.4	60.0
	4.00	56	28.7	28.7	88.7
	5.00	22	11.3	11.3	100.0
	Total	195	100.0	100.0	

**BASPREQ6**

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	1.00	15	7.7	7.7	7.7
	2.00	34	17.4	17.4	25.1
	3.00	60	30.8	30.8	55.9
	4.00	62	31.8	31.8	87.7
	5.00	24	12.3	12.3	100.0
	Total	195	100.0	100.0	

**BASPREQ7**

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	1.00	10	5.1	5.1	5.1
	2.00	30	15.4	15.4	20.5
	3.00	64	32.8	32.8	53.3
	4.00	64	32.8	32.8	86.2
	5.00	27	13.8	13.8	100.0
	Total	195	100.0	100.0	

**BASPREQ8**

		Frequency	Percent	Valid Percent	Cumulative Percent
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Valid	1.00	17	8.7	8.7	8.7
	2.00	26	13.3	13.3	22.1
	3.00	66	33.8	33.8	55.9
	4.00	59	30.3	30.3	86.2
	5.00	27	13.8	13.8	100.0
	Total	195	100.0	100.0	

**BASPREQ9**

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	1.00	17	8.7	8.7	8.7
	2.00	34	17.4	17.4	26.2
	3.00	57	29.2	29.2	55.4
	4.00	64	32.8	32.8	88.2
	5.00	23	11.8	11.8	100.0
	Total	195	100.0	100.0	

**BASPREQ10**

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	1.00	13	6.7	6.7	6.7
	2.00	37	19.0	19.0	25.6
	3.00	54	27.7	27.7	53.3
	4.00	62	31.8	31.8	85.1
	5.00	29	14.9	14.9	100.0
	Total	195	100.0	100.0	

**PRETESTAV**

		Frequency	Percent	Valid Percent	Cumulative Percent
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Valid	1.20	3	1.5	1.5	1.5
	1.40	1	.5	.5	2.1
	1.60	2	1.0	1.0	3.1
	1.70	3	1.5	1.5	4.6
	1.80	3	1.5	1.5	6.2
	1.90	3	1.5	1.5	7.7
	2.00	3	1.5	1.5	9.2
	2.10	2	1.0	1.0	10.3
	2.20	3	1.5	1.5	11.8
	2.30	2	1.0	1.0	12.8
	2.40	4	2.1	2.1	14.9
	2.50	2	1.0	1.0	15.9
	2.60	7	3.6	3.6	19.5
	2.70	7	3.6	3.6	23.1
	2.80	7	3.6	3.6	26.7
	2.90	5	2.6	2.6	29.2
	3.00	4	2.1	2.1	31.3
	3.10	6	3.1	3.1	34.4
	3.20	10	5.1	5.1	39.5
	3.30	15	7.7	7.7	47.2
	3.40	9	4.6	4.6	51.8
	3.50	10	5.1	5.1	56.9
	3.60	4	2.1	2.1	59.0
	3.70	11	5.6	5.6	64.6
	3.80	11	5.6	5.6	70.3

3.90	10	5.1	5.1	75.4
4.00	7	3.6	3.6	79.0
4.10	3	1.5	1.5	80.5
4.20	4	2.1	2.1	82.6
4.30	9	4.6	4.6	87.2
4.40	4	2.1	2.1	89.2
4.50	3	1.5	1.5	90.8
4.70	7	3.6	3.6	94.4
4.80	5	2.6	2.6	96.9
4.90	4	2.1	2.1	99.0
5.00	2	1.0	1.0	100.0
Total	195	100.0	100.0	

**BASPQ1**

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	1.00	5	2.6	2.6	2.6
	2.00	16	8.2	8.2	10.8
	3.00	63	32.3	32.3	43.1
	4.00	81	41.5	41.5	84.6
	5.00	30	15.4	15.4	100.0
	Total	195	100.0	100.0	

**BASPQ2**

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	1.00	9	4.6	4.6	4.6

2.00	26	13.3	13.3	17.9
3.00	56	28.7	28.7	46.7
4.00	81	41.5	41.5	88.2
5.00	23	11.8	11.8	100.0
Total	195	100.0	100.0	

**BASPQ3**

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	1.00	4	2.1	2.1	2.1
	2.00	14	7.2	7.2	9.2
	3.00	36	18.5	18.5	27.7
	4.00	88	45.1	45.1	72.8
	5.00	53	27.2	27.2	100.0
	Total	195	100.0	100.0	

**BASPQ4**

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	1.00	9	4.6	4.6	4.6
	2.00	25	12.8	12.8	17.4
	3.00	53	27.2	27.2	44.6
	4.00	76	39.0	39.0	83.6
	5.00	32	16.4	16.4	100.0
	Total	195	100.0	100.0	

**BASPQ5**

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	1.00	6	3.1	3.1	3.1

2.00	31	15.9	15.9	19.0
3.00	68	34.9	34.9	53.8
4.00	66	33.8	33.8	87.7
5.00	24	12.3	12.3	100.0
Total	195	100.0	100.0	

**BASPQ6**

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	1.00	12	6.2	6.2	6.2
	2.00	21	10.8	10.8	16.9
	3.00	55	28.2	28.2	45.1
	4.00	78	40.0	40.0	85.1
	5.00	29	14.9	14.9	100.0
	Total	195	100.0	100.0	

**BASPQ7**

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	1.00	6	3.1	3.1	3.1
	2.00	27	13.8	13.8	16.9
	3.00	43	22.1	22.1	39.0
	4.00	83	42.6	42.6	81.5
	5.00	36	18.5	18.5	100.0
	Total	195	100.0	100.0	

**BASPQ8**

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	1.00	12	6.2	6.2	6.2

2.00	26	13.3	13.3	19.5
3.00	62	31.8	31.8	51.3
4.00	61	31.3	31.3	82.6
5.00	34	17.4	17.4	100.0
Total	195	100.0	100.0	

**BASPQ9**

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	1.00	13	6.7	6.7	6.7
	2.00	25	12.8	12.8	19.5
	3.00	61	31.3	31.3	50.8
	4.00	70	35.9	35.9	86.7
	5.00	26	13.3	13.3	100.0
	Total	195	100.0	100.0	

**BASPQ10**

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	1.00	9	4.6	4.6	4.6
	2.00	24	12.3	12.3	16.9
	3.00	55	28.2	28.2	45.1
	4.00	71	36.4	36.4	81.5
	5.00	36	18.5	18.5	100.0
	Total	195	100.0	100.0	

**POSTTESTAV**

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	1.00	1	.5	.5	.5

1.10	1	.5	.5	1.0
1.20	2	1.0	1.0	2.1
1.40	3	1.5	1.5	3.6
1.60	2	1.0	1.0	4.6
1.80	1	.5	.5	5.1
1.90	2	1.0	1.0	6.2
2.00	3	1.5	1.5	7.7
2.10	2	1.0	1.0	8.7
2.20	4	2.1	2.1	10.8
2.30	1	.5	.5	11.3
2.40	3	1.5	1.5	12.8
2.50	4	2.1	2.1	14.9
2.60	4	2.1	2.1	16.9
2.70	3	1.5	1.5	18.5
2.80	5	2.6	2.6	21.0
2.90	6	3.1	3.1	24.1
3.00	7	3.6	3.6	27.7
3.10	10	5.1	5.1	32.8
3.20	5	2.6	2.6	35.4
3.30	6	3.1	3.1	38.5
3.40	7	3.6	3.6	42.1
3.50	7	3.6	3.6	45.6
3.60	9	4.6	4.6	50.3
3.70	8	4.1	4.1	54.4
3.80	12	6.2	6.2	60.5



3.90	8	4.1	4.1	64.6
4.00	17	8.7	8.7	73.3
4.10	8	4.1	4.1	77.4
4.20	3	1.5	1.5	79.0
4.30	8	4.1	4.1	83.1
4.40	6	3.1	3.1	86.2
4.50	4	2.1	2.1	88.2
4.60	2	1.0	1.0	89.2
4.70	2	1.0	1.0	90.3
4.80	7	3.6	3.6	93.8
4.90	6	3.1	3.1	96.9
5.00	6	3.1	3.1	100.0
Total	195	100.0	100.0	

**FREQUENCIES SEXO**

**GENDER = Male, SEXO**  
**Experimental**

**= Heterosexual, GroupIC =**

**Descriptive Statistics<sup>a</sup>**

	N	Minimum	Maximum	Mean	Std. Deviation
PACSTOTAL	12	.00	31.00	12.0833	7.90234
PRETESTAV	12	2.60	4.90	3.9000	.74223
POSTTESTAV	12	2.90	5.00	4.0667	.66104
Valid N (listwise)	12				

a. GENDER = Male, SEXO

= Heterosexual, GroupIC = Experimental

**GENDER = Male, SEXO**  
**Control**

**= Heterosexual, GroupIC =**

**Descriptive Statistics<sup>a</sup>**

	N	Minimum	Maximum	Mean	Std. Deviation
PACSTOTAL	29	.00	28.00	16.6207	7.02248
PRETESTAV	29	2.60	5.00	3.8966	.71538
POSTTESTAV	29	2.60	5.00	3.9414	.76882
Valid N (listwise)	29				

a. GENDER = Male, SEXO

= Heterosexual, GroupIC = Control

**GENDER = Male, SEXO**  
**Experimental**

**= Homosexual, GroupIC =**

**Descriptive Statistics<sup>a</sup>**

	N	Minimum	Maximum	Mean	Std. Deviation
PACSTOTAL	10	16.00	40.00	28.1000	7.41545
PRETESTAV	10	1.70	4.70	3.2300	.78606
POSTTESTAV	10	1.20	4.80	3.4900	.95621
Valid N (listwise)	10				

a. GENDER = Male, SEXO

= Homosexual, GroupIC = Experimental

**GENDER = Male, SEXO**  
**Control**

**= Homosexual, GroupIC =**

**Descriptive Statistics<sup>a</sup>**

	N	Minimum	Maximum	Mean	Std. Deviation
PACSTOTAL	3	12.00	44.00	29.6667	16.25833
PRETESTAV	3	2.70	3.90	3.3000	.60000
POSTTESTAV	3	3.10	3.90	3.3667	.46188
Valid N (listwise)	3				

a. GENDER = Male, SEXO

= Homosexual, GroupIC = Control

**GENDER = Male, SEXO**  
**Experimental**

**= Bisexual, GroupIC =**

**Descriptive Statistics<sup>a</sup>**

	N	Minimum	Maximum	Mean	Std. Deviation
PACSTOTAL	2	15.00	20.00	17.5000	3.53553
PRETESTAV	2	3.40	3.80	3.6000	.28284
POSTTESTAV	2	3.60	4.00	3.8000	.28284
Valid N (listwise)	2				

a. GENDER = Male, SEXO

= Bisexual, GroupIC = Experimental

**GENDER = Male, SEXO**  
**Control**

**= Bisexual, GroupIC =**

**Descriptive Statistics<sup>a</sup>**

	N	Minimum	Maximum	Mean	Std. Deviation
PACSTOTAL	2	.00	16.00	8.0000	11.31371
PRETESTAV	2	3.40	4.10	3.7500	.49497
POSTTESTAV	2	3.40	3.60	3.5000	.14142
Valid N (listwise)	2				

a. GENDER = Male, SEXO

= Bisexual, GroupIC = Control

**GENDER = Female, SEXO**  
**= Experimental**

**= Heterosexual, GroupIC**

**Descriptive Statistics<sup>a</sup>**

	N	Minimum	Maximum	Mean	Std. Deviation
PACSTOTAL	54	.00	44.00	26.8519	11.25587
PRETESTAV	54	1.20	4.70	3.1611	.83585
POSTTESTAV	54	1.00	4.90	3.3556	.90797

Valid N (listwise)	54				
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a. GENDER = Female, SEXO = Heterosexual, GroupIC = Experimental

**GENDER = Female, SEXO = Heterosexual, GroupIC = Control**

#### Descriptive Statistics<sup>a</sup>

	N	Minimum	Maximum	Mean	Std. Deviation
PACSTOTAL	37	.00	44.00	29.2432	10.78941
PRETESTAV	37	1.60	4.80	3.0703	.86886
POSTTESTAV	37	1.40	5.00	3.2216	.89695
Valid N (listwise)	37				

a. GENDER = Female, SEXO = Heterosexual, GroupIC = Control

**GENDER = Female, SEXO = Homosexual, GroupIC = Experimental**

#### Descriptive Statistics<sup>a</sup>

	N	Minimum	Maximum	Mean	Std. Deviation
PACSTOTAL	1	23.00	23.00	23.0000	.
PRETESTAV	1	3.00	3.00	3.0000	.
POSTTESTAV	1	2.50	2.50	2.5000	.
Valid N (listwise)	1				

a. GENDER = Female, SEXO = Homosexual, GroupIC = Experimental

**GENDER = Female, SEXO = Homosexual, GroupIC = Control**

#### Descriptive Statistics<sup>a</sup>

	N	Minimum	Maximum	Mean	Std. Deviation
PACSTOTAL	2	26.00	34.00	30.0000	5.65685
PRETESTAV	2	3.30	4.00	3.6500	.49497
POSTTESTAV	2	3.80	4.10	3.9500	.21213

Valid N (listwise)	2				
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a. GENDER = Female, SEXO = Homosexual, GroupIC = Control

**GENDER = Female, SEXO = Bisexual, GroupIC = Experimental**

#### Descriptive Statistics<sup>a</sup>

	N	Minimum	Maximum	Mean	Std. Deviation
PACSTOTAL	18	.00	44.00	26.3333	10.99198
PRETESTAV	18	2.00	5.00	3.6778	.86198
POSTTESTAV	18	2.00	5.00	3.8833	.79576
Valid N (listwise)	18				

a. GENDER = Female, SEXO = Bisexual, GroupIC = Experimental

**GENDER = Female, SEXO = Bisexual, GroupIC = Control**

#### Descriptive Statistics<sup>a</sup>

	N	Minimum	Maximum	Mean	Std. Deviation
PACSTOTAL	19	9.00	44.00	28.3684	11.52394
PRETESTAV	19	1.90	4.70	3.4105	.80062
POSTTESTAV	19	1.90	4.80	3.4368	.84604
Valid N (listwise)	19				

a. GENDER = Female, SEXO = Bisexual, GroupIC = Control

**GENDER = Female, SEXO = Asexual, GroupIC = Experimental**

#### Descriptive Statistics<sup>a</sup>

	N	Minimum	Maximum	Mean	Std. Deviation
PACSTOTAL	1	30.00	30.00	30.0000	.
PRETESTAV	1	3.80	3.80	3.8000	.
POSTTESTAV	1	4.00	4.00	4.0000	.

Valid N (listwise)	1				
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a. GENDER = Female, SEXO = Asexual, GroupIC = Experimental

**GENDER = Female, SEXO = Other, GroupIC = Experimental**

#### Descriptive Statistics<sup>a</sup>

	N	Minimum	Maximum	Mean	Std. Deviation
PACSTOTAL	2	22.00	23.00	22.5000	.70711
PRETESTAV	2	3.30	4.30	3.8000	.70711
POSTTESTAV	2	3.40	4.40	3.9000	.70711
Valid N (listwise)	2				

a. GENDER = Female, SEXO = Other, GroupIC = Experimental

**GENDER = Female, SEXO = Other, GroupIC = Control**

#### Descriptive Statistics<sup>a</sup>

	N	Minimum	Maximum	Mean	Std. Deviation
PACSTOTAL	3	33.00	42.00	39.0000	5.19615
PRETESTAV	3	1.20	2.00	1.6333	.40415
POSTTESTAV	3	1.10	1.60	1.3667	.25166
Valid N (listwise)	3				

a. GENDER = Female, SEXO = Other, GroupIC = Control

## Descriptive Statistics

GENDER	SEXO	GroupIC		N	Minimum	Maximum	Mean	Std. Deviation
Male	Heterosexual	Experimental	PRETESTAV	12	2.60	4.90	3.9000	.74223
			POSTTESTAV	12	2.90	5.00	4.0667	.66104
			Valid N (listwise)	12				
		Control	PRETESTAV	29	2.60	5.00	3.8966	.71538
			POSTTESTAV	29	2.60	5.00	3.9414	.76882
			Valid N (listwise)	29				
	Homosexual	Experimental	PRETESTAV	10	1.70	4.70	3.2300	.78606
			POSTTESTAV	10	1.20	4.80	3.4900	.95621
			Valid N (listwise)	10				
		Control	PRETESTAV	3	2.70	3.90	3.3000	.60000
			POSTTESTAV	3	3.10	3.90	3.3667	.46188
			Valid N (listwise)	3				
	Bisexual	Experimental	PRETESTAV	2	3.40	3.80	3.6000	.28284
			POSTTESTAV	2	3.60	4.00	3.8000	.28284
			Valid N (listwise)	2				
		Control	PRETESTAV	2	3.40	4.10	3.7500	.49497
			POSTTESTAV	2	3.40	3.60	3.5000	.14142
			Valid N (listwise)	2				
Female	Heterosexual	Experimental	PRETESTAV	54	1.20	4.70	3.1611	.83585
			POSTTESTAV	54	1.00	4.90	3.3556	.90797
			Valid N (listwise)	54				
		Control	PRETESTAV	37	1.60	4.80	3.0703	.86886
			POSTTESTAV	37	1.40	5.00	3.2216	.89695
			Valid N (listwise)	37				
	Homosexual	Experimental	PRETESTAV	1	3.00	3.00	3.0000	.
			POSTTESTAV	1	2.50	2.50	2.5000	.
			Valid N (listwise)	1				
		Control	PRETESTAV	2	3.30	4.00	3.6500	.49497
			POSTTESTAV	2	3.80	4.10	3.9500	.21213
			Valid N (listwise)	2				
	Bisexual	Experimental	PRETESTAV	18	2.00	5.00	3.6778	.86198
			POSTTESTAV	18	2.00	5.00	3.8833	.79576
			Valid N (listwise)	18				
		Control	PRETESTAV	19	1.90	4.70	3.4105	.80062
			POSTTESTAV	19	1.90	4.80	3.4368	.84604
			Valid N (listwise)	19				
	Asexual	Experimental	PRETESTAV	1	3.80	3.80	3.8000	.
			POSTTESTAV	1	4.00	4.00	4.0000	.
			Valid N (listwise)	1				
	Other	Experimental	PRETESTAV	2	3.30	4.30	3.8000	.70711
			POSTTESTAV	2	3.40	4.40	3.9000	.70711
			Valid N (listwise)	2				
		Control	PRETESTAV	3	1.20	2.00	1.6333	.40415
			POSTTESTAV	3	1.10	1.60	1.3667	.25166
			Valid N (listwise)	3				

## Descriptive Statistics

GENDER	SEXO		N	Minimum	Maximum	Mean	Std. Deviation
Male	Heterosexual	PACSTOTAL	41	.00	31.00	15.2927	7.48747
		PRETESTAV	41	2.60	5.00	3.8976	.71396
		POSTTESTAV	41	2.60	5.00	3.9780	.73298
		Valid N (listwise)	41				
	Homosexual	PACSTOTAL	13	12.00	44.00	28.4615	9.26117
		PRETESTAV	13	1.70	4.70	3.2462	.72413
		POSTTESTAV	13	1.20	4.80	3.4615	.85102
		Valid N (listwise)	13				
	Bisexual	PACSTOTAL	4	.00	20.00	12.7500	8.77021
		PRETESTAV	4	3.40	4.10	3.6750	.34034
		POSTTESTAV	4	3.40	4.00	3.6500	.25166
		Valid N (listwise)	4				
Female	Heterosexual	PACSTOTAL	91	.00	44.00	27.8242	11.07108
		PRETESTAV	91	1.20	4.80	3.1242	.84582
		POSTTESTAV	91	1.00	5.00	3.3011	.90092
		Valid N (listwise)	91				
	Homosexual	PACSTOTAL	3	23.00	34.00	27.6667	5.68624
		PRETESTAV	3	3.00	4.00	3.4333	.51316
		POSTTESTAV	3	2.50	4.10	3.4667	.85049
		Valid N (listwise)	3				
	Bisexual	PACSTOTAL	37	.00	44.00	27.3784	11.15883
		PRETESTAV	37	1.90	5.00	3.5405	.83048
		POSTTESTAV	37	1.90	5.00	3.6541	.84149
		Valid N (listwise)	37				
	Asexual	PACSTOTAL	1	30.00	30.00	30.0000	.
		PRETESTAV	1	3.80	3.80	3.8000	.



		POSTTESTAV	1	4.00	4.00	4.0000	.
		Valid N (listwise)	1				
	Other	PACSTOTAL	5	22.00	42.00	32.4000	9.76217
		PRETESTAV	5	1.20	4.30	2.5000	1.27083
		POSTTESTAV	5	1.10	4.40	2.3800	1.44291
		Valid N (listwise)	5				

## Descriptive Statistics

GENDER	SEXO	N	Minimum	Maximum	Mean	Std. Deviation
Male	Heterosexual	PACSTOTAL 41	.00	31.00	15.2927	7.48747
		PRETESTAV 41	2.60	5.00	3.8976	.71396
		Valid N (listwise)	41			
	Homosexual	PACSTOTAL 13	12.00	44.00	28.4615	9.26117
		PRETESTAV 13	1.70	4.70	3.2462	.72413
		Valid N (listwise)	13			
	Bisexual	PACSTOTAL 4	.00	20.00	12.7500	8.77021
		PRETESTAV 4	3.40	4.10	3.6750	.34034
		Valid N (listwise)	4			
Female	Heterosexual	PACSTOTAL 91	.00	44.00	27.8242	11.07108
		PRETESTAV 91	1.20	4.80	3.1242	.84582
		Valid N (listwise)	91			
	Homosexual	PACSTOTAL 3	23.00	34.00	27.6667	5.68624
		PRETESTAV 3	3.00	4.00	3.4333	.51316
		Valid N (listwise)	3			
	Bisexual	PACSTOTAL 37	.00	44.00	27.3784	11.15883
		PRETESTAV 37	1.90	5.00	3.5405	.83048
		Valid N (listwise)	37			
	Asexual	PACSTOTAL 1	30.00	30.00	30.0000	.
		PRETESTAV 1	3.80	3.80	3.8000	.
		Valid N (listwise)	1			

Other	PACSTOTAL	5	22.00	42.00	32.4000	9.76217
	PRETESTAV	5	1.20	4.30	2.5000	1.27083
	Valid N (listwise)	5				

## ONEWAY ANOVA PRETEST SEXO

### GENDER = Male

#### Descriptives<sup>a</sup>

PRETESTAV

	N	Mean	Std. Deviation	Std. Error	95% Confidence Interval for Mean			
					Lower Bound	Upper Bound		
Heterosexual	41	3.8976	.71396	.11150	3.6722	4.1229		
Homosexual	13	3.2462	.72413	.20084	2.8086	3.6837		
Bisexual	4	3.6750	.34034	.17017	3.1334	4.2166		
Total	58	3.7362	.74025	.09720	3.5416	3.9308		

#### Test of Homogeneity of Variances<sup>a</sup>

		Levene Statistic	df1	df2	Sig.
PRETESTAV	Based on Mean	.884	2	55	.419
	Based on Median	.885	2	55	.418
	Based on Median and with adjusted df	.885	2	51.222	.419
	Based on trimmed mean	.890	2	55	.417

a. GENDER = Male

#### ANOVA<sup>a</sup>

PRETESTAV

	Sum of Squares	df	Mean Square	F	Sig.
Between Groups	4.204	2	2.102	4.278	.019
Within Groups	27.030	55	.491		
Total	31.234	57			

a. GENDER = Male

#### Robust Tests of Equality of Means<sup>a</sup>

PRETESTAV

	Statistic <sup>b</sup>	df1	df2	Sig.
Welch	3.843	2	10.673	.055
Brown-Forsythe	6.331	2	24.195	.006

a. GENDER = Male

b. Asymptotically F distributed.

#### Post Hoc Tests

##### Multiple Comparisons<sup>a</sup>

Dependent Variable: PRETESTAV

Tukey HSD

(I) SEXO	(J) SEXO	Mean Difference (I-J)	Std. Error	Sig.	95% Confidence Interval	
					Lower Bound	Upper Bound
Heterosexual	Homosexual	.65141 <sup>*</sup>	.22314	.014	.1139	1.1889
	Bisexual	.22256	.36722	.817	-.6620	1.1071
Homosexual	Heterosexual	-.65141 <sup>*</sup>	.22314	.014	-1.1889	-.1139
	Bisexual	-.42885	.40083	.537	-1.3943	.5367
Bisexual	Heterosexual	-.22256	.36722	.817	-1.1071	.6620
	Homosexual	.42885	.40083	.537	-.5367	1.3943

\*. The mean difference is significant at the 0.05 level.

a. GENDER = Male

#### Homogeneous Subsets

##### PRETESTAV<sup>a</sup>

Tukey HSD<sup>b,c</sup>

SEXO	N	Subset for alpha = 0.05	
		1	
Homosexual	13	3.2462	
Bisexual	4	3.6750	
Heterosexual	41	3.8976	
Sig.		.143	

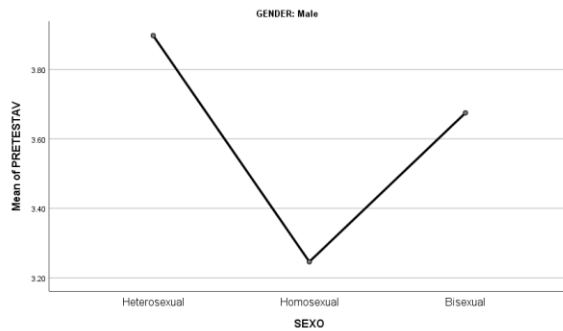
Means for groups in homogeneous subsets are displayed.<sup>a</sup>

a. GENDER = Male

b. Uses Harmonic Mean Sample Size = 8.539.

c. The group sizes are unequal. The harmonic mean of the group sizes is used. Type I error levels are not guaranteed.

#### Means Plots



**GENDER = Female**

**Descriptives<sup>a</sup>**

PRETESTAV

	N	Mean	Std. Deviation	Std. Error	95% Confidence Interval for Mean			
					Lower Bound	Upper Bound		
Heterosexual	91	3.1242	.84582	.08867	2.9480	3.3003		
Homosexual	3	3.4333	.51316	.29627	2.1586	4.7081		
Bisexual	37	3.5405	.83048	.13653	3.2636	3.8174		
Asexual	1	3.8000	.	.	.	.		
Other	5	2.5000	1.27083	.56833	.9221	4.0779		
Total	137	3.2255	.87406	.07468	3.0779	3.3732		

**Test of Homogeneity of Variances<sup>a</sup>**

		Levene Statistic	df1	df2	Sig.
PRETESTAV	Based on Mean	1.285	3	132	.282
	Based on Median	.802	3	132	.495
	Based on Median and with adjusted df	.802	3	118.569	.495
	Based on trimmed mean	1.255	3	132	.293

a. GENDER = Female

**ANOVA<sup>a</sup>**

PRETESTAV

	Sum of Squares	df	Mean Square	F	Sig.
Between Groups	7.698	4	1.924	2.641	.037
Within Groups	96.203	132	.729		
Total	103.901	136			

a. GENDER = Female

Robust Tests of Equality of Means<sup>a,c</sup>

PRETESTAV

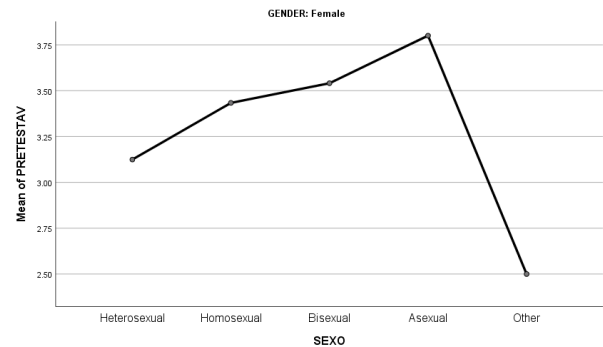
	Statistic <sup>b</sup>	df1	df2	Sig.
Welch	.	.	.	.
Brown-Forsythe	.	.	.	.

a. GENDER = Female

b. Asymptotically F distributed.

c. Robust tests of equality of means cannot be performed for PRETESTAV because at least one group has the sum of case weights less than or equal to 1.

Means Plots



ONEWAY ANOVA PRETEST PACS SEXO

GENDER = Male

Descriptives<sup>a</sup>

PRETESTAV

	N	Mean	Std. Deviation	Std. Error	95% Confidence Interval for Mean			
					Lower Bound	Upper Bound		
Heterosexual	41	3.8976	.71396	.11150	3.6722	4.1229		
Homosexual	13	3.2462	.72413	.20084	2.8086	3.6837		

Bisexual	4	3.6750	.34034	.17017	3.1334	4.2166		
Total	58	3.7362	.74025	.09720	3.5416	3.9308		

**Test of Homogeneity of Variances<sup>a</sup>**

		Levene Statistic	df1	df2	Sig.
PRETESTAV	Based on Mean	.884	2	55	.419
	Based on Median	.885	2	55	.418
	Based on Median and with adjusted df	.885	2	51.222	.419
	Based on trimmed mean	.890	2	55	.417

a. GENDER = Male

**ANOVA<sup>a</sup>**

PRETESTAV

	Sum of Squares	df	Mean Square	F	Sig.
Between Groups	4.204	2	2.102	4.278	.019
Within Groups	27.030	55	.491		
Total	31.234	57			

a. GENDER = Male

**Robust Tests of Equality of Means<sup>a</sup>**

PRETESTAV

	Statistic <sup>b</sup>	df1	df2	Sig.
Welch	3.843	2	10.673	.055
Brown-Forsythe	6.331	2	24.195	.006

a. GENDER = Male

b. Asymptotically F distributed.

**Post Hoc Tests**

**Multiple Comparisons<sup>a</sup>**

Dependent Variable: PRETESTAV

Tukey HSD

(I) SEXO	(J) SEXO	Mean Difference (I-J)	Std. Error	Sig.	95% Confidence Interval	
					Lower Bound	Upper Bound
Heterosexual	Homosexual	.65141*	.22314	.014	.1139	1.1889
	Bisexual	.22256	.36722	.817	-.6620	1.1071
Homosexual	Heterosexual	-.65141*	.22314	.014	-1.1889	-.1139
	Bisexual	-.42885	.40083	.537	-1.3943	.5367
Bisexual	Heterosexual	-.22256	.36722	.817	-1.1071	.6620
	Homosexual	.42885	.40083	.537	-.5367	1.3943

\*. The mean difference is significant at the 0.05 level.

a. GENDER = Male

**Homogeneous Subsets****PRETESTAV<sup>a</sup>**Tukey HSD<sup>b,c</sup>

SEXO	N	Subset for alpha = 0.05
		1
Homosexual	13	3.2462
Bisexual	4	3.6750
Heterosexual	41	3.8976
Sig.		.143

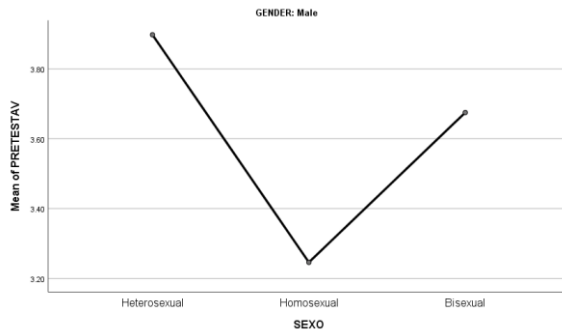
Means for groups in homogeneous subsets are displayed.<sup>a</sup>

a. GENDER = Male

b. Uses Harmonic Mean Sample Size = 8.539.

c. The group sizes are unequal. The harmonic mean of the group sizes is used. Type I error levels are not guaranteed.

## Means Plots



## GENDER = Female

### Descriptives<sup>a</sup>

PRETESTAV

	N	Mean	Std. Deviation	Std. Error	95% Confidence Interval for Mean			
					Lower Bound	Upper Bound		
Heterosexual	91	3.1242	.84582	.08867	2.9480	3.3003		
Homosexual	3	3.4333	.51316	.29627	2.1586	4.7081		
Bisexual	37	3.5405	.83048	.13653	3.2636	3.8174		
Asexual	1	3.8000	.	.	.	.		
Other	5	2.5000	1.27083	.56833	.9221	4.0779		
Total	137	3.2255	.87406	.07468	3.0779	3.3732		

### Test of Homogeneity of Variances<sup>a</sup>

		Levene Statistic	df1	df2	Sig.
PRETESTAV	Based on Mean	1.285	3	132	.282



Based on Median	.802	3	132	.495
Based on Median and with adjusted df	.802	3	118.569	.495
Based on trimmed mean	1.255	3	132	.293

a. GENDER = Female

### ANOVA<sup>a</sup>

PRETESTAV

	Sum of Squares	df	Mean Square	F	Sig.
Between Groups	7.698	4	1.924	2.641	.037
Within Groups	96.203	132	.729		
Total	103.901	136			

a. GENDER = Female

### Robust Tests of Equality of Means<sup>a,c</sup>

PRETESTAV

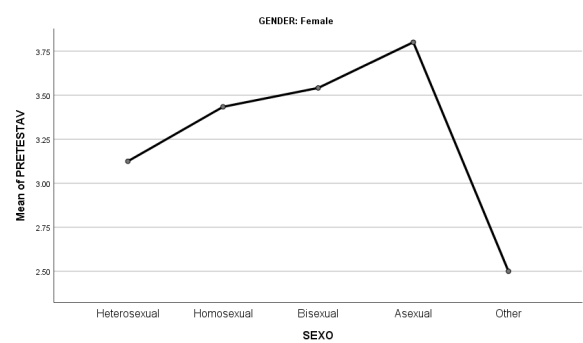
	Statistic <sup>b</sup>	df1	df2	Sig.
Welch	.	.	.	.
Brown-Forsythe	.	.	.	.

a. GENDER = Female

b. Asymptotically F distributed.

c. Robust tests of equality of means cannot be performed for PRETESTAV because at least one group has the sum of case weights less than or equal to 1.

### Means Plots



Oneway

GENDER = Male

Descriptives<sup>a</sup>

PACSTOTAL

	N	Mean	Std. Deviation	Std. Error	95% Confidence Interval for Mean			
					Lower Bound	Upper Bound		
Heterosexual	41	15.2927	7.48747	1.16935	12.9293	17.6560		
Homosexual	13	28.4615	9.26117	2.56859	22.8651	34.0580		
Bisexual	4	12.7500	8.77021	4.38511	-1.2054	26.7054		
Total	58	18.0690	9.67518	1.27041	15.5250	20.6129		

Test of Homogeneity of Variances<sup>a</sup>

		Levene Statistic	df1	df2	Sig.
PACSTOTAL	Based on Mean	.460	2	55	.634
	Based on Median	.336	2	55	.716
	Based on Median and with adjusted df	.336	2	45.278	.717
	Based on trimmed mean	.461	2	55	.633

a. GENDER = Male

**ANOVA<sup>a</sup>**

PACSTOTAL

	Sum of Squares	df	Mean Square	F	Sig.
Between Groups	1833.256	2	916.628	14.394	.000
Within Groups	3502.469	55	63.681		
Total	5335.724	57			

a. GENDER = Male

**Robust Tests of Equality of Means<sup>a</sup>**

PACSTOTAL

	Statistic <sup>b</sup>	df1	df2	Sig.
Welch	10.515	2	7.470	.007
Brown-Forsythe	11.859	2	11.461	.002

a. GENDER = Male

b. Asymptotically F distributed.

**Post Hoc Tests****Multiple Comparisons<sup>a</sup>**

Dependent Variable: PACSTOTAL

Tukey HSD

(I) SEXO	(J) SEXO	Mean Difference (I-J)	Std. Error	Sig.	95% Confidence Interval	
					Lower Bound	Upper Bound
Heterosexual	Homosexual	-13.16886 <sup>*</sup>	2.54003	.000	-19.2872	-7.0506
	Bisexual	2.54268	4.18013	.816	-7.5262	12.6116
Homosexual	Heterosexual	13.16886 <sup>*</sup>	2.54003	.000	7.0506	19.2872
	Bisexual	15.71154 <sup>*</sup>	4.56277	.003	4.7210	26.7021
Bisexual	Heterosexual	-2.54268	4.18013	.816	-12.6116	7.5262
	Homosexual	-15.71154 <sup>*</sup>	4.56277	.003	-26.7021	-4.7210

\*. The mean difference is significant at the 0.05 level.

a. GENDER = Male

Homogeneous Subsets

PACSTOTAL<sup>a</sup>

Tukey HSD<sup>b,c</sup>

SEXO	N	Subset for alpha = 0.05	
		1	2
Bisexual	4	12.7500	
Heterosexual	41	15.2927	
Homosexual	13		28.4615
Sig.		.788	1.000

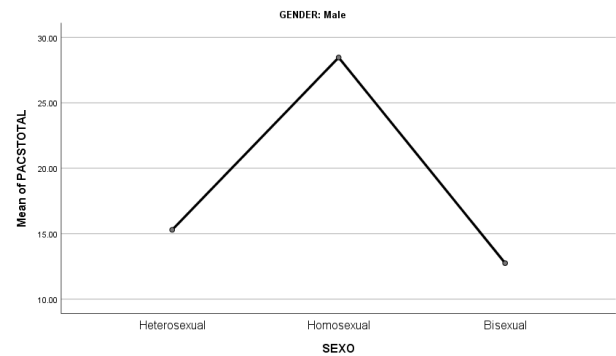
Means for groups in homogeneous subsets are displayed.<sup>a</sup>

a. GENDER = Male

b. Uses Harmonic Mean Sample Size = 8.539.

c. The group sizes are unequal. The harmonic mean of the group sizes is used. Type I error levels are not guaranteed.

Means Plots



GENDER = Female

**Descriptives<sup>a</sup>**

PACSTOTAL

	N	Mean	Std. Deviation	Std. Error	95% Confidence Interval for Mean			
					Lower Bound	Upper Bound		
Heterosexual	91	27.8242	11.07108	1.16056	25.5185	30.1298		
Homosexual	3	27.6667	5.68624	3.28295	13.5413	41.7921		
Bisexual	37	27.3784	11.15883	1.83450	23.6578	31.0989		
Asexual	1	30.0000	.	.	.	.		
Other	5	32.4000	9.76217	4.36578	20.2787	44.5213		
Total	137	27.8832	10.87230	.92888	26.0463	29.7201		

**Test of Homogeneity of Variances<sup>a</sup>**

		Levene Statistic	df1	df2	Sig.
PACSTOTAL	Based on Mean	.623	3	132	.601
	Based on Median	.541	3	132	.655
	Based on Median and with adjusted df	.541	3	128.336	.655
	Based on trimmed mean	.588	3	132	.624

a. GENDER = Female

**ANOVA<sup>a</sup>**

PACSTOTAL

	Sum of Squares	df	Mean Square	F	Sig.
Between Groups	116.375	4	29.094	.241	.915
Within Groups	15959.756	132	120.907		

Total	16076.131	136			
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a. GENDER = Female

Robust Tests of Equality of Means<sup>a,c</sup>

PACSTOTAL

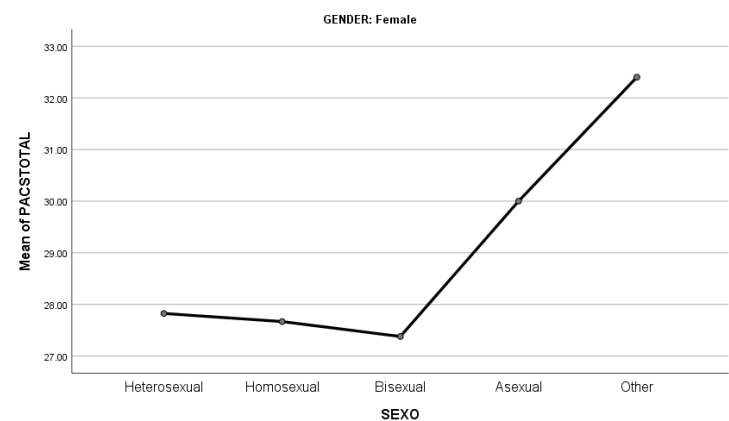
	Statistic <sup>b</sup>	df1	df2	Sig.
Welch	.	.	.	.
Brown-Forsythe	.	.	.	.

a. GENDER = Female

b. Asymptotically F distributed.

c. Robust tests of equality of means cannot be performed for PACSTOTAL because at least one group has the sum of case weights less than or equal to 1.

Means Plots



Oneway

GENDER = Male

Descriptives<sup>a</sup>

POSTTESTAV

N	Mean	Std. Deviation	Std. Error	95% Confidence Interval for Mean			
				Lower Bound	Upper Bound		

Heterosexual	41	3.9780	.73298	.11447	3.7467	4.2094		
Homosexual	13	3.4615	.85102	.23603	2.9473	3.9758		
Bisexual	4	3.6500	.25166	.12583	3.2496	4.0504		
Total	58	3.8397	.76271	.10015	3.6391	4.0402		

**Test of Homogeneity of Variances<sup>a</sup>**

		Levene Statistic	df1	df2	Sig.
POSTTESTAV	Based on Mean	1.411	2	55	.253
	Based on Median	1.534	2	55	.225
	Based on Median and with adjusted df	1.534	2	47.103	.226
	Based on trimmed mean	1.390	2	55	.258

a. GENDER = Male

**ANOVA<sup>a</sup>**

POSTTESTAV

	Sum of Squares	df	Mean Square	F	Sig.
Between Groups	2.788	2	1.394	2.524	.089
Within Groups	30.371	55	.552		
Total	33.159	57			

a. GENDER = Male

**Robust Tests of Equality of Means<sup>a</sup>**

POSTTESTAV

	Statistic <sup>b</sup>	df1	df2	Sig.
Welch	2.802	2	13.920	.095
Brown-Forsythe	3.582	2	21.567	.045

a. GENDER = Male

b. Asymptotically F distributed.

## Post Hoc Tests

### Multiple Comparisons<sup>a</sup>

Dependent Variable: POSTTESTAV

Tukey HSD

(I) SEXO	(J) SEXO	Mean Difference (I-J)	Std. Error	Sig.	95% Confidence Interval	
					Lower Bound	Upper Bound
Heterosexual	Homosexual	.51651	.23653	.083	-.0532	1.0862
	Bisexual	.32805	.38925	.678	-.6096	1.2657
Homosexual	Heterosexual	-.51651	.23653	.083	-1.0862	.0532
	Bisexual	-.18846	.42488	.897	-1.2119	.8350
Bisexual	Heterosexual	-.32805	.38925	.678	-1.2657	.6096
	Homosexual	.18846	.42488	.897	-.8350	1.2119

a. GENDER = Male

## Homogeneous Subsets

### POSTTESTAV<sup>a</sup>

Tukey HSD<sup>b,c</sup>

SEXO	N	Subset for alpha = 0.05
		1
Homosexual	13	3.4615
Bisexual	4	3.6500
Heterosexual	41	3.9780
Sig.		.330

Means for groups in homogeneous subsets are displayed.<sup>a</sup>

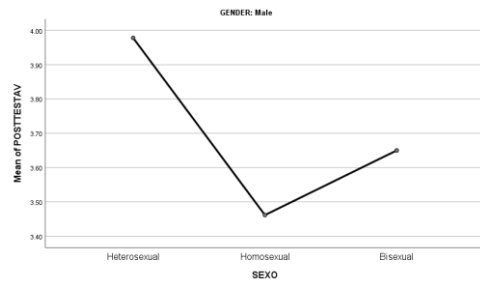
a. GENDER = Male



b. Uses Harmonic Mean Sample Size = 8.539.

c. The group sizes are unequal. The harmonic mean of the group sizes is used. Type I error levels are not guaranteed.

## Means Plots



## GENDER = Female

### Descriptives<sup>a</sup>

POSTTESTAV

	N	Mean	Std. Deviation	Std. Error	95% Confidence Interval for Mean			
					Lower Bound	Upper Bound		
Heterosexual	91	3.3011	.90092	.09444	3.1135	3.4887		
Homosexual	3	3.4667	.85049	.49103	1.3539	5.5794		
Bisexual	37	3.6541	.84149	.13834	3.3735	3.9346		
Asexual	1	4.0000	.	.	.	.		
Other	5	2.3800	1.44291	.64529	.5884	4.1716		
Total	137	3.3715	.92775	.07926	3.2148	3.5283		

### Test of Homogeneity of Variances<sup>a</sup>

		Levene Statistic	df1	df2	Sig.
POSTTESTAV	Based on Mean	1.616	3	132	.189
	Based on Median	.810	3	132	.490

Based on Median and with adjusted df	.810	3	94.712	.491
Based on trimmed mean	1.572	3	132	.199

a. GENDER = Female

### ANOVA<sup>a</sup>

POSTTESTAV

	Sum of Squares	df	Mean Square	F	Sig.
Between Groups	8.743	4	2.186	2.664	.035
Within Groups	108.316	132	.821		
Total	117.059	136			

a. GENDER = Female

### Robust Tests of Equality of Means<sup>a,c</sup>

POSTTESTAV

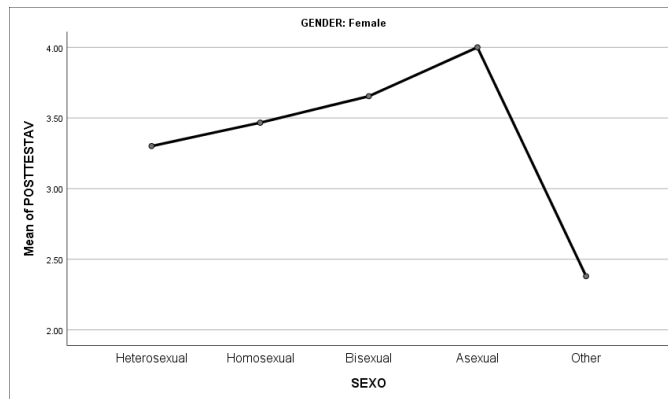
	Statistic <sup>b</sup>	df1	df2	Sig.
Welch	.	.	.	.
Brown-Forsythe	.	.	.	.

a. GENDER = Female

b. Asymptotically F distributed.

c. Robust tests of equality of means cannot be performed for POSTTESTAV because at least one group has the sum of case weights less than or equal to 1.

### Means Plots



DESCRIPTIVES VARIABLES=PACSTOTAL PRETESTAV POSTTESTAV /STATISTICS=MEAN STDDEV MIN MAX.

### GROUP MEAN T-TESTS

#### Descriptive Statistics

Groups		N	Minimum	Maximum	Mean	Std. Deviation
1.00	PACSTOTAL	24	.00	40.00	19.2083	10.63211
	PRETESTAV	24	1.70	4.90	3.5958	.78435
	POSTTESTAV	24	1.20	5.00	3.8042	.80568
	Valid N (listwise)	24				
2.00	PACSTOTAL	76	.00	44.00	26.6053	10.85182
	PRETESTAV	76	1.20	5.00	3.3066	.85328
	POSTTESTAV	76	1.00	5.00	3.4921	.89663
	Valid N (listwise)	76				
3.00	PACSTOTAL	34	.00	44.00	17.2647	9.01618
	PRETESTAV	34	2.60	5.00	3.8353	.70233
	POSTTESTAV	34	2.60	5.00	3.8647	.74218
	Valid N (listwise)	34				
4.00	PACSTOTAL	61	.00	44.00	29.4754	10.77436
	PRETESTAV	61	1.20	4.80	3.1246	.89604
	POSTTESTAV	61	1.10	5.00	3.2213	.95116

Valid N (listwise)	61				
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T-TEST GROUPS=GroupIC(1 2) /MISSING=ANALYSIS /VARIABLES=PRETESTAV POSTTESTAV /CRITERIA=CI(.95).

## T-Test

### Group Statistics

Groups		GroupIC	N	Mean	Std. Deviation	Std. Error Mean
1.00	PRETESTAV	1.00	24	3.5958	.78435	.16010
		2.00	0 <sup>a</sup>	.	.	.
	POSTTESTAV	1.00	24	3.8042	.80568	.16446
		2.00	0 <sup>a</sup>	.	.	.
2.00	PRETESTAV	1.00	76	3.3066	.85328	.09788
		2.00	0 <sup>a</sup>	.	.	.
	POSTTESTAV	1.00	76	3.4921	.89663	.10285
		2.00	0 <sup>a</sup>	.	.	.
3.00	PRETESTAV	1.00	0 <sup>a</sup>	.	.	.
		2.00	34	3.8353	.70233	.12045
	POSTTESTAV	1.00	0 <sup>a</sup>	.	.	.
		2.00	34	3.8647	.74218	.12728
4.00	PRETESTAV	1.00	0 <sup>a</sup>	.	.	.
		2.00	61	3.1246	.89604	.11473
	POSTTESTAV	1.00	0 <sup>a</sup>	.	.	.
		2.00	61	3.2213	.95116	.12178

a. t cannot be computed because at least one of the groups is empty.

**T-Test - Not Significant post test between male control and intervention groups.**

### Group Statistics

	Groups	N	Mean	Std. Deviation	Std. Error Mean
POSTTESTAV	IM	24	3.8042	.80568	.16446
	CM	34	3.8647	.74218	.12728

**Independent Samples Test**

		Levene's Test for Equality of Variances		t-test for Equality of Means	
		F	Sig.	t	df
POSTTESTAV	Equal variances assumed	.237	.628	-.295	56
	Equal variances not assumed			-.291	47.043

**Independent Samples Test**

		t-test for Equality of Means		
		Sig. (2-tailed)	Mean Difference	Std. Error Difference
POSTTESTAV	Equal variances assumed	.769	-.06054	.20499
	Equal variances not assumed	.772	-.06054	.20796

**Independent Samples Test**

		t-test for Equality of Means	
		95% Confidence Interval of the Difference	
		Lower	Upper
POSTTESTAV	Equal variances assumed	-.47119	.35011
	Equal variances not assumed	-.47889	.35781

**T-Test - Not Sig for Sexuality****SEXO = Heterosexual**

**Group Statistics<sup>a</sup>**

	Groups	N	Mean	Std. Deviation	Std. Error Mean
POSTTESTAV	IM	12	4.0667	.66104	.19082
	CM	29	3.9414	.76882	.14277

a. SEXO = Heterosexual

**Independent Samples Test<sup>a</sup>**

		Levene's Test for Equality of Variances		t-test for Equality of Means	
		F	Sig.	t	df
POSTTESTAV	Equal variances assumed	.651	.425	.493	39
	Equal variances not assumed			.526	23.828

**Independent Samples Test<sup>a</sup>**

		t-test for Equality of Means		
		Sig. (2-tailed)	Mean Difference	Std. Error Difference
POSTTESTAV	Equal variances assumed	.625	.12529	.25400
	Equal variances not assumed	.604	.12529	.23832

**Independent Samples Test<sup>a</sup>**

		t-test for Equality of Means	
		95% Confidence Interval of the Difference	
		Lower	Upper
POSTTESTAV	Equal variances assumed	-.38848	.63906
	Equal variances not assumed	-.36677	.61734

a. SEXO = Heterosexual

SEXO = Homosexual

Group Statistics<sup>a</sup>

Groups		N	Mean	Std. Deviation	Std. Error Mean
POSTTESTAV	IM	10	3.4900	.95621	.30238
	CM	3	3.3667	.46188	.26667

a. SEXO = Homosexual

Independent Samples Test<sup>a</sup>

		Levene's Test for Equality of Variances		t-test for Equality of Means	
		F	Sig.	t	df
POSTTESTAV	Equal variances assumed	.376	.552	.211	11
	Equal variances not assumed			.306	7.642

Independent Samples Test<sup>a</sup>

		t-test for Equality of Means		
		Sig. (2-tailed)	Mean Difference	Std. Error Difference
POSTTESTAV	Equal variances assumed	.837	.12333	.58394
	Equal variances not assumed	.768	.12333	.40317

Independent Samples Test<sup>a</sup>

		t-test for Equality of Means	
		95% Confidence Interval of the Difference	
		Lower	Upper
POSTTESTAV	Equal variances assumed	-1.16190	1.40857

	Equal variances not assumed		-.81401	1.06068
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a. SEXO = Homosexual

SEXO = Bisexual

Group Statistics<sup>a</sup>

Groups		N	Mean	Std. Deviation	Std. Error Mean
POSTTESTAV	IM	2	3.8000	.28284	.20000
	CM	2	3.5000	.14142	.10000

a. SEXO = Bisexual

Independent Samples Test<sup>a</sup>

		Levene's Test for Equality of Variances		t-test for Equality of Means	
		F	Sig.	t	df
POSTTESTAV	Equal variances assumed			1.342	2
	Equal variances not assumed			1.342	1.471

Independent Samples Test<sup>a</sup>

		t-test for Equality of Means		
		Sig. (2-tailed)	Mean Difference	Std. Error Difference
POSTTESTAV	Equal variances assumed	.312	.30000	.22361
	Equal variances not assumed	.350	.30000	.22361

Independent Samples Test<sup>a</sup>

		t-test for Equality of Means	
		95% Confidence Interval of the Difference	
		Lower	Upper



POSTTESTAV	Equal variances assumed		-.66210	1.26210
	Equal variances not assumed		-1.08370	1.68370

a. SEXO = Bisexual

### SEXO = Asexual

#### Group Statistics<sup>a</sup>

	Groups	N	Mean	Std. Deviation	Std. Error Mean
POSTTESTAV	IM	0 <sup>b</sup>			
	CM	0 <sup>b</sup>			

a. SEXO = Asexual

b. t cannot be computed because at least one of the groups is empty.

### SEXO = Other

#### Group Statistics<sup>a</sup>

	Groups	N	Mean	Std. Deviation	Std. Error Mean
POSTTESTAV	IM	0 <sup>b</sup>			
	CM	0 <sup>b</sup>			

a. SEXO = Other

b. t cannot be computed because at least one of the groups is empty.

## Correlations - Significant relationship between PACS

### SEXO = Heterosexual

#### Correlations<sup>a</sup>

		POSTTESTAV	PRETESTAV	PACSTOTAL
POSTTESTAV	Pearson Correlation	1	.932**	-.492**
	Sig. (2-tailed)		.000	.000
	N	132	132	132

PRETESTAV	Pearson Correlation	.932**	1	-.562**
	Sig. (2-tailed)	.000		.000
	N	132	132	132
PACSTOTAL	Pearson Correlation	-.492**	-.562**	1
	Sig. (2-tailed)	.000	.000	
	N	132	132	132

\*\* . Correlation is significant at the 0.01 level (2-tailed).

a. SEXO = Heterosexual

**SEXO = Homosexual**

#### Correlations<sup>a</sup>

		POSTTESTAV	PRETESTAV	PACSTOTAL
POSTTESTAV	Pearson Correlation	1	.858**	-.012
	Sig. (2-tailed)		.000	.963
	N	16	16	16
PRETESTAV	Pearson Correlation	.858**	1	-.159
	Sig. (2-tailed)	.000		.557
	N	16	16	16
PACSTOTAL	Pearson Correlation	-.012	-.159	1
	Sig. (2-tailed)	.963	.557	
	N	16	16	16

\*\* . Correlation is significant at the 0.01 level (2-tailed).

a. SEXO = Homosexual

**SEXO = Bisexual**

#### Correlations<sup>a</sup>

		POSTTESTAV	PRETESTAV	PACSTOTAL
POSTTESTAV	Pearson Correlation	1	.880**	-.423**

PRETESTAV	Sig. (2-tailed)		.000	.006
	N	41	41	41
	Pearson Correlation	.880**	1	-.459**
PACSTOTAL	Sig. (2-tailed)	.000		.003
	N	41	41	41
	Pearson Correlation	-.423**	-.459**	1
	Sig. (2-tailed)	.006	.003	
	N	41	41	41

\*\* . Correlation is significant at the 0.01 level (2-tailed).

a. SEXO = Bisexual

## T-Test

### Paired Samples Statistics

Groups			Mean	N	Std. Deviation
IM	Pair 1	PRETESTAV	3.5958	24	.78435
		POSTTESTAV	3.8042	24	.80568
IF	Pair 1	PRETESTAV	3.3066	76	.85328
		POSTTESTAV	3.4921	76	.89663
CM	Pair 1	PRETESTAV	3.8353	34	.70233
		POSTTESTAV	3.8647	34	.74218
CF	Pair 1	PRETESTAV	3.1246	61	.89604
		POSTTESTAV	3.2213	61	.95116

### Paired Samples Test

#### Paired Differences

Groups	Mean	Std. Deviation	Std. Error Mean
--------	------	----------------	-----------------

IM	Pair 1	PRETESTAV - POSTTESTAV	-.20833	.36703	.07492
IF	Pair 1	PRETESTAV - POSTTESTAV	-.18553	.38112	.04372
CM	Pair 1	PRETESTAV - POSTTESTAV	-.02941	.25409	.04358
CF	Pair 1	PRETESTAV - POSTTESTAV	-.09672	.33861	.04335

### Paired Samples Test

			Paired Differences				
			Mean	Std. Deviation	Std. Error Mean	95% Confidence Interval of the Difference	
Groups						Lower	Upper
IM	Pair 1	PRETESTAV - POSTTESTAV	-.20833	.36703	.07492	-.36332	-.05332
IF	Pair 1	PRETESTAV - POSTTESTAV	-.18553	.38112	.04372	-.27262	-.09844
CM	Pair 1	PRETESTAV - POSTTESTAV	-.02941	.25409	.04358	-.11807	.05926
IF	Pair 1	PRETESTAV - POSTTESTAV	-.09672	.33861	.04335	-.18344	-.01000

### Paired Samples Test

Groups			Sig. (2-tailed)
IM	Pair 1	PRETESTAV - POSTTESTAV	.011
IF	Pair 1	PRETESTAV - POSTTESTAV	.000

CM	Pair 1	PRETESTAV - POSTTESTAV	.504
CF	Pair 1	PRETESTAV - POSTTESTAV	.029

**T-Test****Paired Samples Statistics**

Groups			Mean	N	Std. Deviation	Std. Error Mean
IM	Pair 1	PRETESTAV	3.5958	24	.78435	.16010
		POSTTESTAV	3.8042	24	.80568	.16446
IF	Pair 1	PRETESTAV	3.3066	76	.85328	.09788
		POSTTESTAV	3.4921	76	.89663	.10285
CM	Pair 1	PRETESTAV	3.8353	34	.70233	.12045
		POSTTESTAV	3.8647	34	.74218	.12728
CF	Pair 1	PRETESTAV	3.1246	61	.89604	.11473
		POSTTESTAV	3.2213	61	.95116	.12178

**Paired Samples Correlations**

Groups			N	Correlation	Sig.
IM	Pair 1	PRETESTAV & POSTTESTAV	24	.894	.000
IF	Pair 1	PRETESTAV & POSTTESTAV	76	.906	.000
CM	Pair 1	PRETESTAV & POSTTESTAV	34	.940	.000
CF	Pair 1	PRETESTAV & POSTTESTAV	61	.935	.000

**Paired Samples Test**

## Paired Differences

Groups	Mean	Std. Deviation	Std. Error Mean
--------	------	----------------	-----------------

IM	Pair 1	PRETESTAV - POSTTESTAV	-.20833	.36703	.07492
IF	Pair 1	PRETESTAV - POSTTESTAV	-.18553	.38112	.04372
CM	Pair 1	PRETESTAV - POSTTESTAV	-.02941	.25409	.04358
CF	Pair 1	PRETESTAV - POSTTESTAV	-.09672	.33861	.04335

**Paired Samples Test**

## Paired Differences

Groups			95% Confidence Interval of the Difference			
			Lower	Upper		
IM	Pair 1	PRETESTAV - POSTTESTAV	-.36332	-.05335	-2.781	23
IF	Pair 1	PRETESTAV - POSTTESTAV	-.27262	-.09844	-4.244	75
CM	Pair 1	PRETESTAV - POSTTESTAV	-.11807	.05925	-.675	33
CF	Pair 1	PRETESTAV - POSTTESTAV	-.18344	-.01000	-2.231	60

**Paired Samples Test**

Groups			Sig. (2-tailed)
IM	Pair 1	PRETESTAV - POSTTESTAV	.011
IF	Pair 1	PRETESTAV - POSTTESTAV	.000
CM	Pair 1	PRETESTAV - POSTTESTAV	.504
CF	Pair 1	PRETESTAV - POSTTESTAV	.029

T-Test

Group Statistics					
	Groups	N	Mean	Std. Deviation	Std. Error Mean
PACSTOTAL	CM	34	17.2647	9.01618	1.54626
	CF	61	29.4754	10.77436	1.37952
PRETESTAV	CM	34	3.8353	.70233	.12045
	CF	61	3.1246	.89604	.11473
POSTTESTAV	CM	34	3.8647	.74218	.12728
	CF	61	3.2213	.95116	.12178

Independent Samples Test									
		Levene's Test for Equality of Variances		t-test for Equality of Means					
		F	Sig.	t	df	Sig. (2-tailed)	Mean Difference	Std. Error Difference	95% Confidence Interval of the Difference Lower Upper
PACSTOTAL	Equal variances assumed	2.882	.093	5.602	93	.000	12.21070	2.17987	16.53950 7.88191
	Equal variances not assumed			5.893	78.935	.000	12.21070	2.07219	16.33536 8.08605

PRETESTAV	Equal variance assumed	1.645	.203	3.989	93	.000	.71070	.17817	.35690	1.06451
	Equal variance not assumed			4.273	82.632	.000	.71070	.16634	.37983	1.04157
POSTTESTAV	Equal variance assumed	2.036	.157	3.406	93	.001	.64339	.18891	.26825	1.01854
	Equal variance not assumed			3.652	82.876	.000	.64339	.17616	.29301	.99378

## T-Test

### Paired Samples Statistics

SEXO			Mean	N	Std. Deviation	Std. Error Mean
Heterosexual	Pair 1	PRETESTAV	3.3644	132	.88102	.07668
		POSTTESTAV	3.5114	132	.90585	.07884
Homosexual	Pair 1	PRETESTAV	3.2812	16	.67845	.16961
		POSTTESTAV	3.4625	16	.82209	.20552
Bisexual	Pair 1	PRETESTAV	3.5537	41	.79439	.12406
		POSTTESTAV	3.6537	41	.80128	.12514
Asexual	Pair 1	PRETESTAV	3.8000	1 <sup>a</sup>	.	.
		POSTTESTAV	4.0000	1 <sup>a</sup>	.	.
Other	Pair 1	PRETESTAV	2.5000	5	1.27083	.56833



	POSTTESTAV	2.3800	5	1.44291	.64529
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a. The correlation and t cannot be computed because the sum of caseweights is less than or equal to 1.

Paired Samples Correlations<sup>a</sup>

SEXO			N	Correlation	Sig.
Heterosexual	Pair 1	PRETESTAV & POSTTESTAV	132	.932	.000
Homosexual	Pair 1	PRETESTAV & POSTTESTAV	16	.858	.000
Bisexual	Pair 1	PRETESTAV & POSTTESTAV	41	.880	.000
Other	Pair 1	PRETESTAV & POSTTESTAV	5	.986	.002

a. No statistics are computed for one or more split files

Paired Samples Test<sup>a</sup>

SEXO			Paired Differences		
			Mean	Std. Deviation	Std. Error Mean
Heterosexual	Pair 1	PRETESTAV - POSTTESTAV	-.14697	.32957	.02869
Homosexual	Pair 1	PRETESTAV - POSTTESTAV	-.18125	.42303	.10576
Bisexual	Pair 1	PRETESTAV - POSTTESTAV	-.10000	.39115	.06109
Other	Pair 1	PRETESTAV - POSTTESTAV	.12000	.28636	.12806

Paired Samples Test<sup>a</sup>

			Paired Differences		
			95% Confidence Interval of the Difference		
SEXO			Lower	Upper	

Heterosexual	Pair 1	PRETESTAV - POSTTESTAV	-.20372	-.09022	-5.123
Homosexual	Pair 1	PRETESTAV - POSTTESTAV	-.40667	.04417	-1.714
Bisexual	Pair 1	PRETESTAV - POSTTESTAV	-.22346	.02346	-1.637
Other	Pair 1	PRETESTAV - POSTTESTAV	-.23556	.47556	.937

**Paired Samples Test<sup>a</sup>**

SEXO			df	Sig. (2-tailed)
Heterosexual	Pair 1	PRETESTAV - POSTTESTAV	131	.000
Homosexual	Pair 1	PRETESTAV - POSTTESTAV	15	.107
Bisexual	Pair 1	PRETESTAV - POSTTESTAV	40	.109
Other	Pair 1	PRETESTAV - POSTTESTAV	4	.402

a. No statistics are computed for one or more split files

**T-Test****Group Statistics**

	Groups	N	Mean	Std. Deviation	Std. Error Mean
PACSTOTAL	IF	76	26.6053	10.85182	1.24479
	CF	61	29.4754	10.77436	1.37952
PRETESTAV	IF	76	3.3066	.85328	.09788
	CF	61	3.1246	.89604	.11473
POSTTESTAV	IF	76	3.4921	.89663	.10285
	CF	61	3.2213	.95116	.12178

**Independent Samples Test**

Levene's Test for Equality of  
Variances

F

Sig.

t-test for Equality of  
Means

t

df

PACSTOTAL	Equal variances assumed	.025	.876	-1.543	135
	Equal variances not assumed			-1.545	129.043
PRETESTAV	Equal variances assumed	.179	.673	1.213	135
	Equal variances not assumed			1.207	125.809
POSTTESTAV	Equal variances assumed	.185	.668	1.710	135
	Equal variances not assumed			1.699	125.170

**Independent Samples Test**

t-test for Equality of Means

		Sig. (2-tailed)	Mean Difference	Std. Error Difference
PACSTOTAL	Equal variances assumed	.125	-2.87015	1.85958
	Equal variances not assumed	.125	-2.87015	1.85811
PRETESTAV	Equal variances assumed	.227	.18199	.14999
	Equal variances not assumed	.230	.18199	.15081
POSTTESTAV	Equal variances assumed	.090	.27079	.15837
	Equal variances not assumed	.092	.27079	.15940

**Independent Samples Test**

t-test for Equality of Means

95% Confidence Interval of the Difference

		Lower	Upper
PACSTOTAL	Equal variances assumed	-6.54782	.80752
	Equal variances not assumed	-6.54645	.80615
PRETESTAV	Equal variances assumed	-.11465	.47863

	Equal variances not assumed	-.11645	.48043
POSTTESTAV	Equal variances assumed	-.04241	.58400
	Equal variances not assumed	-.04468	.58627

**T-Test****Group Statistics**

	Groups	N	Mean	Std. Deviation	Std. Error Mean
PACSTOTAL	IM	24	19.2083	10.63211	2.17027
	IF	76	26.6053	10.85182	1.24479
PRETESTAV	IM	24	3.5958	.78435	.16010
	IF	76	3.3066	.85328	.09788
POSTTESTAV	IM	24	3.8042	.80568	.16446
	IF	76	3.4921	.89663	.10285

**Independent Samples Test**

		Levene's Test for Equality of Variances		t-test for Equality of Means	
		F	Sig.	t	df
PACSTOTAL	Equal variances assumed	.002	.966	-2.925	98
	Equal variances not assumed			-2.957	39.317
PRETESTAV	Equal variances assumed	.200	.656	1.475	98
	Equal variances not assumed			1.541	41.622
POSTTESTAV	Equal variances assumed	2.057	.155	1.521	98
	Equal variances not assumed			1.609	42.515

**Independent Samples Test**

t-test for Equality of Means				
		Sig. (2-tailed)	Mean Difference	Std. Error Difference
PACSTOTAL	Equal variances assumed	.004	-7.39693	2.52894
	Equal variances not assumed	.005	-7.39693	2.50191
PRETESTAV	Equal variances assumed	.143	.28925	.19612
	Equal variances not assumed	.131	.28925	.18765
POSTTESTAV	Equal variances assumed	.131	.31206	.20514
	Equal variances not assumed	.115	.31206	.19397

### Independent Samples Test

t-test for Equality of Means				
95% Confidence Interval of the Difference				
		Lower	Upper	
PACSTOTAL	Equal variances assumed	-12.41552	-2.37834	
	Equal variances not assumed	-12.45622	-2.33764	
PRETESTAV	Equal variances assumed	-.09995	.67846	
	Equal variances not assumed	-.08955	.66805	
POSTTESTAV	Equal variances assumed	-.09504	.71916	
	Equal variances not assumed	-.07925	.70337	

### Regression

	Mean	Std. Deviation	N
PACSTOTAL	24.9641	11.42811	195
GENDER	1.70	.458	195
ETHNIC	1.21	.726	195
SEXO	1.62	1.000	195

PRETESTAV	3.3774	.86680	195
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**Correlations**

		PACSTOTAL	GENDER	ETHNIC	SEXO
Pearson Correlation	PACSTOTAL	1.000	.394	-.158	.135
	GENDER	.394	1.000	-.136	.169
	ETHNIC	-.158	-.136	1.000	-.046
	SEXO	.135	.169	-.046	1.000
	PRETESTAV	-.523	-.270	.071	-.020
Sig. (1-tailed)	PACSTOTAL	.	.000	.014	.030
	GENDER	.000	.	.029	.009
	ETHNIC	.014	.029	.	.263
	SEXO	.030	.009	.263	.
	PRETESTAV	.000	.000	.163	.390
N	PACSTOTAL	195	195	195	195
	GENDER	195	195	195	195
	ETHNIC	195	195	195	195
	SEXO	195	195	195	195
	PRETESTAV	195	195	195	195

**Correlations**

PRETESTAV

Pearson Correlation	PACSTOTAL	-.523
	GENDER	-.270
	ETHNIC	.071
	SEXO	-.020
	PRETESTAV	1.000

Sig. (1-tailed)	PACSTOTAL	.000
	GENDER	.000
	ETHNIC	.163
	SEXO	.390
	PRETESTAV	.
N	PACSTOTAL	195
	GENDER	195
	ETHNIC	195
	SEXO	195
	PRETESTAV	195

**Variables Entered/Removed<sup>a</sup>**

Model	Variables Entered	Variables Removed	Method
1	PRETESTAV, SEXO, ETHNIC, GENDER <sup>b</sup>	.	Enter

a. Dependent Variable: PACSTOTAL

b. All requested variables entered.

**Model Summary<sup>b</sup>**

Model	R	R Square	Adjusted R Square	Std. Error of the Estimate
1	.597 <sup>a</sup>	.356	.343	9.26556

a. Predictors: (Constant), PRETESTAV, SEXO, ETHNIC, GENDER

b. Dependent Variable: PACSTOTAL

**ANOVA<sup>a</sup>**

Model	Sum of Squares	df	Mean Square	F	Sig.
-------	----------------	----	-------------	---	------

1	Regression	9025.123	4	2256.281	26.281	.000 <sup>b</sup>
	Residual	16311.625	190	85.851		
	Total	25336.749	194			

a. Dependent Variable: PACSTOTAL

b. Predictors: (Constant), PRETESTAV, SEXO, ETHNIC, GENDER

### Coefficients<sup>a</sup>

		Unstandardized Coefficients		Standardized Coefficients		
Model		B	Std. Error	Beta	t	Sig.
1	(Constant)	34.645	4.492		7.713	.000
	GENDER	6.159	1.540	.247	3.999	.000
	ETHNIC	-1.401	.925	-.089	-1.515	.132
	SEXO	.913	.675	.080	1.352	.178
	PRETESTAV	-5.907	.798	-.448	-7.404	.000

### Coefficients<sup>a</sup>

		95.0% Confidence Interval for B		Correlations		
Model		Lower Bound	Upper Bound	Zero-order	Partial	Part
1	(Constant)	25.785	43.505			
	GENDER	3.121	9.197	.394	.279	.233
	ETHNIC	-3.226	.424	-.158	-.109	-.088
	SEXO	-.419	2.246	.135	.098	.079
	PRETESTAV	-7.481	-4.333	-.523	-.473	-.431

### Coefficients<sup>a</sup>

### Collinearity Statistics

Model	Tolerance	VIF
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1	(Constant)		
	GENDER	.888	1.126
	ETHNIC	.980	1.021
	SEXO	.970	1.031
	PRETESTAV	.925	1.081

a. Dependent Variable: PACSTOTAL

**Collinearity Diagnostics<sup>a</sup>**

Model	Dimension	Eigenvalue	Condition Index	Variance Proportions			
				(Constant)	GENDER	ETHNIC	SEXO
1	1	4.447	1.000	.00	.00	.01	.01
	2	.285	3.947	.00	.00	.47	.44
	3	.174	5.051	.01	.05	.43	.53
	4	.078	7.536	.00	.37	.03	.02
	5	.015	17.070	.99	.57	.06	.00

**Collinearity Diagnostics<sup>a</sup>**

Model	Dimension	Variance Proportions	
		PRETESTAV	
1	1		.00
	2		.00
	3		.04
	4		.36
	5		.59

a. Dependent Variable: PACSTOTAL

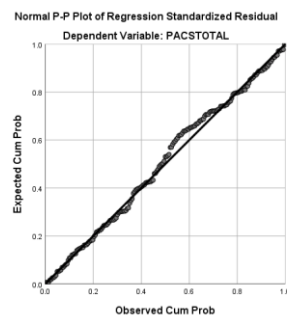
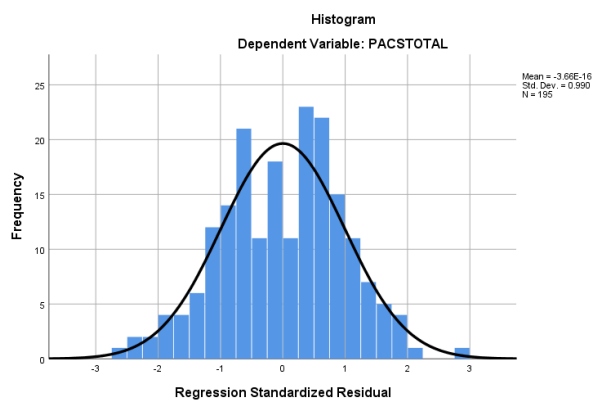
**Residuals Statistics<sup>a</sup>**

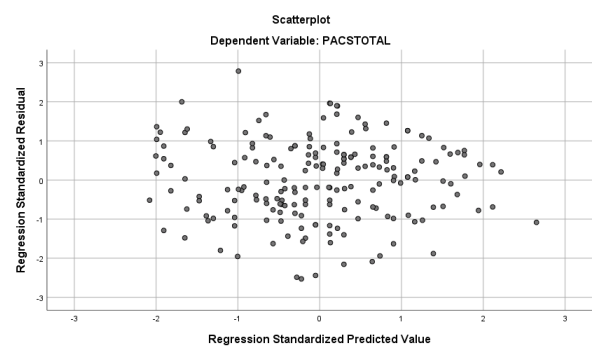
	Minimum	Maximum	Mean	Std. Deviation	N
Predicted Value	10.7802	43.0394	24.9641	6.82065	195

Std. Predicted Value	-2.080	2.650	.000	1.000	195
Standard Error of Predicted Value	.825	3.723	1.400	.493	195
Adjusted Predicted Value	9.6852	44.1143	24.9550	6.87013	195
Residual	-23.43708	25.80864	.00000	9.16954	195
Std. Residual	-2.529	2.785	.000	.990	195
Stud. Residual	-2.556	2.815	.000	1.003	195
Deleted Residual	-24.32915	26.35765	.00908	9.41395	195
Stud. Deleted Residual	-2.594	2.868	.000	1.007	195
Mahal. Distance	.543	30.322	3.979	4.442	195
Cook's Distance	.000	.072	.005	.010	195
Centered Leverage Value	.003	.156	.021	.023	195

a. Dependent Variable: PACSTOTAL

## Charts





Correlations

Descriptive Statistics

	Mean	Std. Deviation	N
POSTTESTAV	3.5108	.90573	195
PRETESTAV	3.3774	.86680	195
PACSTOTAL	24.9641	11.42811	195

Correlations

		POSTTESTAV	PRETESTAV	PACSTOTAL
POSTTESTAV	Pearson Correlation	1	.923**	-.459**
	Sig. (2-tailed)		.000	.000
	N	195	195	195
PRETESTAV	Pearson Correlation	.923**	1	-.523**
	Sig. (2-tailed)	.000		.000
	N	195	195	195
PACSTOTAL	Pearson Correlation	-.459**	-.523**	1
	Sig. (2-tailed)	.000	.000	
	N	195	195	195

\*\* . Correlation is significant at the 0.01 level (2-tailed).

Nonparametric Correlations

Correlations

			POSTTESTAV	PRETESTAV
Spearman's rho	POSTTESTAV	Correlation Coefficient	1.000	.905**
		Sig. (2-tailed)	.	.000
		N	195	195
	PRETESTAV	Correlation Coefficient	.905**	1.000
		Sig. (2-tailed)	.000	.
		N	195	195
	PACSTOTAL	Correlation Coefficient	-.448**	-.537**
		Sig. (2-tailed)	.000	.000
		N	195	195

### Correlations

			PACSTOTAL
Spearman's rho	POSTTESTAV	Correlation Coefficient	-.448**
		Sig. (2-tailed)	.000
		N	195
	PRETESTAV	Correlation Coefficient	-.537**
		Sig. (2-tailed)	.000
		N	195
	PACSTOTAL	Correlation Coefficient	1.000
		Sig. (2-tailed)	.
		N	195

\*\* . Correlation is significant at the 0.01 level (2-tailed).

### Reliability

Scale: ALL VARIABLES

### Case Processing Summary

		N	%
Cases	Valid	195	100.0
	Excluded <sup>a</sup>	0	.0
	Total	195	100.0

a. Listwise deletion based on all variables in the procedure.

### Reliability Statistics

Cronbach's Alpha	Cronbach's Alpha Based on Standardized Items	N of Items
.958	.959	11

### Item Statistics

	Mean	Std. Deviation	N
PACSQ1	2.4462	1.11268	195
PACSQ2	2.4615	1.15424	195
PACSQ3	2.2513	1.16364	195
PACSQ4	2.2615	1.27962	195
PACSQ5	2.1897	1.43946	195
PACSQ6	2.3179	1.19769	195
PACSQ7	1.9744	1.27803	195
PACSQ8	2.3846	1.20599	195
PACS9	2.1026	1.21407	195
PACS10	1.7231	1.31024	195
PACSQ11	2.8513	1.21564	195

### Inter-Item Correlation Matrix

PACSQ1	PACSQ2	PACSQ3	PACSQ4	PACSQ5	PACSQ6	PACSQ7
--------	--------	--------	--------	--------	--------	--------

PACSQ1	1.000	.726	.705	.714	.652	.701	.610
PACSQ2	.726	1.000	.800	.707	.670	.740	.658
PACSQ3	.705	.800	1.000	.755	.682	.730	.705
PACSQ4	.714	.707	.755	1.000	.784	.729	.735
PACSQ5	.652	.670	.682	.784	1.000	.703	.709
PACSQ6	.701	.740	.730	.729	.703	1.000	.739
PACSQ7	.610	.658	.705	.735	.709	.739	1.000
PACSQ8	.740	.783	.794	.773	.733	.786	.739
PACS9	.683	.724	.766	.742	.679	.729	.869
PACS10	.626	.617	.651	.751	.752	.697	.728
PACSQ11	.453	.519	.537	.476	.493	.528	.485

### Inter-Item Correlation Matrix

	PACSQ8	PACS9	PACS10	PACSQ11
PACSQ1	.740	.683	.626	.453
PACSQ2	.783	.724	.617	.519
PACSQ3	.794	.766	.651	.537
PACSQ4	.773	.742	.751	.476
PACSQ5	.733	.679	.752	.493
PACSQ6	.786	.729	.697	.528
PACSQ7	.739	.869	.728	.485
PACSQ8	1.000	.765	.668	.493
PACS9	.765	1.000	.718	.510
PACS10	.668	.718	1.000	.414
PACSQ11	.493	.510	.414	1.000

### Summary Item Statistics

	Mean	Minimum	Maximum	Range	Maximum / Minimum	Variance
Inter-Item Correlations	.680	.414	.869	.455	2.098	.010

**Summary Item Statistics**

	N of Items
Inter-Item Correlations	11

**Item-Total Statistics**

	Scale Mean if Item Deleted	Scale Variance if Item Deleted	Corrected Item- Total Correlation	Squared Multiple Correlation	Cronbach's Alpha if Item Deleted
PACSQ1	22.5179	111.065	.780	.652	.955
PACSQ2	22.5026	109.427	.822	.734	.954
PACSQ3	22.7128	108.711	.846	.757	.953
PACSQ4	22.7026	106.375	.856	.759	.952
PACSQ5	22.7744	104.526	.816	.714	.954
PACSQ6	22.6462	108.178	.842	.726	.953
PACSQ7	22.9897	107.000	.831	.803	.953
PACSQ8	22.5795	107.482	.866	.781	.952
PACS9	22.8615	107.563	.856	.821	.953
PACS10	23.2410	107.514	.787	.685	.955
PACSQ11	22.1128	114.400	.566	.353	.962

**Scale Statistics**

Mean	Variance	Std. Deviation	N of Items
24.9641	130.602	11.42811	11

**Reliability****Scale: ALL VARIABLES****Case Processing Summary**

		N	%
Cases	Valid	195	100.0
	Excluded <sup>a</sup>	0	.0
	Total	195	100.0

a. Listwise deletion based on all variables in the procedure.

### Reliability Statistics

Cronbach's Alpha	Cronbach's Alpha Based on Standardized Items	N of Items
.949	.950	10

### Item Statistics

	Mean	Std. Deviation	N
BASPREQ1	3.5692	.82429	195
BASPREQ2	3.0974	1.00296	195
BASPREQ3	4.0769	.94117	195
BASPREQ4	3.4205	1.07818	195
BASPREQ5	3.2462	1.01581	195
BASPREQ6	3.2359	1.11491	195
BASPREQ7	3.3487	1.06075	195
BASPREQ8	3.2718	1.12743	195
BASPREQ9	3.2154	1.13281	195
BASPREQ10	3.2923	1.13596	195

### Inter-Item Correlation Matrix



	BASPREQ1	BASPREQ2	BASPREQ3	BASPREQ4	BASPREQ5	BASPREQ6
BASPREQ1	1.000	.737	.568	.704	.583	.650
BASPREQ2	.737	1.000	.713	.806	.543	.772
BASPREQ3	.568	.713	1.000	.740	.503	.680
BASPREQ4	.704	.806	.740	1.000	.639	.805
BASPREQ5	.583	.543	.503	.639	1.000	.658
BASPREQ6	.650	.772	.680	.805	.658	1.000
BASPREQ7	.609	.685	.639	.709	.518	.741
BASPREQ8	.587	.615	.544	.626	.472	.634
BASPREQ9	.641	.775	.676	.782	.514	.727
BASPREQ10	.565	.672	.683	.699	.478	.715

### Inter-Item Correlation Matrix

	BASPREQ7	BASPREQ8	BASPREQ9	BASPREQ10
BASPREQ1	.609	.587	.641	.565
BASPREQ2	.685	.615	.775	.672
BASPREQ3	.639	.544	.676	.683
BASPREQ4	.709	.626	.782	.699
BASPREQ5	.518	.472	.514	.478
BASPREQ6	.741	.634	.727	.715
BASPREQ7	1.000	.632	.649	.698
BASPREQ8	.632	1.000	.656	.646
BASPREQ9	.649	.656	1.000	.696
BASPREQ10	.698	.646	.696	1.000

**Summary Item Statistics**

	Mean	Minimum	Maximum	Range	Maximum / Minimum	Variance
Inter-Item Correlations	.653	.472	.806	.333	1.705	.007

**Summary Item Statistics**

	N of Items
Inter-Item Correlations	10

**Item-Total Statistics**

	Scale Mean if Item Deleted	Scale Variance if Item Deleted	Corrected Item- Total Correlation	Squared Multiple Correlation	Cronbach's Alpha if Item Deleted
BASPREQ1	30.2051	64.525	.750	.617	.945
BASPREQ2	30.6769	60.849	.849	.770	.941
BASPREQ3	29.6974	62.800	.768	.627	.944
BASPREQ4	30.3538	59.374	.879	.794	.939
BASPREQ5	30.5282	63.683	.643	.502	.949
BASPREQ6	30.5385	59.126	.861	.765	.940
BASPREQ7	30.4256	60.967	.787	.643	.943
BASPREQ8	30.5026	61.189	.719	.547	.947
BASPREQ9	30.5590	59.495	.821	.711	.942
BASPREQ10	30.4821	60.045	.784	.653	.943

**Scale Statistics**

Mean	Variance	Std. Deviation	N of Items
33.7744	75.134	8.66801	10