

AN ABSTRACT OF THE DISSERTATION OF

Deborah H. John for the degree of Doctor of Philosophy in Exercise and Sport Science presented on December 4, 2003.

Title: Objectified Body Consciousness: A Theory-to-Practice Approach

Abstract Approved:

Signature redacted for privacy.

Vicki Ebbeck

Objectified body consciousness (OBC) is a third-person perspective that locates an individual's body-self relationship primarily in the appearance of her/his body as an outside observer rather than in how her/his body feels or what her/his body can do. We know very little about OBC in relation to physical self variables recognized in the sport and exercise psychology literature and shown to be associated with physical activity behavior, or about our ability to intervene and bring about change with OBC.

In Study One, a cross-sectional study, the notion of objectified body consciousness and the associations with certain self-conceptions and physical activity behaviors were measured in undergraduate students ($N = 394$). Females reported significantly higher levels of OBC body surveillance and OBC body shame than males with no significant difference in the levels of OBC appearance control beliefs between females and males. Canonical correlation analyses revealed significant and different relationships between the set of OBC variables and the set of self-concept variables for both females and males. A second canonical correlation, used to explore the relationship between the set of three OBC variables and physical activity behavior (weekly vigorous physical activity and MET levels), was non-significant for both females and males.

In Study Two, using a theory-to-practice approach, an attempt was made to change undergraduates' OBC, as measured by the OBC Scales (McKinley & Hyde, 1996), through the design and delivery of a body consciousness-raising curriculum (BCRC). In a 2 (time) x 2

(gender) x 5 (class) quasi-experimental study, undergraduate female and male students ($N = 87$) were participants in the BCRC, which was designed to raise awareness of the influence of sociocultural messages on their body-self relationship. Data collected from undergraduate students ($N = 114$) enrolled in courses with similar and dissimilar content served as a comparison. RM MANOVA revealed a significant 3-way interaction $F(12, 189) = 1.843, p = .039$. Follow-up analyses showed that the interaction was primarily influenced by within-class gender differences across time with no significant between-class differences. A qualitative evaluation of the BCRC from the students' perspective contributes to the discussion of the effectiveness of the curriculum.

©Copyright by Deborah J. John

Defense Date: December 4, 2003

All Rights Reserved

Objectified Body Consciousness: A Theory-to-Practice Approach

by
Deborah H. John

A DISSERTATION

submitted to

Oregon State University

in partial fulfillment of
the requirements for the
degree of

Doctor of Philosophy

Presented December 4, 2003
Commencement June 2004

Doctor of Philosophy dissertation of Deborah H. John presented on December 4, 2003.

APPROVED:

Signature redacted for privacy.

Vicki Ebbeck, representing Exercise and Sport Science

Signature redacted for privacy.

Anthony Wilcox, Head of the Department of Exercise and Sport Science

Signature redacted for privacy.

Sally Francis, Dean of the Graduate School

I understand that my dissertation will become part of the permanent collection of Oregon State University libraries. My signature below authorizes release of my dissertation to any reader upon request.

Signature redacted for privacy.

Deborah H. John, Author

ACKNOWLEDGMENTS

For her gracious mentorship, guidance, and support, the author would like to thank her advisor, Vicki Ebbeck, Associate Professor, Department of Exercise and Sport Science, Oregon State University, Corvallis, OR. For expertise in review of the BCRC program materials, the author would like to express gratitude to her minor professor, Susan Shaw, Associate Professor, Women Studies Program, Oregon State University, Corvallis, OR, as well as an anonymous panel of experts on feminist theory and pedagogy. For their cooperative efforts during data collections and curriculum delivery, the author would like to thank the instructors of all classes involved in this research process. For their assistance with data management, the author would like to thank the undergraduate and graduate students that contributed as part of the research staff. The author would also like to thank all study participants in this research endeavor, particularly those who participated in the BCRC program and volunteered their supplemental voice, which contributed to the richness of the data. Finally, the author would like to express sincere appreciation and deepest gratitude to those family members and special friends who sacrificed time together, offered a helping hand, and unconditionally supported a pursuit of purpose. You are my foundation and my refuge.

TABLE OF CONTENTS

	<u>Page</u>
1	Objectified Body Consciousness: Introducing A Theory-to-Practice Approach..... 1
2	Objectified Body Consciousness: Generality and Gender- Differentiated Associations with Physical Self-Conceptions and Physical Activity Behavior..... 2
	2.1 Abstract 3
	2.2 Methods 11
	2.3 Results 14
	2.4 Discussion 19
	2.5 References 28
	2.6 Tables 33
3	Objectified Body Consciousness: Effectiveness of A Body Consciousness-Raising Curriculum..... 39
	3.1 Abstract 40
	3.2 Methods 45
	3.3 Results 49
	3.4 Discussion 56
	3.5 References 61
	3.6 Tables 64
4	Objectified Body Consciousness: In Conclusion..... 67
	Bibliography 68
	Appendices 74
	Objectified Body Consciousness Scale Questionnaire 75
	Physical Self-Conceptions Questionnaire..... 79
	Physical Activity Questionnaire..... 86
	Body Consciousness-Raising Curriculum..... 89

LIST OF TABLES

<u>Table</u>	<u>Page</u>
2.1 Simple Correlations Among All Variables: Females	33
2.2 Simple Correlations Among All Variables: Males	35
2.3 Descriptive Statistics and Gender Differences on Measured Variables.....	37
2.4 Canonical Loadings for OBC and Self-Conceptions with Females and Males.....	38
3.1 Descriptive Statistics and Gender Differences on OBC Variables Week One.....	64
3.2 Descriptive Statistics and Gender Differences on OBC Variables Week Ten.....	65
3.3 Effect Sizes for Within-Class and Between-BCRC Groups by Gender	66

CHAPTER 1

Objectified Body Consciousness: Introducing a Theory-to-Practice Approach

This dissertation presents two scholarly works investigating objectified body consciousness (OBC), a feminist body-image perspective, in the physical domain. The second chapter details a cross-sectional study designed to explore the generality of OBC, employing the Objectified Body Consciousness Scale (OBCS; McKinley & Hyde, 1996; see Appendix A) in undergraduate females and males, as well as investigating the gender-differentiated associations among OBC, physical self-conceptions, and physical activity behavior. Primarily, this exploratory design facilitated measurement of OBC in females and males enrolled in a co-educational course with physical activity-based content, thereby allowing investigation into gender-differentiated relationships among OBC, certain physical self variables, and general physical activity behavior. Such empirical work provided support for the third chapter that details a quasi-experimental study, the design and delivery of a body consciousness-raising curriculum (BCRC; see Appendix B). The intervention study proposed to change levels of the three OBC subcomponents, body surveillance, body shame, and appearance control beliefs, in undergraduate females and males through increased sociocultural competency. The significance of these projects are to further investigate OBC, a relatively new theoretical viewpoint of negative body experiences, that has the potential to impact other self-views as well as physical activity behavior. Additionally, there has been no research to date that has explored the potential of changing the negative body experiences captured by the OBCS as a result of a cognitively-based, co-educationally delivered intervention.

CHAPTER 2

Objectified Body Consciousness: Generality and Gender-Differentiated Associations with
Physical Self-Conceptions and Physical Activity Behavior

Deborah H. John and Vicki Ebbeck

Oregon State University

Abstract

The notion of objectified body consciousness (OBC), a feminist body-image perspective, and the associations with certain self-conceptions and physical activity behaviors were measured in undergraduate students ($N=394$). Consistent with previous research findings (McKinley, 1998), females reported significantly higher levels of OBC body surveillance and OBC body shame than males with no significant difference in the levels of OBC appearance control beliefs between females and males. Canonical correlation was used to explore the multivariate relationship between the set of OBC variables (body surveillance, body shame, and appearance control beliefs) and the set of self-concept variables (body self-efficacy, physical self-perceptions including strength, body attractiveness, conditioning, and sport competence, physical self-worth, and global self-esteem). The analysis revealed significant and different relationships between the set of OBC variables and the set of self-concept variables for both females and males. The strength of association between the two sets of variables accounted for as much as 48% of the shared variance between the canonical variates for females and 29% of the shared variance between the canonical variates for males. A second canonical correlation, used to explore the relationship between the set of three OBC variables and physical activity behavior (weekly vigorous physical activity and MET levels), was non-significant for both females and males.

KEYWORDS: Body image; physical self-concept.

Objectified Body Consciousness: Generality and Gender-Differentiated Associations with
Physical Self-Conceptions and Physical Activity Behavior

Body experience is a noteworthy topic to study in sport and exercise psychology as evident by the extensive literature on body image and body-related issues (Bane & McAuley, 1998). Research has consistently demonstrated strong relationships between persons' perceptions regarding their physical appearance and a variety of cognitions, affects, and behaviors (Thompson, Heinberg, Altabe, & Tantleff-Dunn, 1999). While cultural body standards provide idealistic guidelines to which individuals compare their bodies, either in totality or as segmented parts, women generally report greater perceived discrepancies between the cultural standards and their physical selves (Rieves & Cash, 1996). In addition, maintaining a body standard that closely approximates the ideal body through a physically active lifestyle could be seen as beneficial to health, a source of competence information, and promoting a positive self-concept for both women and men. Yet, working to achieve an unrealistic body standard without success or refusing to surrender unrealistic body goals could compromise one's physical self-worth and overall self-esteem, as well as result in negative behavioral outcomes, either withdrawal from physical activity or excessive exercise behaviors (Heinberg, Thompson, & Matzon, 2001). In consideration of the vast empirical evidence of gender differentiated body consciousness (Muth & Cash, 1997), as well as the potential for body consciousness to have significant bi-directional associations with individual psychological factors (Harter, 1999a), we thought it important to explore the generality of objectified body consciousness, a feminist body-image perspective, and the associations with certain self-conceptions and activity behaviors in the physical domain.

Objectified Body Consciousness

Objectified body consciousness (McKinley, 1995), a feminist body image theory, is the term presented to explain the experience of viewing one's body as an object separate from one's self and the beliefs and behaviors that support this experience. McKinley and Hyde (1996)

identified three components that influence objectified body consciousness (OBC) and are considered important to an individual's body experience: (a) body surveillance, (b) internalization of cultural body standards, and (c) beliefs about one's ability to control one's appearance.

McKinley and Hyde conceptualized body surveillance to represent the amount of time one spends watching her/his body as an outside observer. They contended that this type of consciousness is informed by comparisons of the physical self with cultural standards, which may lead to observed discrepancies, and ultimately challenges to physical self-worth and psychological well-being.

Body shame was introduced as the measure of internalization of cultural body standards and defined as feeling negatively about the self when cultural body standards are not achieved.

Appearance control beliefs reflect a measure of the extent to which an individual believes she/he can control her/his appearance and emphasizes the contradictory relationship some have with their bodies. Believing in the ability to control body appearance may act as a source of efficacy information and contribute to higher physical self-worth. Conversely, believing that one can and does not, or that one cannot, control the appearance of one's body may prove to be a source of information that challenges one's sense of personal control and competence, contributing to lower physical self-worth.

OBC theory using the three-component model has successfully predicted women's bodily experiences in cross-sectional research with predominantly European American undergraduates (McKinley, 1995; McKinley & Hyde, 1996). The OBC scales measuring body surveillance, body shame, and appearance control beliefs have established internal consistency, test-retest reliability, and a supported factor structure with female undergraduates (McKinley, 1995), midlife women (McKinley & Hyde, 1996), and male undergraduates (McKinley, 1998). For young women, higher body surveillance was related to lower body satisfaction, more eating disturbances, lower levels of self-determination and self-acceptance, as well as lower body esteem (McKinley & Hyde, 1996). Internalization of cultural body standards, as measured by the OBC body shame

scale, was found to be the strongest predictor of women's bodily experiences and psychological well-being of the three OBC scales. McKinley and Hyde found higher body shame to be consistently and significantly related to higher levels of body surveillance, lower body satisfaction, lower psychological well-being, lower body esteem, and more eating disturbances in young women. Appearance control beliefs have been positively associated with restricted eating behavior, increased exercise behavior, and disordered eating behaviors in some samples, however, typically unrelated to body surveillance and body shame scales. Additionally, appearance control beliefs have demonstrated significant positive associations with measures of psychological well-being, body esteem, and body satisfaction in both young and mid-life women (McKinley & Hyde, 1996). For men, body surveillance and body shame were positively related with no relationship between those and appearance control beliefs. Likewise for men, both body surveillance and body shame have demonstrated negative associations with body esteem while there was no association between appearance control beliefs and body esteem (McKinley, 1998).

Only one published study has utilized the OBC scales with males, a cross-sectional design examining the mediating effects of OBC on female and male undergraduates' body esteem and actual vs. ideal weight discrepancy (McKinley, 1998). This data revealed the OBC instrument demonstrated a similar factor structure with males as with the female samples with the exception of two control belief items. The internal consistencies (α) of the OBC scales were moderate for males (body surveillance = .79, body shame = .73, and control beliefs = .64) in comparison to moderate to high for females (body surveillance = .89, body shame = .75, and control beliefs = .72). Additionally, gender differences emerged between males and females in two of the three OBC scales with females reporting higher levels of body surveillance and body shame than males with no significant gender differences in control beliefs. McKinley (1998) concluded that the OBC instrument was a viable tool for body-related research with undergraduate females and

males and suggested that the OBC components appear to relate in predicted ways to women and men's body esteem.

Recently, the OBC measure has been used in research validating a self-presentation in exercise instrument (Conroy, Motl, & Hall, 2000), exploring women's self-presentation motives and body image behaviors (Greenleaf, 2002), and assessing the possible relationship of young women's sport and exercise participation during high school (Parsons & Betz, 2001). Although the instrument is being used in various feminist-inspired and exercise behavior-related projects, there is only one published study exploring the notion of OBC with females and males (McKinley, 1998). Likewise, we could locate no research exploring gender-differentiated associations between the OBC scales and various physical self-conceptions as well as physical activity behaviors. Most of the OBC work to date has focused on women, eating behaviors, and body image variables. We believe it is important to explore OBC theory and the OBC scales with females and males, in relation to established self variables examined in sport and exercise psychology, and in the context of general physical activity behavior.

Physical Self-Conceptions

In U.S. culture, the body in terms of appearance, capabilities, and capacity to communicate messages on or about the self, has been assigned significant meaning. The physical self may be regarded as the semblance of the inner self (Fox, 2000) and is of considerable importance to human functioning. In his review of self-esteem, self-perceptions, and exercise, Fox acknowledged the importance of the physical self in the self-system because of the unique role of the body as an interface between the individual and the environment. It is easier to consider the implications of the physical self with a greater understanding of the role of the physical self in the self-system.

Sonstroem, Harlow, and Josephs (1994) modified Sonstroem and Morgan's (1989) Exercise and Self-Esteem Model (EXSEM) to depict the bi-directionality of global self-esteem

through self-perceptions at various levels of specificity. At the base are self-efficacy statements, theoretically defined as situation-specific self-referenced confidence predictions of success in a valued task, which influence and are influenced directly by a physically based, skill development intervention. Self-efficacy beliefs influence perceptions of strength, body attractiveness, conditioning, and sport competence, which subsequently influence appraisals of perceived physical worth and acceptance. Physical self-worth refers to evaluative statements of personal ability in the physical domain, and physical self-acceptance refers to a rating of contentedness with one's body and/or its physical performance. According to the expanded EXSEM, increases in physical self-worth and acceptance, in turn, positively affect global self-esteem, an overall affirmation of the degree to which a person perceives her/himself to be competent and acceptable, dependent on whatever criteria that person uses to determine competency and acceptance (Fox, 1997).

Body appearance is qualitatively different from other competence areas in that it is an ever-present feature of the self, always on display for others to see. Additionally, the cultural images of the female body ideal are problematical in that they are unattainable by the vast majority of girls and women in our culture. Most females fall short of these body ideals, resulting in the empirical evidence that females feel particularly inadequate in terms of their body attractiveness (Muth & Cash, 1997). The research consistently demonstrates that perceived physical appearance and self-esteem are interconnected and that the relationship is bi-directional (Harter, 1999a). Zumph and Harter (as cited in Harter, 1999a), examining the role of appearance perceptions, found physical appearance is the sub-domain most highly and consistently associated with global self-evaluations. They found that from early childhood through middle-aged adults, self-esteem was more highly related to perceived physical attractiveness than to actual physical attractiveness, and the evaluation of one's looks took precedence over other domains as the primary predictor of self-worth (Harter, 1999a). Harter identified as a contributing factor, "the

emphasis that contemporary U.S. society places on appearance at every age” (Harter, 1999a, p. 160).

Early research has identified gender-differentiated patterns favoring males on all physical self-perceptions with college-aged samples (Crocker & Ellsworth, 1990; Fox & Vehnekamp, 1990), adults (Sonstroem, Speliotis, & Fava, 1992), and athletes (Curry & Rehm, 1997). More recently, Hayes, Crocker, and Kowalski (1999) found similar gender-differentiated patterns, reporting body attractiveness was an important determinant of physical and global self-esteem for women and men. Krane, Waldron, Michalenok, and Stiles-Shipley (2001) used a feminist cultural studies perspective to gain a better understanding of the relationships among body image, eating, and exercise in female exercisers and athletes. Throughout focus group interviews, the women consistently articulated the cultural standard for female bodies and acknowledged that achieving this standard often motivated their physical activity behaviors.

Physical Activity Behavior

Gender-differentiated perceptions of physical competencies have been attributed to the fact that traditionally sport has been considered a highly valued male domain with more participatory opportunities and role models for men. Despite the post-Title IX gains, athletic women have not yet procured recognition as role models nor have the societal values of female athleticism and physicality increased congruently with escalating participatory opportunity (Boutilier & SanGiovanni, 1994). Without social change that fosters equity in both merit and opportunity for women’s physicality including resistance to the dominant cultural forces that support body ideals, the social and psychological consequences will continue to translate as gender differences in physical activity behavior in terms of value, effort, choice, and persistence, with significant impact on quality of life and well-being.

Very little is known about OBC in relation to physical activity behaviors. McKinley and Hyde (1996) found exercising to regulate weight was the only body-controlling behavior other

than restricted eating to significantly relate to various items of the OBC measure. They reported significant positive associations between the OBC appearance control belief scale and exercising to control weight for both young and middle-aged women. Conversely, Greenleaf (2002) reported no associations between the OBC scales and exercise behaviors in female exercisers. In a comparison of female athletes (intercollegiate and recreational), exercisers, and non-active women, Kretchmar (2001) suggested that OBC varied as a result of both physical activity type and level as well as racial/ethnic identity. Female athletes scored lower on the OBC body surveillance scale than either exercisers or non-active women and African American women scored lower on OBC body shame than White women.

Our knowledge of OBC in relation to physical self variables recognized in the sport and exercise psychology literature and shown to be associated with physical activity behavior is limited. The purpose of this project was to examine the generality of OBC, measuring the levels of the three OBC scales in undergraduate female and male students, and to determine any gender differences. We hypothesized that, based on previous research findings (McKinley, 1998), females would report significantly higher levels of OBC body surveillance and OBC body shame than males with no significant difference in the levels of OBC appearance control beliefs between females and males. Additionally, we examined the relationships between OBC measured by the OBC scales (body surveillance, body shame, and appearance control beliefs) and psychological factors (body self-efficacy, physical self-perceptions, physical self-worth and acceptance, and global self-esteem) depicted in the expanded EXSEM (Sonstroem, Harlow, & Josephs, 1994). We hypothesized that there would be significant negative relationships between body surveillance and body shame as well as significant positive relationships between appearance control beliefs and the set of self-concept variables. Lastly, we examined the relationships between OBC measured by the OBC scales and self-reported general physical activity behavior. We hypothesized that there would be significant negative relationships between body shame and

physical activity behavior, while there would be significant positive associations between body surveillance and appearance control beliefs with physical activity behavior.

Methods

Participants and Procedure

All procedures were enacted in accordance with those approved by a university's Institutional Review Board. Questionnaires were administered by the researcher with the aid of a research assistant to female ($N = 231$, aged $M = 19.23$, $SD = 2.57$ years) and male ($N = 163$, aged $M = 19.52$, $SD = 2.46$ years) undergraduate students. The students were predominantly European American (76.6%), middle to upper middle class (86.2%) and enrolled in an undergraduate baccalaureate core course concerned with lifetime fitness for health. The researcher verbally invited all class members in attendance to participate in a research study to explore college students' perceptions of their body-related experiences. It was explained that only those students agreeing to have their data used in analyses should sign the informed consent document before completing the surveys. The questionnaire packet took approximately 30 minutes to complete and was administered at the beginning of a class period to all students in all three sections of the course. The questionnaire packet included a demographic profile, as well as measures of OBC, physical self-conceptions, and physical activity behavior.

Measures

Objectified Body Consciousness. OBC was measured using the Objectified Body Consciousness Scale (OBCS; McKinley & Hyde, 1996). The OBCS is a 24-item instrument requiring responders to indicate agreement with various body-related statements on a 7-point Likert-type scale ranging from 1 *strongly disagree* to 7 *strongly agree* with a middle anchor point 4 *neither agree or disagree*. The instrument consists of three 8-item subscales measuring body surveillance, body shame, and appearance control beliefs. A high scorer as defined by the OBC body surveillance scale would be an individual who frequently views her/his body from the

viewpoint of an outside observer and thinks of her/his body more in terms of how it looks than how it feels or performs. Strongly agreeing with item statements such as "*during the day, I think about how I look many times*" would reflect a higher level of OBC body surveillance. A high scorer on the OBC body shame scale would internalize cultural body standards and be shameful if she/he did not meet cultural expectations of the ideal body. Agreement with statements such as "*when I'm not the size I think I should be, I feel ashamed*" indicates a higher level of OBC body shame. An individual who scores high on the OBC control beliefs scale would believe that, with enough effort, she/he could control her/his body appearance and weight. A person who scores higher on OBC appearance control beliefs would strongly agree with items like "*I can weigh what I'm supposed to if I try hard enough.*" The OBC instrument has demonstrated validity and reliability with female (McKinley, 1995) and male (McKinley, 1998) undergraduates.

Self-Conceptions. Body self-efficacy was measured using a 14-item, 6-point Likert-type (1 *strongly disagree* to 6 *strongly agree*) body self-confidence scale that was adapted from a self-confidence instrument developed for gender research by Hoffman, Borders, and Hattie (2000). The Hoffman self-confidence measure was initially developed using undergraduates and has demonstrated validity and reliability with female and male students (Hoffman, Borders, & Hattie, 2000). The Physical Self-Perception Profile (PSPP; Fox, 1990), which includes five 6-item subscale measures of perceived strength, body attractiveness, conditioning, sport competence, as well as physical self-worth, was used to measure physical self variables. The PSPP was augmented with a 6-item physical acceptance scale modified from the physical self-worth subscale of the PSPP to measure physical acceptance and the 6-item general self-esteem subscale of the Self-Perception Profile for College Students (SPP-CS; Neeman & Harter, 1986). Since the conception of Sonstroem and Morgan's (1989) model, physical self-acceptance has been elusive to empirical scrutiny and a well-developed instrument to assess physical self-acceptance is wanting. In an attempt to measure the construct at the same level as physical self-worth and as put

forth in the expanded EXSEM (Sonstroem, Harlow, & Josephs, 1994), the physical self-worth subscale of the PSPP (Fox, 1990) was modified to represent physical self-acceptance by replacing the worth term with an acceptance term. For example, the resulting acceptance item would read "*some people feel extremely accepting of who they are and what they can do physically...*" modified from the original self-worth statement "*some people feel extremely proud of who they are and what they can do physically...*" The resulting 42-item self-concept measure utilized a structured alternative format whereby participants chose one of two statements that best describe them and then rated whether the description is "*sort of true for me*" or "*really true for me*," producing a 4-point scale (see Appendix B). The validity and reliability of the PSPP (Fox & Corbin, 1989) and the SPP-CS (Neeman & Harter, 1986) have been established with college-aged students.

Physical Activity. The Aerobics Center Longitudinal Study Physical Activity Questionnaire (ACLS Questionnaire; Kohl, Blair, Paffenbarger, Macera, & Kronenfeld, 1997) was used to measure self-reported regular physical activity behaviors. Participants indicate (*no/yes*) in which of the 14 specific sport, exercise, and lifestyle physical activity categories they regularly participate (minimally once per week over the last three months) and the level of participation (number of sessions per week and duration of each session). Scoring involves assigning a MET value to reported activities, calculating MET-h/wk for each reported activity, and summing for a total MET-h/wk. Additionally, participants indicate the frequency of vigorous activity by responding to the question, "*How many times a week do you engage in vigorous physical activity long enough to work up a sweat?*" The ACLS Questionnaire (Appendix C) was initially validated with males and has been shown to reliably measure vigorous physical activity, defined as "frequency of sweating" (Kohl et al., 1997).

Data Analyses

The purpose of this project was to first examine the generality of OBC by measuring the levels of the three OBC scales in undergraduate female and male students and to determine any gender differences. Data were first screened for missing variables and in each case where only one subscale item per case was missing, a mean was calculated from the completed subscale items and inserted to replace the missing value, representing approximately 4% of the cases used in the analyses. Cases with two or more missing items per subscale were excluded from analyses, with our resulting $N = 394$ used in analyses reflecting approximately 91% of the original data set. The numbers of females and males excluded from the data set were equally distributed.

Measures were reviewed for internal consistency reliability and bivariate correlations were used to further screen data for meeting multivariate assumptions and to identify simple significant associations. To examine the generality of OBC, descriptive statistics (M , SD) were calculated and levels (*high/low*) as well as distributions (*percentages*) were determined. A multivariate analysis of variance (MANOVA) was used to test our hypothesis that there would be gender differences with the OBC variables. Two separate canonical correlation analyses were used to assess the multivariate relationship between the set of OBC variables and the set of self-concept variables as well as between the set of OBC variables and the set of physical activity behavior variables. These analyses were conducted by gender following significant MANOVAs revealing gender differences on most measured variables. Significance was established at $\alpha = .01$ and our sample size provided a more than acceptable case-to-variable ratio for canonical correlation as well as MANOVA analyses (Tabachnick & Fidell, 2001).

Results

Scale Reliabilities. All subscales used in the present study demonstrated acceptable internal consistency with Cronbach's alpha coefficients $\geq .70$ (Nunnally, 1978). For females, the alpha coefficients for the OBC scales were .83 for body surveillance, .85 for body shame, and .72

for control beliefs. With regard to the reliability of self-conception subscales, Cronbach's alphas were .90 for self-esteem, .92 for physical acceptance and physical self-worth alike, as well as .90 for both perceived strength and body attractiveness, .89 for conditioning, and .92 for sport competence. Cronbach's alpha of the body self-efficacy scale was .83. For males, the alpha coefficients for the OBC scales were .81 for body surveillance, .79 for body shame, and .72 for control beliefs. Reliability coefficients for the self-conception subscales were .82 for self-esteem, .84 for physical acceptance and .85 for physical self-worth, as well as .89, .85, .86, and .88 for perceived strength, body attractiveness, conditioning, and sport competence, respectively. Cronbach's alpha of the body self-efficacy scale was .85.

Correlational Analyses. Pearson product-moment correlations were calculated among all variables included in the study for both genders and results are presented in Tables 1 and 2. The correlations revealed strong bivariate associations between the variables physical self-worth and acceptance for both males ($r = .84$) and females ($r = .92$). To avoid issues of redundancy, Tabachnick and Fidell's (2001) criteria of .90 as a maximum association between two variables was adopted. Considering that the instrument used to measure physical self-acceptance was actually modified from an established physical self-worth subscale measure, the physical self-acceptance variable was excluded in all further analyses. The OBC variables body surveillance and body shame were significantly and positively related for both males and females. For females, while OBC body surveillance was significantly and negatively correlated with all self-concept variables, using Gravetter and Wallnau's (2004) criteria for evaluating the coefficient of determination (r^2), a moderate association was demonstrated with perceived body attractiveness ($r^2 = .17$), physical self-worth ($r^2 = .24$), and general self-esteem ($r^2 = .14$). For males, of the significant and negative relationships with self-conceptions and OBC body surveillance, only general self-esteem ($r^2 = .09$) showed a moderate association. OBC body shame was significantly and negatively correlated with OBC control beliefs as well as most self-conceptions and

demonstrated a strong association with perceived body attractiveness ($r^2 = .30$), physical self-worth ($r^2 = .32$), and general self-esteem ($r^2 = .36$), for females. However, for males, of the significant and negative associations, OBC body shame was moderately correlated with only general self-esteem ($r^2 = .21$), and physical activity METS-hr/wk ($r^2 = .11$). OBC control beliefs were significantly and positively associated with all self-conceptions for females and only body self-efficacy, perceived strength, and frequency of vigorous physical activity for males yet the coefficients of determination for all significant associations were considered small ($r^2 \leq .07$).

[Insert Table 1 and Table 2 approximately here.]

Descriptive Statistics and Gender Differences. In general, this sample of undergraduate students demonstrated significant gender differences on most variables of interest. Table 3 reports descriptive statistics (M , SD) by gender for all measured variables. Our female and male undergraduates scored lower on body surveillance, similarly on body shame, and higher on appearance control beliefs than McKinley's (1998) mixed-gender sample. A multivariate analysis of variance (MANOVA) was conducted to test for gender differences on the three OBC dependent variables: body surveillance, body shame, and appearance control beliefs. A significant multivariate main effect emerged, $F(3, 423) = 25.18, p < .001$. Subsequent univariate analyses revealed two significant differences between female and male responders. Specifically, females reported higher levels ($p < .001$) of OBC body surveillance ($M = 4.56$) and body shame ($M = 3.49$) than males ($M = 3.78$ and 2.78 , respectively), with no significant differences in appearance control beliefs between males and females. An analysis of the distribution of scores confirmed that women, in addition to scoring significantly higher on both body surveillance and body shame, were more likely to be high scorers (measured as scoring above the mean and reported as a percentage) on both body surveillance (53%) and appearance control beliefs (54%) when compared to the percentages of high scoring men (45% and 49%, respectively). About 45% of women and men were high scorers (in comparison to their respective means) on the OBC body

shame scale. Two additional MANOVAs were conducted to discern any gender differences on the self-concept variables, $F(6, 402) = .874, p < .001$ as well as the physical activity variables, $F(2, 416) = .914, p < .001$ both revealing significant main effects. Follow-up univariate analyses confirmed significant gender differences on all measured self-concept and physical activity variables with males reporting higher scores than females (see Table 3).

[Insert Table 3 approximately here.]

Objectified Body Consciousness, Physical Self-Conceptions, and Physical Activity

Behavior: Females. The multivariate relationships between the set of OBC variables and the set of self-conception variables, as well as between the set of OBC variables and physical activity behavior variables were examined by gender using separate canonical correlation analyses. For females, the first canonical correlation analysis revealed two significant functions between the set of OBC variables and the set of self-conception variables, Wilks' lambda = .462, $p < .001$ and Wilks' lambda = .889, $p = .009$. The canonical correlations were $Rc = .63$ and $.28$, respectively, indicating a moderate relationship between the variable sets in the first significant function, with the second significant function being of less practical significance. Canonical loadings equal to or greater than $.30$ were considered to make a significant contribution to the multivariate association (Tabachnick & Fidell, 2001). Inspection of the canonical loadings presented in Table 4 suggests that for the first significant function, higher levels of body surveillance and body shame levels accompanied somewhat by lower control beliefs were associated with lower levels of all self-conceptions except for the perceived strength variable which made no significant contribution to the association. For the second significant function, when body surveillance was higher, perceived strength and conditioning, as well as physical self-worth were lower. The strength of association between the two sets of variables was clarified through the calculation of a redundancy statistic, which reflects the amount of variance in one set of variables explained by the other set of variables. The redundancy index for the set of OBC variables indicated that self-

conceptions explained 26.2 % of the variance in the set of OBC variables. For the set of self-concept variables, the redundancy statistic suggested that the set of OBC variables explained 21.4 % of the variance in the set of self-concept variables. A second canonical correlation revealed no significant association between the set of OBC variables and the set of physical activity behavior variables.

[Insert Table 4 approximately here.]

Objectified Body Consciousness, Physical Self-Conceptions, and Physical Activity

Behavior: Males. For males, the first analysis revealed two significant functions between the set of OBC variables and the set of self-conception variables, Wilks' lambda = .562, $p < .001$ and Wilks' lambda = .791, $p < .001$, respectively. The canonical correlations were $R_c = .54$ and $.40$, indicating moderate relationships between the variable sets. Inspection of the canonical loadings suggests that for the first significant function, when body surveillance and body shame were high, perceived body attractiveness and sport competence as well as physical self-worth and general self-esteem, the main contributor, were low. For the second significant function, body surveillance and appearance control beliefs levels positively corresponded to body self-efficacy, forming the primary contribution, as well as self-perceptions of strength, conditioning, and sport competence. The redundancy index for the set of OBC variables indicated that self-conceptions explained 18.5% of the variance in the set of OBC variables, while the set of OBC variables explained only 8.9% of the variance in the set of self-concept variables. A redundancy statistic of 10% or greater is considered meaningful (Tabachnick & Fidell, 2001) thus, the magnitude of the exetetic relationship of self-conceptions to OBC should be considered modest at best. The second canonical correlation revealed no significant multivariate relationship between the set of OBC variables and the set of physical activity behavior variables, which was consistent with the findings for females.

Discussion

The first purpose of this study was to examine the generality of OBC, measuring the levels of the three OBC scales in undergraduate female and male students, examining the distribution of scores, and determining any gender differences. Results revealed that our college students scored lower on body surveillance, similarly on body shame, and higher on appearance control beliefs than McKinley's (1998) mixed-gender sample. McKinley's (1998) sample was recruited from undergraduate psychology classes while our sample was recruited from undergraduate fitness for health classes. One possible explanation is that the scores are reflective of body-experiential differences between students enrolled in a physical activity-based vs. a non-physical activity-based course. Additionally, we found that women were more likely to be higher scorers with respect to body surveillance and appearance control beliefs when compared to the percentage of higher scoring men, while approximately the same percentage of men and women were considered higher scorers on the OBC body shame scale. As hypothesized, gender differences were confirmed with females scoring significantly higher than males on both OBC body surveillance and body shame scales with no significant differences between females and males in terms of appearance control beliefs. These findings are consistent with the limited published research employing the OBCS with males as well as females (McKinley, 1998).

Given the limited empirical support for the utility of the OBCS with a male population, we believe our findings align with our purpose, to explore the generality of OBC with women and men, and support the theoretical basis for OBC. The OBCS was developed as a measure of women's self-objectification, a phenomenon explained as a consequence of the internalization of an observer's perspective on self (Fredrickson & Roberts, 1997). Self theorists support the notion that the contribution of the body to one's sense of self is different for women than men and contend that women's positive self-concept hinges on perceived physical attractiveness, whereas for men, it is linked with physical effectiveness (Lerner, Orlos, & Knapp, 1976 as cited in

Fredrickson & Roberts, 1997). The OBCS items focus on body appearance rather than utility, which may account for the gender-differentiated patterns in reported levels of body surveillance and body shame as well as in frequency of higher scoring on both OBC body surveillance and appearance control beliefs scales.

Although our data support gender differences in OBC, we hesitate to attribute these differences to gender alone and acknowledge the potential influence of confounding variables. Perhaps the instrument is specific to women's self-objectification and doesn't accurately assess the manner in which men might internalize an observer's perspective on self. Additionally, the research is absent regarding OBC with males, other than one study examining gender differences with male and female undergraduates in relation to body esteem (McKinley, 1998). Although recent research has examined differences in OBC levels developmentally (Gilmore, 2000; Greenleaf, 2000; Turner, 2001), among ethnic/racial groups (Gilmore, 2000; Kretchmar, 2001), and among athletes, exercisers, and nonactive women (Greenleaf, 2002; Parsons & Betz, 2001), none of these studies included men. Future research might look to explore the nature of OBC with different subgroups of women and men, to evaluate the adequacy of the OBCS in differentiating both women's and men's bodily experiences across various contexts, as well as to further identify the constructed meanings attached to male body ideals and represented by men's awareness of their body objectification.

An additional purpose was to examine the associations between the OBC variables (body surveillance, body shame, and appearance control beliefs) and certain self-conceptions (body self-efficacy, physical self-perceptions, physical self-worth, and global self-esteem) as illustrated in the expanded EXSEM (Sonstroem, Harlow, & Josephs, 1994). We hypothesized that there would be significant negative relationships between body surveillance and body shame as well as significant positive relationships between appearance control beliefs and the set of self-concept variables. Simple and canonical correlations, in part, supported our general hypothesis. For

females, body surveillance and body shame were negatively and significantly associated with all self-concept variables except for perceived strength, while the associations among the self-concept variables and appearance control beliefs were significant and positive. Furthermore, with these undergraduate women, the strength of association between the set of OBC variables and the set of self-concept variables was substantial explaining 48% of the shared variance between the canonical variates.

As expected, women's self-conceptions, at four levels of specificity from lower order body self-efficacy, through physical self-perceptions, physical self-worth, and general self-esteem, were associated with the three OBC elements. These findings support our assumption that the components of OBC and self-conceptions in the physical domain are interconnected and reveal that, for undergraduate women, the relationship appears to be bi-directional and balanced as the amount of variance explained in both sets of variables was comparable. Moreover, the influence of OBC permeates beyond logical self-perceptions (i.e., body attractiveness). Thus the examination of OBC across different self-conceptions offers a unique extension of our understanding of the interchange of sociocultural constructions and individual physical self-conceptions. Research has consistently confirmed that a woman's sense of self is strongly connected to her body appearance (see Harter, 1999b) and that, in part, regardless of her level of consciousness, the external and internal standards by which she measures body experiences are influenced by sociocultural forces (Rieves & Cash, 1996). Furthermore, although there are inherent similarities among the body-self experiences of girls and women, we feel it is important for researchers to more closely examine the relationships between OBC and self-conceptions as they exist amongst different cultural subgroups of women and girls. One of the limitations of this study is the homogeneity of our sample. If we are to fully appreciate the impact of OBC, a multicultural approach will expand our understanding beyond that of the body experiences of predominantly white, middle-class, younger women.

For males, the analyses revealed somewhat different associations. While the direction of the relationships were as hypothesized with men, the individual contribution of variables within the variable sets as well as the strength of associations between the set of OBC variables and the set of self-concept variables was different for men compared to women. Analyses revealed that, for males, when both body surveillance and body shame levels were higher, perceptions of body attractiveness and sport competence were lower along with lower levels of physical self-worth and general self-esteem. These findings appear to be consistent with McKinley's (1998) findings that both OBC body surveillance and body shame were significantly and negatively related to body esteem for men. Furthermore, whereas self-conceptions explained a modest proportion of the variance in the set of OBC variables, the variance in the set of self-concept variables was only minimally explained by the OBC variables.

The literature regarding gender-differentiated patterns in domain-specific and global self-evaluations (see Harter, 1999b) demonstrates that college-aged males typically report higher scores for physical appearance and sport competence than females, a pattern that is significant and robust, and that domain-specific self-perceptions have the potential to directly influence general self-esteem through physical self-worth (Fox, 1997). Harter (1999a) acknowledges while perceived physical attractiveness is an important predictor of self-worth for both females and males, there seems to be more latitude in how men's physical attractiveness is standardized. She contends that, for men, the focus on physical features is expanded to include intelligence, job competence, and athletic ability as routes to positive appearance-based self-evaluations. We surmise that males' lower self-evaluations might contribute to higher levels of body surveillance behaviors as well as feelings of shame, particularly when their body experience is one of a perceived discrepancy between internalized cultural standards for the ideal male body (ideal self-concept) and their physical self-perceptions (actual self-concept).

We also found higher body self-efficacy and moderate levels of perceived strength, conditioning, and sport competence were associated with higher appearance control beliefs along with higher body surveillance for males. Consider that men's positive self-conceptions, body-related self-confidence along with some perception of strength, conditioning, and sport competence (characterizing body capability rather than appearance), aligned with men's OBC belief in their ability to control body appearance through workout-related activities, as well as surveying the body-related outcomes of their efforts. These findings tend to support the notion that the male body experience is instrumentally different from that of females in that, for men, a positive body-self relationship is located in what their body can do and how it feels rather than solely in how their body looks.

Our data suggest that OBC body surveillance was a consistent contributor to the multivariate relationship with self-conceptions and that, albeit invariably associated, body surveillance can act independently of body shame. Also, the data indicate that body shame surfaces in association with more global self-conceptions. Since, with men, the strength of association between the set of OBC variables and the set of self-concept variables was meaningful only in the amount of variance in OBC explained by self-concept, we acknowledge the importance of further exploration into the associations between self-conceptions and OBC with males. McKinley (1998) suggested that OBC mediated the relationship between gender and body esteem thereby supporting the argument that negative body experiences may be an outcome of the internalization process. Our results suggest the reverse in that physical self-conceptions influenced OBC. Acknowledging the limitations presented by using an instrument premised on a female-centered theoretical position to capture male body experiences, future research might look to qualitatively explore the concept of OBC with men to determine the validity of the construct when applied to the male body experience as well as to clarify the causal relationships between OBC and physical self-conceptions.

Lastly, we examined the relationships between OBC measured by the OBCS and self-reported general physical activity behavior measured as times per week of vigorous, sweat producing activity and weekly activity METS. Our hypothesis that there would be significant negative relationships between body shame and physical activity behavior, while there would be significant positive associations between body surveillance and appearance control beliefs with physical activity behavior was not supported as a multivariate relationship with either the female or male undergraduates. Simple correlations did reveal a significant negative association between body shame and physical activity levels (METS hr/wk) and a significant positive association between appearance control beliefs and physical activity (times per week of vigorous, sweat producing activity), but only with males.

Recently, exploratory studies reported contradictory associations with OBC and physical activity, however these studies were exclusive to women. Parsons and Betz (2001), based on the Frederickson and Roberts' (1997) suggestion that sports and related physical activity participation might be one way to help girls and women resist internalization of a passive, object-oriented sense of self, hypothesized that sport and physical activity participation would be negatively related to OBC. They found OBC body shame to be positively related to extensive sport and physical activity participation as well as participation in sports that tended to objectify the female body. Kretchmar (2001) reported that OBC varies as a function of physical activity type and level, with both exercisers and non-active college-aged women reporting higher body surveillance scores than sport participants. Conversely, Greenleaf (2002) found no association with OBCS scores and the amount of exercise behavior with aerobic exercisers. One consideration that might explain these equivocal findings is the operationalization and measurement of physical activity across studies. In studies where physical activity was measured behaviorally (i.e., sweat frequency, METS hr/wk) there was no correlation with OBC (Greenleaf, 2002), yet the subjective appraisal of physical activity behaviors (i.e., exerciser, sport-involved, inactive) seemed to

demonstrate stronger associations with OBC components (Kretchmar, 2002; Parsons & Betz, 2001). Alternatively, maybe there truly is a no direct association between OBC and physical activity behaviors and any relationship between OBC and physical activity behavior is of intermediary nature. That is, OBC may serve as a moderator in the direct relationship between self-concept and physical activity behavior or the relationship between OBC and physical activity behavior may be indirect. Future research examining non-active as well as physically active, exercising, and sport-involved women's and men's OBC-related experiences might be useful in determining how OBC influences and is influenced by physical activity participation.

One consistency in OBC research with mixed gender samples is the absence of gender differences with OBC appearance control beliefs. McKinley and Hyde (1996) located appearance control beliefs in a paradoxical position within OBC theory positing higher beliefs in the ability to exercise control over one's appearance as contributing to negative body experiences. At the same time, the researchers acknowledge that a belief in the ability to control appearance may be a source of competency information, a positive body-self association. From an exercise psychology perspective, while we would prefer physical activity motives to be less appearance-based and more internally ascribed to health-related self-determined outcomes, a strong belief that as individuals we have no control over the appearance of our body could be detrimental to advancing physical activity involvement. Some of the fitness and health-related outcomes of a physically active lifestyle are measurable in terms of body composition. Attaching a negative evaluation to higher OBC appearance control beliefs scores (particularly when many of the items might be interpreted as weight control beliefs statements) could conceptually conflict with a positively posited beliefs-to-behaviors physical activity standpoint. Specifically, if one strongly believes a lifestyle that includes regular exercise does have a positive impact on body composition in terms of weight control (a high scorer on the control beliefs scale) then, according to OBC theory that high score may be indicative of OBC and associated with a negative body

experience. Our data supported the more positive associations among OBC appearance control beliefs and other variables of interest for both females and males, although the relationships were different across gender. It is possible that the inverse relationship between control beliefs and body experiences theorized by McKinley and Hyde (1996) and the positive relationships we reported could be indicative of a difference when examining OBC across different contexts and in relation to different health behaviors (e.g., dieting vs. exercise).

Positive associations among appearance control beliefs and certain self-conceptions align with the expanded EXSEM (Sonstroem, Harlow, & Josephs, 1994) theoretical framework in that competency information (as represented by physical self-worth) is a link between lower and higher order self-conceptions. However, the gender similarity in OBC appearance control belief scores did not extend to similarities in the relationships among the OBC component and self-conceptions between females and males. McKinley (1998) suggested that OBC mediates the relationship between gender and body-esteem rendering gender differences in body-esteem no longer significant after controlling for OBC. We assert that females' and males' similar control belief scores are quite differently related to lower level physical self-conceptions. It is through those mechanisms that OBC has the potential to differently influence physical self-worth.

In conclusion, our exploration of OBC in the realm of physical self-conceptions and physical activity behavior only touches on the potential for OBC theory as a standpoint for feminist-inspired body-related research in the physical activity domain. OBC theory explains women's negative bodily experiences as influenced by sociocultural constructions. The very nature of the constructivist foundation of OBC is that attention is focused on meaning-making as a result of contextualized sociocultural processes. OBC is contextually posited in women's negative physical self-views and explored most frequently in terms of negative behavioral outcomes (e.g., disordered eating). It would be sagacious to further explore OBC within social milieus that may be viewed as having positive psychological and behavioral consequences, for

instance, in the context of physical activity. More work is needed so we can fully comprehend the impact of OBC on females and males as well as advance a shared understanding of OBC discourse within the physical activity domain.

References

- Bane, S., & McAuley, E. (1998). Body image and exercise. In J. L. Duda, (Ed.), *Advances in sport and exercise psychology measurement* (pp.311-322). Morgantown, WV: Fitness Information Technology.
- Boutilier, M. A., & SanGiovanni, L. F. (1994). Politics, public policy, and Title IX: Some limitations of liberal feminism. In S. Birrell and C. L. Cole (Eds.), *Women, sport, and culture* (pp. 97-109). Champaign, IL: Human Kinetics.
- Conroy, D. E., Motl, R. W., & Hall, E. G. (2000). Progress toward construct validation of the self-presentation in exercise questionnaire. *Journal of Sport and Exercise Psychology*, 22, 21-38.
- Crocker, P. R. E., & Ellsworth, J. P. (1990). Perceptions of competence in physical education students. *Canadian Journal of Sport Sciences*, 15, 4, 262-266.
- Curry L. A., & Rehm, M. (1997). Participation in NCAA Division I Athletics: Self-perception differences in athletes and nonathletes. *College Student Journal*, 31, 96-104.
- Fox, K. R. (1990). *The physical self-perception profile manual*. DeKalb, IL: Northern Illinois University.
- Fox, K. R. (1997). Let's get physical. In K. Fox (Ed.), *The physical self: From motivation to well-being*. Champaign, IL: Human Kinetics.
- Fox, K. R. (2000). Self-esteem, self-perceptions and exercise. *International Journal of Sport Psychology*, 31, 228-240.
- Fox, K. R., & Corbin, C. B. (1989). The Physical Self-Perception Profile: Development and preliminary validation. *Journal of Sport and Exercise Psychology*, 11, 408-430.
- Fox, K. R., & Vehnekamp, T. J. (1990). Gender comparisons of self-perceptions, physical fitness, exercise and dietary habits in college students. *Journal of Sport Sciences*, 8, 282-283.
- Fredrickson, B. L., & Roberts, T. (1997). Objectification theory: Toward understanding women's

- lived experiences and mental health risks. *Psychology of Women Quarterly*, 21, 173-206.
- Gravetter, F. J., & Wallnau, L. B. (2004). *Statistics for the behavioral sciences* (6th ed.). Belmont, CA: Wadsworth/Thomson Learning.
- Greenleaf, C. (2000). Self-objectification among physically active women: Negative psychological and behavioral correlates. (Doctoral dissertation, University of North Carolina at Greensboro, Greensboro, NC, 2000). *Dissertation Abstracts International*, 61, 07B, 3844.
- Greenleaf, C. (2002, October). *Objectified body consciousness, self-presentational motives for exercise and body image behaviors among female exercisers*. Poster session presented at the annual meeting of the Association for the Advancement of Applied Sport Psychology, Tucson, AZ.
- Gilmore, T. (2000). Influence of shame, female identity, and ethnic identity on body image across women's life-span. (Fuller Theological Seminary, 2000). *Dissertation Abstracts International*, 61, 09B, 4982.
- Harter, S. (1999a). Discrepancies between real and ideal self-concepts. In *The construction of the self: A developmental perspective* (pp. 142-165). New York: Guilford.
- Harter, S. (1999b). The content, valence, and organization of self-evaluative judgments. In *The construction of the self: A developmental perspective* (pp. 130-134). New York: Guilford.
- Hayes, S. D., Crocker, P. R. E., & Kowalski, K. C. (1999). Gender differences in physical self-perceptions, global self-esteem and physical activity: Evaluation of the Physical Self-Perception Profile model. *Journal of Sport Behavior*, 22, 1-14.
- Heinberg, L. J., Thompson, J. K., & Matzon, J. L. (2001). Body image dissatisfaction as a

- motivator for healthy lifestyle change: Is some distress beneficial? In R. H. Striegel-Moore and L. Smolak (Eds.), *Eating disorders: Innovative directions in research and practice*. Washington, D.C.: American Psychological Association.
- Hoffman, R. M., Borders, L. D., & Hattie, J. A. (2000). Reconceptualizing femininity and masculinity; From gender roles to gender self-confidence. *Journal of Social Behavior & Personality, 15*, 475-504.
- Krane, V., Waldron, J., Michalenok, J., & Stiles-ShIPLEY, J. (2001). Body image concerns in female exercisers and athletes: A feminist cultural studies perspective. *Women in Sport and Physical Activity Journal, 10*, 17-54.
- Kretchmar, J. L. (2001). Objectified body consciousness in African American and Caucasian college-age women of varying physical activity levels. (Doctoral dissertation, University of North Carolina at Chapel Hill, 2001). *Dissertation Abstracts International, 62*, 912.
- Kohl, H. W., Blair, S. N., Paffenbarger, Jr., R. S., Macera, C. A., & Kronenfeld, J. J. (1997) The Aerobics Center Longitudinal Study Physical Activity Questionnaire. *Medicine and Science in Sports and Exercise, 29*, S10-S14.
- McKinley, N. M. (1995). Women and objectified body consciousness: A feminist analysis. (Doctoral dissertation, University of Wisconsin-Madison, Madison, WI, 1995). *Dissertation Abstracts International, 56*, 05B, 9527111.
- McKinley, N. M. (1998). Gender differences in undergraduate' body esteem: the mediating effects of objectified body consciousness and actual/ideal weight discrepancy. *Sex Roles, 39* (1/2), 113-123.
- McKinley, N. M., & Hyde, J.S. (1996). The objectified body consciousness scale: Development and validation. *Psychology of Women Quarterly, 20*, 181-215.
- Muth, J. L., & Cash, T. F. (1997). Body-image attitudes: What difference does gender make? *Journal of Applied Social Psychology, 27*(16), 1438-1453.

- Neeman, J., & Harter, S. (1986). *Manual for the Self-Perception Profile for College Students*. Denver, CO: University of Denver.
- Nunnally, J. C. (1978). *Psychometric theory* (2nd ed.). New York: McGraw-Hill.
- Parsons, E. M., & Betz, N. E. (2001). The relationship of participation in sport and physical activity to body objectification, instrumentality, and locus of control among young women. *Psychology of Women Quarterly*, 209-222.
- Rieves, L., & Cash, T. F. (1996). Social developmental factors and women's body image attitudes. *Journal of Social Behavior and Personality*, 11, 63-78.
- Sonstroem, R. J., Harlow, L. L., & Josephs, L. (1994). Exercise and self-esteem: Validity of model expansion and exercise associations. *Journal of Sport and Exercise Psychology*, 16, 29-42.
- Sonstroem, R. J., & Morgan, W. P. (1989). Exercise and self-esteem: Rationale and model. *Medicine and Science in Sports and Exercise*, 21, 329-337.
- Sonstroem, R. J., Speliotis, E. D., & Fava, J. L. (1992). Perceived physical competence in adults. An examination of the Physical Self-Perception Profile. *Journal of Sport and Exercise Psychology*, 10, 207-221.
- Tabachnick, B. G., & Fidell, L. S. (2001). *Using multivariate statistics* (4th ed.). Needham Heights, MA: Allyn and Bacon.
- Thompson, J. K., Heinberg, L. J., Altabe, M., & Tantleff-Dunn, S., (1999). *Exacting beauty. Theory, assessment, and treatment of body image disturbance*. Washington, DC: American Psychological Association.
- Turner, A. S. (2001). Psychological correlates of objectified body consciousness in younger and older adolescent girls. (The Fielding Institute). *Dissertation Abstracts International*, 61, 12B, 6741.
- Zumph, C. L., & Harter, S. (1989). Mirror, mirror on the wall: The relationship between

appearances and self-worth in adolescent males and females. In S. Harter, *The construction of the self*. New York: Guilford.

Tables

Table 1. Simple Correlations Among All Variables: Females ($n = 231$)

Variable	1	2	3	4	5	6
1. SUR						
2. SHA	.528**					
3. ACB	-.081	-.253**				
4. BSE	-.234**	-.402**	.199**			
5. STR	-.207**	-.119	.141**	.195**		
6. BOD	-.415**	-.549**	.209**	.645**	.268**	
7. CON	-.215**	-.247**	.202**	.420**	.537**	.518**
8. SPO	-.167*	-.158*	.141*	.308**	.455**	.432**
9. PSW	-.489**	-.570**	.260**	.592**	.426**	.850**
10. ACC	-.466**	-.534**	.202**	.605**	.392**	.844**
11. GSE	-.370**	-.602**	.273**	.581**	.308**	.683**
12. VPA	.008	.112	.098	.054	.344**	-.045
13. MET	-.077	.000	-.007	.081	.248**	.076

Note. SUR = body surveillance; SHA = body shame; ACB = appearance control beliefs; BSE = body self-efficacy; STR = perceived strength; BOD = perceived body attractiveness; CON = perceived conditioning; SPO = perceived sport competence; PSW = physical self-worth; ACC = physical self-acceptance; GSE = general self-esteem; VPA = vigorous physical activity; MET = METS-hr/wk.

* $p < .05$. ** $p < .01$ (two-tailed).

Table 1 (continued). Simple Correlations Among All Variables: Females ($n = 231$)

Variable	7	8	9	10	11	12
1. SUR						
2. SHA						
3. ACB						
4. BSE						
5. STR						
6. BOD						
7. CON						
8. SPO	.676**					
9. PSW	.661**	.539**				
10. ACC	.665**	.512**	.919**			
11. GSE	.438**	.292**	.723**	.723**		
12. VPA	.491**	.251**	.111	.139*	.139*	
13. MET	.325**	.256**	.124	.130*	.035	.130*

Note. SUR = body surveillance; SHA = body shame; ACB = appearance control beliefs; BSE = body self-efficacy; STR = perceived strength; BOD = perceived body attractiveness; CON = perceived conditioning; SPO = perceived sport competence; PSW = physical self-worth; ACC = physical self-acceptance; GSE = general self-esteem; VPA = vigorous physical activity; MET = METS-hr/wk.

* $p < .05$. ** $p < .01$ (two-tailed).

Table 2. Simple Correlations Among All Variables: Males ($n = 163$)

Variable	1	2	3	4	5	6
1. SUR						
2. SHA	.421**					
3. ACB	.093	-.072				
4. BSE	.079	-.110	.283**			
5. STR	.008	.026	.217**	.389**		
6. BOD	-.148	-.168*	.093	.568**	.541**	
7. CON	.055	-.084	.129	.419**	.529**	.635**
8. SPO	-.049	-.181*	.140	.264**	.516**	.524**
9. PSW	-.220**	-.231**	.116	.513**	.511**	.775**
10. ACC	-.293**	-.335**	.067	.448**	.481**	.698**
11. GSE	-.295**	-.455**	.077	.323**	.242**	.526**
12. VPA	.029	.103	.190*	.282**	.289**	.249**
13. MET	.045	-.335**	.103	.180*	.299**	.214**

Note. SUR = body surveillance; SHA = body shame; ACB = appearance control beliefs; BSE = body self-efficacy; STR = perceived strength; BOD = perceived body attractiveness; CON = perceived conditioning; SPO = perceived sport competence; PSW = physical self-worth; ACC = physical self-acceptance; GSE = general self-esteem; VPA = vigorous physical activity; MET = METS-hr/wk.

* $p < .05$. ** $p < .01$ (two-tailed).

Table 2 (continued). Simple Correlations Among All Variables: Males ($n = 163$)

Variable	7	8	9	10	11	12
1. SUR						
2. SHA						
3. ACB						
4. BSE						
5. STR						
6. BOD						
7. CON						
8. SPO	.572**					
9. PSW	.642**	.607**				
10. ACC	.629**	.530**	.838**			
11. GSE	.407**	.411**	.652**	.747**		
12. VPA	.398**	.241**	.235**	.303**	.180*	
13. MET	.367**	.325**	.241**	.199*	.047	.405**

Note. SUR = body surveillance; SHA = body shame; ACB = appearance control beliefs; BSE = body self-efficacy; STR = perceived strength; BOD = perceived body attractiveness; CON = perceived conditioning; SPO = perceived sport competence; PSW = physical self-worth; ACC = physical self-acceptance; GSE = general self-esteem; VPA = vigorous physical activity; MET = METS-hr/wk.

* $p < .05$. ** $p < .01$ (two-tailed).

Table 3. Descriptive Statistics and Gender Differences on Measured Variables

Variable	Females (<i>n</i> = 231)	Males (<i>n</i> = 163)	<i>F</i>
	<i>M</i> (<i>SD</i>)	<i>M</i> (<i>SD</i>)	
<i>OBC</i>			(1,425)
Body Surveillance	4.57(.97)	3.80(1.01)	58.87**
Body Shame	3.49(1.16)	2.78(.94)	41.77**
Control Beliefs	4.94(.80)	5.06(.86)	2.16
<i>Self-Conceptions</i>			(1,407)
Body Self-Efficacy	3.82(.72)	4.10(.70)	14.44**
Perceived Strength	2.49(.62)	2.65(.65)	6.75*
Perceived Body Attractiveness	2.24(.74)	2.60(.60)	28.10**
Perceived Conditioning	2.48(.71)	2.79(.69)	20.28**
Perceived Sport Competence	2.33(.73)	2.81(.70)	45.92**
Physical Self-Worth	2.44(.77)	2.88(.58)	40.02**
Self-Esteem	2.98(.75)	3.24(.59)	14.32**
<i>Physical Activity</i>			(1,417)
Vigorous Physical Activity	3.23(2.14)	4.73(3.32)	31.51**
METS-hr/wk	45.36(43.89)	68.17(54.24)	22.58**

Note. Significance established at alpha = .01. * $p \leq .01$. ** $p \leq .001$.

Table 4. Canonical Loadings for OBC and Self-Conceptions with Females and Males

Variable	Canonical Loadings (Females, $n = 231$)		Canonical Loadings (Males, $n = 163$)	
	<i>(Significant Functions)</i>		<i>(Significant Functions)</i>	
	1	2	1	2
<i>OBC Variables</i>				
Body Surveillance	-.683	.704	.683	-.560
Body Shame	-.969	-.217	.939	.227
Appearance Control Beliefs	.367	-.008	-.094	-.798
<i>Self-Conception Variables</i>				
Body Self-Efficacy	.594	.178	-.110	-.732
Perceived Strength	.235	-.549	.023	-.498
Perceived Body Attractiveness	.832	-.117	-.385	-.194
Perceived Conditioning	.405	-.369	-.152	-.480
Perceived Sport Competence	.300	-.289	-.330	-.463
Physical Self-Worth	.895	-.374	-.529	-.238
Self-Esteem	.910	.251	-.919	-.255

Note. Canonical loadings $\geq .30$ were considered significant contributors.

CHAPTER 3

Objectified Body Consciousness: Effectiveness of A Body Consciousness-Raising Curriculum

Deborah H. John

Oregon State University

Abstract

McKinley (1995) used a social construction framework to theorize the negative impact of internalization of sociocultural body significance as objectified body consciousness (OBC). The Objectified Body Consciousness Scale (OBCS; McKinley & Hyde, 1996) was constructed to measure the three OBC components, body surveillance, body shame, and appearance control beliefs. In a 2 (time) x 2 (gender) x 5 (class) quasi-experimental study, undergraduate female and male students ($N = 87$) were participants in a curriculum designed to raise awareness of the influence of sociocultural messages on beliefs and behaviors associated with OBC as measured by the OBC scales. Data collected from undergraduate students ($N = 114$) enrolled in courses with similar and dissimilar content served as comparison groups. The BCRC outcomes were quantitatively evaluated using RM-MANOVA. The analyses revealed a significant 3-way interaction $F(12, 189) = 1.843, p = .039$. Follow-up analyses disclosed that the interaction was primarily influenced by within-class gender differences across time with no significant between-class differences. A qualitative evaluation of the BCRC from the students' perspective contributes to the discussion of the effectiveness of the curriculum.

KEYWORDS: Body image, prevention program; sociocultural literacy; cultural competency.

Objectified Body Consciousness: Effectiveness of a Body Consciousness-Raising Curriculum

Feminist theorists have found the social construction perspective, which focuses on how societies create meaning, useful in understanding body experience (Fredrickson & Roberts, 1997). From this perspective, the significance of the female body is presented as an object of sexual desire, something “to be looked at” (Spitzack, 1990). Objectification of the male body is also evident in the literature, aligning more closely with the body as a tool, an object used for physical labor (Connell, 1987). Because of these social constructions, individuals learn to view their bodies as objects separate from themselves, and establish beliefs and behaviors that support self-objectification. Internalization is a progressive process whereby interactions between the person and the outer world are replaced by inner representations of the self and body that contribute to one’s self-conception (Kearney-Cooke, 2002). Internalization of cultural body standards makes the intention to achieve an ideal body seem to be internally motivated, a personal choice rather than externally regulated social pressure. Our bodies become something to be observed, manipulated, managed, and controlled, and yet the regulation appears to be a personal desire and self-determined.

From a feminist psychological standpoint, McKinley (1995) used a social construction framework to theorize the impact of internalization of sociocultural body significance as objectified body consciousness (OBC). OBC includes three components, body surveillance, internalization of cultural body standards, and appearance control beliefs, which have been shown to impact women's negative body experiences (McKinley & Hyde, 1996). OBC theory posits that the source of negative body experience is contextualized socially and/or culturally rather than psychologically. Theoretically, OBC, consciously experiencing one's body as an object and the beliefs that support this experience, creates a situation in which primarily women develop contradictory relationships with their body. From one relational standpoint, self-love through surveillance, choosing body standards, and acquiring appearance management skills can appear to

be positive and empowering experiences. On the other side, each of these behavioral components can have negative consequences for how a woman feels about her body and herself (McKinley, 1995).

Objectified Body Consciousness Scale

McKinley and Hyde (1996) developed and validated an instrument to measure OBC in young and mid-life women. The scale components, body surveillance (viewing the body as an outside observer), body shame (feeling shame when the body does not conform to internalized cultural body standards), and appearance control beliefs (believing that individuals are responsible for and, with enough effort, can control how their body looks), demonstrated three distinct dimensions of OBC. Body surveillance had a moderate negative correlation with body esteem for young women, but no significant correlation for mid-life women. Body shame was found to correlate negatively with body esteem for both young women and mid-life women. Appearance control beliefs significantly and positively correlated with body esteem for young women and mid-life women. While body surveillance and body shame were strongly and positively correlated for both young and mid-life women, appearance control beliefs were not significantly associated with either body surveillance or body shame in either group.

Additional analyses to test the construct validity of the OBC control beliefs scale revealed that appearance control beliefs correlated positively with the body management behaviors of dieting, restricted eating, and exercising to control weight in one sample of undergraduate women (McKinley & Hyde, 1996). In another sample of young women and middle-aged women, control beliefs were significantly and positively correlated with only exercising to control weight. McKinley and Hyde (1996) prudently determined that the relationship between control beliefs and self-presentation behaviors is complex.

Empirical Support of the OBCS

Most of the research thus far using OBC theory has been correlational, a limitation acknowledged by McKinley (2002). Correlational data with various populations have revealed differences in levels of OBC scales with young and middle-aged women (McKinley & Hyde, 1996), with female and male undergraduate students (McKinley, 1998), and with male and female college-age exercisers (Conroy, Motl, & Hall, 2000). The OBC measure has been used in research validating a self-presentation in exercise instrument (Conroy, Motl, & Hall, 2000), exploring women's self-presentation motives and body image behaviors (Greenleaf, 2002), and assessing the possible relationship of young women's sport and exercise participation during high school (Parsons & Betz, 2001).

McKinley and Hyde (1996) suggested that changing body consciousness would be no easy task, particularly given that OBC relies on the sociocultural perspective that emphasizes the belief that bodily experiences are socially constructed rather than individually defined. The OBCS has been used once in a pre-experimental study to assess a shift in women's perceptions of their bodies at the conclusion of a 16-week university course focusing on body image and weight (Matacin, 2003). Following the course, paired t-tests revealed significant decreases in body surveillance, $t(29) = 6.47$, $p = .0001$, body shame, $t(29) = 3.26$, $p = .003$, and appearance control beliefs, $t(29) = 2.65$, $p = .013$. Considering that a primary goal of feminist research is praxis, we felt it important to expand our understanding of OBC using a theory-to-practice approach. A co-educational curriculum aimed at increasing female and male students' awareness of sociocultural forces as well as the processes of internalization of societal standards of appearance was needed so that we could better examine the impact of sociocultural literacy on undergraduates' OBC levels.

Changing Objectified Body Consciousness: A Feminist-Inspired Approach

McKinley and Hyde's (1996) suggestion that changing OBC would be no easy task is well informed. While feminism focuses on changing social systems rather than the individual, most body image and body-related interventions do not. Although acknowledging the triadic interaction between individual factors, behavior, and environment, most interventions use an information-based, social learning theory (SLT) approach, focusing primarily on increasing individual awareness of body-related topics not on changing the social and physical contexts that give meaning to bodily experiences (Levine & Smolak, 2002). Feminist practice incorporates gender scholarship, emphasizes the experiences of women and marginalized groups, and takes a more nonhierarchical, empowering, process-oriented approach that shifts emphasis from personal change to societal transformation (Worell & Remer, 1992). Feminist practice supports our contention that only through individual and collective consciousness, locating control over one's body with the individual while challenging the prevailing forces, can the culturally oppressed body become a site of personal resistance, social transformation, and freedom.

Feminist-inspired approaches to the prevention of negative body experiences and associated behaviors have been designed incorporating many of the features presumed to be effective from existing SLT-based programs (e.g., interactive and experientially based) along with some distinctively different characteristics (e.g., a strong sociocultural perspective and emphasis on translating knowledge into action). These programs are aimed at reducing risk for disordered eating by increasing self-esteem, promoting body acceptance, and providing leadership opportunities through an action component. Additionally, the programs contribute to the interactive learning of competencies (e.g., skills and strategies) to resist and transform cultural emphasis advancing negative body preoccupation and unhealthy behaviors.

Raising Body Consciousness: Design and Delivery of a Curriculum

In a theory-to-practice approach, we attempted to change undergraduates' OBC through the design and delivery of a body consciousness-raising curriculum (BCRC). Our body consciousness-raising endeavor utilized many of the strategies philosophically recognized as feminist practice. The underlying themes, a strong feminist sociocultural perspective and an emphasis on translating raised awareness and knowledge into personal action served as the basis for the BCRC. Our project advocated empowering knowledge constructed through dialogue, self-inquiry, and reflection based on life experiences, and was consistent with feminist pedagogical principles. We wanted to know if it is possible to change the levels of OBC as measured by the OBCS (body surveillance, body shame, and appearance control beliefs), in both females and males through a cognitively processed body consciousness-raising curriculum. We hypothesized that female and male students receiving the BCRC would report lower OBC component scores than those students in the no-BCRC group. We additionally hypothesized that there would be initial gender differences in OBC components with females reporting significantly higher scores than males.

Methods

Participants and Procedures

All procedures were followed in accordance with those approved by the university's Institutional Review Board. Students enrolled in two weight management labs (WM-BCRC, $n = 37$; WM-no BCRC, $n = 32$), and two introductory-level Women's Studies courses (WS-BCRC, $n = 50$; WS-no BCRC, $n = 44$) were invited by the researcher to participate in a research study investigating college students' perceptions of their body-related experiences. The researcher, who was also the instructor of the treatment classes, then left the class and a trained research assistant reviewed the survey procedure with the students, answered any questions, and collected completed questionnaires. This procedure was enacted to better ensure confidentiality to the

participants who would be instructed by the researcher, as well as to avert potential challenges of researcher/instructor bias. The researcher/instructor had neither knowledge of nor access to participant information or data until after final grades for the courses were awarded and submitted. The questionnaires were administered at the beginning of the class period during the first and last week of the 10-week term and took approximately 15 minutes to complete. The questionnaire packet included a demographic profile and the OBCS. Data were also collected from students enrolled in lower division engineering courses (ENGR, $n = 38$) to serve as a no experimental condition contrast group.

Curriculum Delivery

The BCRC was developed with the objective of influencing the three components shown to impact OBC: body surveillance, internalization of cultural body standards (body shame), and appearance control beliefs. The BCRC was patterned after feminist-inspired approaches to the prevention of body weight and shape preoccupation (Piran, 1999) and eating disorders (Steiner-Adair, Sjostrom, Franko, Pai, Tucker, Becker, & Herzog, 2002), and reviewed by a panel of experts in both feminist psychology and pedagogy. Expertise was determined through demonstrated scholarship in either feminist psychology or pedagogy.

The BCRC was divided into three time-equivalent segments aligning with the three components of OBC. Each segment was delivered once a week for two weeks over the course of the 10-week term in one physical activity-based weight management lab (WM-BCRC) and one women's studies class (WS-BCRC). The time allocation for each two-week intervention period was held constant, that being approximately 50 minutes per week for a total of 100 minutes of contact time over a two-week period for each of the OBC component areas. To provide a basis of comparison for program evaluation, the BCRC was layered into the regular course content of both the WM-BCRC and WS-BCRC classes and the instructor/researcher worked closely with the instructors of two comparison classes (WM-no BCRC & WS-no BCRC) to assure the only

difference in the course content was the BCRC component. The layering of the BCRC into regular course content did result in course content time differences between the BCRC and no-BCRC classes with those students receiving the BCRC having less time devoted to regular course content.

Acknowledging the limitations regarding the use of intact classes and non-random assignment, the influence of multiple instructors, and the potential for within group interactions to have some bearing on outcomes, we also felt confident that this quasi-experimental design provided potential for examining intra-class changes in OBC as a result of the specifically designed program. Additionally, the delivery of the BCRC in two different discipline areas offered the potential to compare across courses, not testing causation, but examining change within the context of varying course content.

Measure

OBC was measured using the Objectified Body Consciousness Scale (OBCS; McKinley & Hyde, 1996), a 24-item instrument requiring responders to indicate agreement with various body-related statements on a 7-point Likert-type scale ranging from 1 *strongly disagree* to 7 *strongly agree* with a middle anchor point 4 *neither agree or disagree*. The instrument consists of three 8-item subscales measuring body surveillance, body shame, and appearance control beliefs. A high scorer as defined by the OBC body surveillance scale would be an individual who frequently views her/his body from the viewpoint of an outside observer and thinks of her/his body more in terms of how it looks than how it feels or performs. Strongly agreeing with item statements such as "*during the day, I think about how I look many times*" would reflect a higher level of OBC body surveillance. A high scorer on the OBC body shame scale would internalize cultural body standards and be shameful if she/he did not meet cultural expectations of the ideal body. Agreement with statements such as "*when I'm not the size I think I should be, I feel ashamed*" indicates a higher level of OBC body shame. An individual who scores high on the

OBC appearance control beliefs scale would believe that, with enough effort, she/he could control her/his body appearance and weight. A person who scores higher on OBC appearance control beliefs would strongly agree with items like "*I can weigh what I'm supposed to if I try hard enough.*" The OBC instrument has demonstrated validity and reliability with female (McKinley, 1995) and male (McKinley, 1998) undergraduates.

Data Analysis

The purpose of this project was to evaluate the effectiveness of a curriculum designed to address the OBC components using the OBCS to measure quantitative changes in the OBC variables. Data were first screened for missing variables and in each case where only one subscale item per case was missing, a mean was calculated from the completed subscale items and inserted to replace the missing value, representing approximately 3% of the cases used in the analyses. Cases with two or more missing items per subscale were excluded from analyses, with the resulting $N = 201$ used in analyses reflecting approximately 80% of the original data set. Discontinuance of course enrollment and absenteeism resulting in no Time Two data were the primary contributors to the attrition rate. The attrition ratio of females-to-males was approximately two-thirds.

Measures were reviewed for internal consistency reliability and data were screened for meeting multivariate assumptions. Alpha reliabilities of the OBCS were assessed for both time periods. A repeated measure analysis of variance (RM MANOVA) was used to test the hypothesis that students in the classes receiving the BCRC would report significantly lower scores on the OBC components than students in classes not receiving the BCRC. Consistent with the OBC literature, we also hypothesized that there would be initial gender differences in the OBC variables. A 2 (time) by 2 (gender) by 5 (class) RM MANOVA was performed on the three OBC variables of body surveillance, body shame, and appearance control beliefs. Follow-up analyses were conducted to locate differences in the case of a significant 3-way interaction. The

sample size provided an acceptable case-to-variable ratio for RM MANOVA (Tabachnick & Fidell, 2001).

The qualitative analysis of the BCRC in terms of learning outcomes was the product of an inductive and emergent process. The data collected, both from post-lesson open-ended questions and focus group field notes, were summarized independently by the researcher and a member of the research team according to the leading questions. A content analysis was conducted and each researcher identified themes grounded in OBC theory. After the independent identification of themes, the data were organized permitting conclusions to be analytically drawn. The content analysis procedure followed the guidelines established by Berg (2001), with results being clearly articulated and well documented to bring trustworthiness to the findings and lend credibility to the subjective interpretation.

Results

Quantitative Analyses

All subscales used in the present study demonstrated acceptable internal consistency with Cronbach's alpha coefficients $\geq .70$ (Nunnally, 1978). The alpha coefficients for the OBCS components for the first data collection were .80 for body surveillance, .81 for body shame, and .77 for appearance control beliefs. For the second data collection, the alpha reliabilities were .83, .83, and .77 for body surveillance, body shame, and appearance control beliefs, respectively.

Descriptive statistics (M , SD) by class and gender are presented for all measured variables in Table 1 (Week One) and Table 2 (Week Ten). A 2 (time) by 2 (gender) by 5 (class) RM MANOVA was performed on the three OBC variables of body surveillance, body shame, and appearance control beliefs revealing a significant three-way interaction, $F(12, 189) = 1.84, p = .039$. Follow-up analyses at Week One revealed significant class by gender differences $F(12, 189) = 2.12, p = .014$. The female group reported significantly higher initial scores for OBC body surveillance, $F(1, 200) = 12.64, p < .001$, and body shame, $F(1, 200) = 7.30, p = .008$, as well as

significantly lower initial scores for appearance control beliefs, $F(1, 200) = 7.04, p = .009$, than the group of males. At Week Ten, a MANOVA demonstrated that the class by gender interaction was not significant, $F(12, 189) = 1.71, p = .062$.

A separate 2 (time) by 5 (class) RM MANOVA for females using Wilks' criterion revealed no significant interaction. The combined dependent variables, body surveillance, body shame, and appearance control beliefs, were significantly affected by time, $F(3, 136) = 3.99, p = .009$, with the results reflecting a weak association between time and decreases in OBC body surveillance, partial $\eta^2 = .06$, as well as appearance control beliefs, partial $\eta^2 = .04$. There were no significant group effects relating to the OBC variables with females. For males, RM MANOVA revealed a significant main effect for group, $F(12, 50) = 1.97, p = .03$, and time $F(3, 59) = 3.13, p = .03$, but no significant interaction. Follow-up univariate analyses demonstrated that appearance control beliefs accounted for the modest association with time, partial $\eta^2 = .13$, declining in all groups from Week One to Week Ten. OBC body shame was associated with the group effect, partial $\eta^2 = .16$, with higher scores on OBC body shame recorded for weight management and women studies classes that received the curriculum compared to the other groups.

[Insert Table 1 and Table 2 approximately here.]

Effect sizes (ES) were calculated for each class by gender to further evaluate the meaningfulness of any within-group differences and are presented in Table 3. Effect sizes were also calculated to evaluate between-group differences for the weight management classes with and without the curriculum as well as for the women studies classes with and without the BCRC (see Table 3). The criteria (Thomas, Salazar, & Landers, 1991) used for determining the meaningfulness of the within- and between-group differences was small ($.20 \leq ES \leq .40$), moderate ($.41 \leq ES \leq .70$), and large ($ES > .70$).

Moderate effects for Week One to Week Ten differences were evident for body surveillance with negative effects (decreases) for the women in the engineering class and men in the women studies class without the BCRC, as well as positive effects (increases) for the men in the weight management class with the BCRC. For OBC body shame, only the men in the women studies class without the BCRC demonstrated large negative effects (decreases). Negative effects ranging from moderate to large were evident in the weight management classes with decreases in appearance control beliefs for men in the class with the BCRC and women in the no-BCRC class.

The between-class effects were moderate to large for appearance control beliefs between the weight management classes. A moderate negative effect between the no-BCRC and BCRC females demonstrated that the no-BCRC women reported decreases in appearance control beliefs. A large difference between males with and without the BCRC supported the idea that men receiving the BCRC lowered their appearance control beliefs score. For the women studies classes, moderate effects were evident for only males with men in the women studies class without the BCRC moderately lower on their body surveillance and body shame scores.

[Insert Table 3 approximately here.]

The Students' Voice

In a theory-to-practice approach, a BCRC was designed and delivered utilizing many of the strategies philosophically recognized as feminist practice. The underlying themes, a strong feminist sociocultural perspective, and an emphasis on translating raised awareness and knowledge into personal action served as the basis for the BCRC. The strategies utilized in the BCRC included empowering knowledge constructed through dialogue, self-inquiry, and reflection based on life experiences, and were consistent with feminist pedagogical principles.

Following each BCRC lesson, all students were asked to respond to three questions with the expressed purpose of self-evaluating the impact of each learning opportunity. The open-ended questions were phrased as follows: *The most important thing I got in touch with this session is...*

How this applies to my life right now is..., and What I am going to do with it and when is....

Additionally, at the end of the term BCRC students were invited to be participants in a focus group session. The focus group format followed the criteria established by Berg (2001). The purpose of the focus group was to give voice to the students' evaluation of their body-related learning resulting from their participation in the BCRC, and provide a forum for judgments regarding the activities utilized in the lessons. The information obtained from the students' viewpoint contributes to an appreciation of the effectiveness of the BCRC activities, as well as to the potential for curriculums like the BCRC to positively impact females' and males' body-related experiences.

Body Shame (Lessons One and Two). The primary objective of the two BCRC lessons devoted to the OBC body shame component was to reduce negative bodily experiences resulting from the internalization of sociocultural body standards. A content analysis of the open-ended response questions from the two BCRC classes focusing on OBC body shame, using an interpretative approach that blends apparent and latent content (Berg, 2001), revealed three major learning themes. The most prevalent theme was the impact of external messages (media, family, and/or peers) on individuals' view of themselves and/or others, evidence of internalization. One young man expressed, "Everyone is in a tunnel vision-like state where beauty is more important than brains...[I am] going to be more socially conscious and spread the message." Students recognized that the internalized messages, primarily those from the media, contributed to their feelings of shame around their personal body views, "I am stressing with my weight and I feel inadequate." Internalization of cultural messages also contributed to students' guilt resulting from their judgment of other's bodies, "I'm going to remind myself daily what healthy is and neither compare nor devalue others based on their outward appearance." A young woman voiced, "I am a direct target and I feel the pressure...now I realize I am thin enough, my health is first, and not to buy into the messages."

Another strong reoccurring topic for both women and men was an acknowledgement of their physical self-views or self-perceptions. One woman wrote, "I realize now why I feel the way I do [about my body]...what I understand I can change...I will do a little more thinking about why I am so hard on myself." Another student expressed, "I understand the cultural body ideals cannot be changed [so easily], but my own personal ideals can be...I will not be so critical of myself."

A third idea expressed consistently among women and men was a self-determined motive to change body-related behaviors toward health and fitness rather than appearance. "I need to accept and love my body and myself...I will exercise more and increase healthy eating habits," a young woman wrote. A male student expressed, "my conversation with my body showed me that we're a team...I can be in better shape, more fit and it will be fun." The OBC measures internalization of cultural body standards as body shame. While there was evidence of body-related shame and guilt in the students' responses, a much more uniformly expressed learning outcome was a raised awareness of the process of internalization combined with a desire to enact a more positive, self-determined body ideal that is not appearance-based. This is an outcome that is consistent with the objective of the two BCRC lessons devoted to the OBC body shame component.

Appearance Control Beliefs (Lessons Three and Four). The primary objective of the two BCRC lessons devoted to the OBC appearance control beliefs component was to increase an understanding of the extent to which body appearance can be controlled and the external/internal nature of motives for controlling body appearance. A content analysis of the open-ended responses from the two BCRC classes revealed some important learning themes. The strongest idea presented across genders was that a sense of societal pressure for a certain body appearance took away students' sense of autonomy or personal control. "I do things [to my body] out of pressure, for social acceptance. A lot of my body disciplinary practices are for society, not me,"

reports a female participant. Another writes, "I realize what I do to be normal and the way I feel when I don't follow these practices."

Another strong theme was the idea of judgment or discrimination when standards for body appearance are not met. A male student wrote, "all the different body-isms that exist in our society, they shape our views despite our ability to recognize them...we believe we are in control." A female participant expressed, "the norms imposed on us are a lot to live up to, and we try anyway." A third theme that was evident in the students' responses included the use of disciplinary practices to control body appearance, captured in this statement, "I will do things [from now on] related to my body for my personal enjoyment, not because of social pressure to look a certain way...after all, it's my body, not society's."

Increasing an understanding of the extent to which body appearance can be controlled and the external/internal nature of motives for controlling body appearance did not result in statistically significant changes in the OBC control beliefs component as hypothesized. Perhaps the learning outcomes related to appearance control beliefs are best captured by a student's expression, "all the talking about beliefs and drawing out the ideals...we are only reinforcing them if alternatives aren't presented."

Body Surveillance (Lessons Five and Six). The primary objective of the two BCRC lessons devoted to the OBC body surveillance component was to raise awareness of the use of body surveillance behaviors as an externally motivated self-monitoring strategy. A content analysis of the open-ended responses from the two BCRC classes revealed some consistent themes with regard to student learning. The most frequently reported "*most important thing*," by both females and males, was a raised awareness of the frequency of their surveillance behaviors. One female student responded, "some things [behaviors] really own me...I'm going to stop letting those behaviors own me." Another male student offered, "all the silly things we obsess over on a daily basis, I realize they are so unnecessary."

Another consistent theme emanating from the students' qualitative evaluations was recognition of focusing on negative rather than positive self-attributes. A female student wrote, "we focus on the [negative] details, the parts, not the whole image or self." "I don't feel good about myself and that discourages me from trying to be better...it's a weird cycle," reported one male participant. The body surveillance lessons produced two additional themes that were expressions of recognizing the importance of feeling good and/or physical activity for fun over looking good and/or appearance-based activity motives. One female responder proclaimed and many others agreed, "I will set goals for healthy outcomes, not for physical appearance." Another woman expressed, "maybe just realizing it will help me make better decisions to care about myself and base my actions on feelings instead of looks."

Given the ages and undergraduate student status of the BCRC participants, one unexpected, yet relevant, learning theme regularly emerged across all lessons. Parents, mothers and fathers, expressed a strong desire to put into practice the learning outcomes of the BCRC lessons by sharing their newfound understanding with their children. One father wrote, "I am going to be more careful with what my children see and hear...I will talk with them about this...I will do this immediately."

Focus group ($N = 7$) participants offered evaluative feedback regarding the meaningfulness of the lessons related to the three OBC components. They responded in each of the three OBC areas to the following questions, *Which topics or activities related to [insert OBC component] were most meaningful [least meaningful] to you and in what way, and do you have any suggestions for change?* The most significant revelation from the focus group results was the interest in a behavioral or activism component. The participants felt that the time was insufficient for implementing change and that strategies were presented without opportunity to practice. When asked how learning as a result of the BCRC influenced their body-self relationship, there was a consistently voiced theme, the difficulty in changing OBC even with an increased

individual awareness of the social and physical contexts that give meaning to bodily experiences. The idea is authenticated in the participant's voice, "[I] didn't realize how much society influences [body-self relationships] and how much harder it is to work against society's views and just be me; that is what I want to be."

Discussion

McKinley and Hyde (1996) suggested that changing body consciousness would be no easy task. The results of the quantitative analyses appear to support that contention. The primary purpose of the intervention study addressed the possibility of changing the levels of the OBCS components (body surveillance, body shame, and appearance control beliefs), in both females and males, toward more productive body experiences through the design and delivery of a cognitively processed BCRC. The feasibility of such a curriculum was also a question. While the data did not support the hypothesis that students receiving the BCRC would report lower OBC component scores following the BCRC than those students in the classes without the BCRC, the success of the curriculum should not be measured solely on the basis of statistical significance.

Quantifying Curriculum Outcomes

Only once has the OBCS been used to assess change over time related to specific course content. Matacin (2003) used the OBCS in a pre-experimental design to assess a shift in women's perceptions of their bodies following a 16-week university honors course focusing specifically on women's body image and weight concerns across the life span, finding significantly lower scores on all OBC variables between the beginning and ending of class. However, there are some distinct differences between Matacin's course and this study's body consciousness raising program.

Matacin's course was offered as an elective, upper-level, honors course in the women's studies program and was exclusive to women. The BCRC was layered into the regular course content of a lower-level, co-ed women's studies course as well as a co-ed weight management lab,

both courses fulfilling a university core requirement for most students. Aside from the difference in term length (16-weeks vs. 10-weeks), Matacin's gender-segregated course content was entirely focused on factors that might influence OBC component scores from a feminist standpoint. The gender-integrated BCRC was designed to address the components of OBC, yet the larger portion of the regular content in each of the treatment classes was not specific to OBC components. Additionally, Matacin's maximum course enrollment was less than half of the weight management BCRC class enrollment (the smaller of the two BCRC classes), which possibly facilitated more meaningful student-student as well as student-teacher interactions across all students. Finally, I surmise that Matacin's students elected to take the course because of the advertised course content while the BCRC students were unaware of the BCRC content prior to enrollment in either the women's studies or weight management class.

There is an absence of published research utilizing the OBCS longitudinally, either to measure change in OBC components over time as the result of an experimental condition or to assess the stability of OBC across contexts. The OBCS components have demonstrated acceptable two-week test-retest reliability (McKinley, 1998; McKinley & Hyde, 1996). It is uncertain as to whether OBC is a stable construct across longer time periods and when tested in domains that are contextually different from those of the early OBC measurement studies. It is also uncertain as to whether the OBCS is sensitive enough to reliably measure changes in self-objectification, particularly those that move an individual toward a more subjective body-self experience. OBC is a construct that locates an individual's body-self relationship as a third person perspective, viewing one's body as an object separate from oneself, which contributes to negative bodily experiences. The participants in the BCRC expressed their learning as a desire to focus more on their positive body experiences, trusting internal cues, such as how their body feels rather than how it looks, to send messages regarding their body-self relationship. This expression of learning relocates the view of one's body from the third- to first-person perspective, a more

subjective body-as-self view. Since the OBCS was designed as a measure of objectified body consciousness, it is possible that the instrument did not measure the participants' move toward more subjective body awareness. More work is warranted if we are to gain a better understanding of the sensitivity of the OBCS as well as the stability of the components measured by the instrument. Changing OBC may not be as arduous as validating and reliably measuring change.

Perhaps the OBCS was unable to capture changes in students' body consciousness as a result of the BCRC, or maybe OBC is sensitive to varying contexts and not a stable construct. Conceivably, students' intentions to learn the course content differently influenced learning and, consequently, the measurable OBC outcomes. Possibly, the co-educational climate of the BCRC courses fostered experiential constraints that consequently limited measurable changes in OBC components. It is difficult to speculate as to why no differences in OBC scores from pre- to post-BCRC were quantified given the limited research using the OBCS as an instrument to measure change. Retrospectively, indicators of other student outcomes could have been employed as well, such as measures of cultural competency and/or body confidence. It is also difficult to speculate as to what contributed to the differences across time and among classes that were measured by the OBCS.

We felt it important to expand an understanding of OBC using a theory-to-practice approach. A co-educational curriculum aimed at increasing female and male students' awareness of sociocultural forces as well as the processes of internalization of societal standards of appearance was designed and successfully delivered. Although the impact of the BCRC on undergraduates' OBC levels was not statistically demonstrated, a qualitative assessment of the BCRC from the perspective of the students offered some insight as to the potential for sociocultural literacy curriculums to positively impact student's body-related consciousness. The BCRC was not without limitations. The quasi-experimental design offered the advantage of non-treatment control groups for comparison and yet, at the same time, forced curriculum delivery

into an already time constrained 10-week term. The delivery of the BCRC resulted in additional course content for those students receiving the BCRC, which may have had a negative impact on student learning. Also, this design limited our ability to make determinations as to the effectiveness of pedagogical procedures, such as content sequencing, adequacy of BCRC contact time, and layering the BCRC into regular course content. Finally, if OBC is a gendered phenomenon, then perhaps a curriculum designed to effectively change OBC components should be presented differently for females and males.

While the OBCS was unable to capture students' raised awareness of the influence of sociocultural forces on their body experiences, the students' voices lend credence to the potential outcomes of cultural competency programs, like the BCRC, in terms of positive influences on individuals' body-self relationships. It is unknown whether increased knowledge of the influence of sociocultural forces will have either an immediate or long-term effect on body-related behaviors, particularly physical activity behaviors. Examining the behavioral impact of raised awareness was beyond the scope of this project. The contention is that only through individual and collective consciousness can the culturally oppressed body become a site of personal belief- and behavior-based resistance, thereby promoting social transformation, and consequent liberated physicality. Some researchers (Steiner-Adair et al., 2002) have examined the effectiveness of similar feminist-inspired curriculums in terms of behavior change, finding that raised awareness alone has little behavioral impact. The research must continue. We propose future research examine the potential of combining sociocultural literacy programs with sound behavior change principles to promote autonomous physical activity behaviors that are not motivated by internalized cultural standards of the ideal body, but rather by physical

activity for reasons that are self-determined with sensation- and skill-based outcomes. A final comment from a female student summarizes the challenge, "it's hard to put things in progress, especially since I am so full of these ideas already...it's hard to change, I will try."

References

- Berg, B. L. (2001). *Qualitative research methods for the social sciences (4th ed.)*. Boston: Allyn and Bacon.
- Connell, R. W. (1987). *Gender and power: Society, the person, and sexual politics*. Palo Alto, CA: Stanford University Press.
- Conroy, D. E., Motl, R. W., & Hall, E. G. (2000). Progress toward construct validation of the self-presentation in exercise questionnaire. *Journal of Sport and Exercise Psychology, 22*, 21-38.
- Fredrickson, B. L., & Roberts, T. (1997). Objectification theory: Toward understanding women's lived experiences and mental health risks. *Psychology of Women Quarterly, 21*, 173-206.
- Greenleaf, C. (2002, October). *Objectified body consciousness, self-presentational motives for exercise and body image behaviors among female exercisers*. Poster session presented at the annual meeting of the Association for the Advancement of Applied Sport Psychology, Tuscon, AZ.
- Kearney-Cooke, A. (2002). Familial influences on body image development. In T. F. Cash & T. Pruzinsky (Eds.), *Body image: A handbook of theory, research, and clinical practice* (pp. 99-107). New York: Guilford.
- Levine, M. P., & Smolak, L. (2002). Ecological and activism approaches to the prevention of body image problems. In T. F. Cash & T. Pruzinsky (Eds.), *Body image: A handbook of theory, research, and clinical practice* (pp. 497-505). New York: Guilford.
- Matacin, M. L. (2003, June). *Don't hate me because I'm beautiful: Transforming competition among women*. Paper presented at the annual meeting of the National Women's Studies Association, New Orleans, LA.
- McKinley, N. M. (1995). Women and objectified body consciousness: A feminist analysis.

- (Doctoral dissertation, University of Wisconsin-Madison, Madison, WI, 1995).
Dissertation Abstracts International, 56, 05B, 9527111.
- McKinley, N. M. (1998). Gender differences in undergraduate' body esteem: the mediating effects of objectified body consciousness and actual/ideal weight discrepancy. *Sex Roles*, 39 (1/2), 113-123.
- McKinley, N. M. (2002). Feminist perspectives and objectified body consciousness. In T.F. Cash & T.Pruzinsky (Eds.), *Body image: A handbook of theory, research, and clinical practice*. (pp. 55-62). New York: Guilford.
- McKinley, N. M., & Hyde, J. S. (1996). The objectified body consciousness scale: Development and validation. *Psychology of Women Quarterly*, 20, 181-215.
- Nunnally, J. C. (1978). *Psychometric theory* (2nd ed.). New York: McGraw-Hill.
- Parsons, E. M., & Betz, N. E. (2001). The relationship of participation in sport and physical activity to body objectification, instrumentality, and locus of control among young women. *Psychology of Women Quarterly*, 25, 209-222.
- Piran, N. (1999). The reduction of preoccupation with body weight and shape in schools: A feminist approach. In N. Piran, M. P. Levine, & C. Steiner-Adair (Eds.), *Preventing eating disorders: A handbook of interventions and special challenges*. Philadelphia: Brunner/Mazel.
- Spitzack, C. (1990). *Confessing excess: Women and the politics of body reduction*. Albany: State University of New York Press.
- Steiner-Adair, C., Sjostrom, L., Franko, D. L., Pai, S., Tucker, R., Becker, A. E., & Herzog, D. B. (2002). Primary prevention of risk factors for eating disorders in adolescent girls: Learning from practice. *International Journal of Eating Disorders*, 32, 401-411.
- Tabachnick, B. G., & Fidell, L. S. (2001). *Using multivariate statistics* (4th ed.). Needham Heights, MA: Allyn and Bacon.

Thomas, J. R., Salazar, W., & Landers, D. M. (1991). What is missing in $p < .05$? Effect size.

Research Quarterly for Exercise and Sport, 62, 344-348.

Worell, J., & Remer, P. (1992). *Feminist perspectives in therapy: An empowerment model for women*. Chichester, England: Wiley.

Tables

Table 1. Descriptive Statistics and Gender Differences on OBC Variables Week One

OBC Variables		Survey	Shame	Control
Class	Gender	Week One Mean (SD)		
Engineering	Female ($n = 12$)	4.25 (.72)	3.46 (.83)	4.91 (.78)
	Male ($n = 26$)	3.83 (1.07)	2.94 (.94)	4.99 (.77)
Weight Mgt.-	Female ($n = 25$)	4.69 (.91)*	3.60 (.84)	5.05 (.90)
BCRC	Male ($n = 12$)	3.67 (.94)*	3.53 (1.01)	5.44 (.90)
Weight Mgt.-	Female ($n = 21$)	5.02 (.99)*	4.00 (1.04)*	5.41 (.62)
No BCRC	Male ($n = 11$)	3.81 (1.14)*	3.02 (1.03)*	5.23 (.59)
Women Studies-	Female ($n = 41$)	4.48 (.86)	3.46 (1.09)	4.80 (.88)
BCRC	Male ($n = 9$)	3.99 (.96)	3.39 (.82)	5.27 (.97)
Women Studies-	Female ($n = 40$)	4.35 (.88)	3.18 (.96)	5.00 (.81)*
No BCRC	Male ($n = 4$)	3.87 (1.02)	2.47 (.31)	6.19 (1.24)*
All	Female ($n = 139$)	4.54 (.88)**	3.49 (1.00)*	5.01 (.83)
	Male ($n = 68$)	3.97 (1.02)**	3.10 (.95)*	5.24 (.86)

Note. * Significant at $p \leq .01$. **Significant at $p \leq .001$

Table 2. Descriptive Statistics and Gender Differences on OBC Variables Week Ten

OBC Variables		Survey	Shame	Control
Class	Gender (<i>n</i> =)	Week Ten Mean (<i>SD</i>)		
Engineering	Female (<i>n</i> = 12)	3.84 (.86)	3.22 (1.06)	4.78 (.76)
	Male (<i>n</i> = 26)	3.78 (1.07)	3.03 (1.10)	4.80 (.90)
Weight Mgt.-	Female (<i>n</i> = 25)	4.52 (.91)	3.49 (.87)	5.05 (.87)
BCRC	Male (<i>n</i> = 12)	4.12 (.72)	3.81 (.51)	4.71 (.70)
Weight Mgt.-	Female (<i>n</i> = 21)	4.71 (.76)	3.61 (.77)	4.99 (.76)
No BCRC	Male (<i>n</i> = 11)	4.13 (1.10)	3.07 (1.16)	5.17 (.53)
Women Studies-	Female (<i>n</i> = 41)	4.51 (.97)	3.42 (1.01)	4.80 (1.00)
BCRC	Male (<i>n</i> = 9)	3.94 (1.14)	3.25 (.85)	4.99 (.78)
Women Studies-	Female (<i>n</i> = 40)	4.26 (.65)	3.35 (1.05)*	4.84 (.77)*
No BCRC	Male (<i>n</i> = 4)	4.13 (.89)	1.94 (.65)*	5.88 (1.05)*
All	Female (<i>n</i> = 139)	4.41 (.92)*	3.43 (.96)	4.88 (.85)
	Male (<i>n</i> = 68)	3.87 (1.02)*	3.10 (.95)	5.24 (.86)

Note. * Significant at $p \leq .01$. **Significant at $p \leq .001$

Table 3. Effect Sizes for Within-Class and Between-BCRC Groups by Gender

		Survey	Shame	Control
Within - Class	Gender (n =)			
<i>Engineering</i>	Female (n = 12)	-.57	-.28	-.17
	Male (n = 26)	-.05	.10	-.25
<i>Weight Mgt.- BCRC</i>	Female (n = 25)	-.19	-.13	.00
	Male (n = 12)	.48	.28	-.81
<i>Weight Mgt.- No BCRC</i>	Female (n = 21)	-.31	-.37	-.68
	Male (n = 11)	.28	.05	-.10
<i>Women Studies- BCRC</i>	Female (n = 41)	.03	-.03	.00
	Male (n = 9)	-.05	-.17	-.29
<i>Women Studies- No BCRC</i>	Female (n = 40)	-.09	.18	-.21
	Male (n = 4)	-.64	-1.71	-.25
Between - Class				
<i>Weight Mgt. - BCRC and Weight Mgt. - No BCRC</i>				
	Female (n = 46)	-.16	-.32	-.53
	Male (n = 23)	-.13	-.24	.96
<i>Women Studies - BCRC and Women Studies - No BCRC</i>				
	Female (n = 81)	-.11	.20	-.20
	Male (n = 13)	-.41	-.52	-.02

Note. Formula for within-group: $ES = (M_{Time 2} - M_{Time 1}) / SD_{Time 1}$ (Thomas et al., 1991). Formula for between-group: $ES = [(M_{BCRC T1} - M_{BCRC T2}) - (M_{No BCRC T1} - M_{No BCRC T2})] / \sqrt{s^2_{pooled}}$ (Long & Stavel, 1995).

CHAPTER 4

Objectified Body Consciousness: In Conclusion

Still, little is known about OBC, much less in relation to psychological and behavioral variables important to sport and exercise researchers. The relationship of OBC to bodily experiences has been demonstrated (McKinley, 1998; McKinley & Hyde, 1996), as well as the relationship of bodily experiences on self-conceptions (Fox, 2000; Sonstroem, Harlow, & Josephs, 1994). Our cross-sectional study contributed to this scholarship and supported the relationships between OBC and self-conceptions. Additionally, feminist-inspired programs for the prevention of negative bodily experiences and behaviors have demonstrated effectiveness at both the individual and environmental levels (Piran, 1999; Steiner-Adair et al., 2002). While the BCRC was not empirically supported, the program was successfully design and delivered, as well as positively evaluated in terms of student-expressed learning outcomes. More work is needed if we are to fully examine the concept of OBC in the context of physical activity. Our argument is made calling for an innovative approach to the study of OBC within the discipline of sport and exercise science that combines a cultural competency curriculum with proven behavior change strategies. It is our hope that through future research, aimed at increasing students' awareness of societal standards as well as the processes of internalization of the culturally constructed physical standards, we may better examine the sociocultural influences of our discipline on OBC levels. Eventually, we hope to better understand the causal relationships between OBC and both psychological and behavioral variables in the physical domain.

BIBLIOGRAPHY

- Bane, S., & McAuley, E. (1998). Body image and exercise. In J. L. Duda (Ed.), *Advances in sport and exercise psychology measurement* (pp.311-322). Morgantown, WV: Fitness Information Technology.
- Berg, B. L. (2001). *Qualitative research methods for the social sciences (4th ed.)*. Boston: Allyn and Bacon.
- Boutilier, M. A., & SanGiovanni, L. F. (1994). Politics, public policy, and Title IX: Some limitations of liberal feminism. In S. Birrell and C. L. Cole (Eds.), *Women, sport, and culture* (pp. 97-109). Champaign, IL: Human Kinetics.
- Connell, R. W. (1987). *Gender and power: Society, the person, and sexual politics*. Palo Alto, CA: Stanford University Press.
- Conroy, D. E., Motl, R. W., & Hall, E. G. (2000). Progress toward construct validation of the self-presentation in exercise questionnaire. *Journal of Sport and Exercise Psychology*, 22, 21-38.
- Crocker, P. R. E., & Ellsworth, J. P. (1990). Perceptions of competence in physical education students. *Canadian Journal of Sport Sciences*, 15, 4, 262-266.
- Curry L. A., & Rehm, M. (1997). Participation in NCAA Division I Athletics: Self-perception differences in athletes and nonathletes. *College Student Journal*, 31, 96-104.
- Fox, K. R. (1990). *The physical self-perception profile manual*. DeKalb, IL: Northern Illinois University.
- Fox, K. R. (1997). Let's get physical. In K. Fox (Ed.), *The physical self: From motivation to well-being*. Champaign, IL: Human Kinetics.
- Fox, K. R. (2000). Self-esteem, self-perceptions and exercise. *International Journal of Sport Psychology*, 31, 228-240.
- Fox, K. R., & Corbin, C. B. (1989). The Physical Self-Perception Profile: Development and

- preliminary validation. *Journal of Sport and Exercise Psychology*, *11*, 408-430.
- Fox, K. R., & Vehnekamp, T. J. (1990). Gender comparisons of self-perceptions, physical fitness, exercise and dietary habits in college students. *Journal of Sport Sciences*, *8*, 282-283.
- Fredrickson, B. L., & Roberts, T. (1997). Objectification theory: Toward understanding women's lived experiences and mental health risks. *Psychology of Women Quarterly*, *21*, 173-206.
- Gravetter, F. J., & Wallnau, L. B. (2004). *Statistics for the behavioral sciences* (6th ed.). Belmont, CA: Wadsworth/Thomson Learning.
- Greenleaf, C. (2000). Self-objectification among physically active women: Negative psychological and behavioral correlates. (Doctoral dissertation, University of North Carolina at Greensboro, Greensboro, NC, 2000). *Dissertation Abstracts International*, *61*, 07B, 3844.
- Greenleaf, C. (2002, October). *Objectified body consciousness, self-presentational motives for exercise and body image behaviors among female exercisers*. Poster session presented at the annual meeting of the Association for the Advancement of Applied Sport Psychology, Tucson, AZ.
- Gilmore, T. (2000). Influence of shame, female identity, and ethnic identity on body image across women's life-span. (Fuller Theological Seminary, 2000). *Dissertation Abstracts International*, *61*, 09B, 4982.
- Harter, S. (1999a). Discrepancies between real and ideal self-concepts. In *The construction of the self: A developmental perspective* (pp. 142-165). New York: Guilford.
- Harter, S. (1999b). The content, valence, and organization of self-evaluative judgments. In *The construction of the self: A developmental perspective* (pp. 130-134). New York: Guilford.
- Hayes, S. D., Crocker, P. R. E., & Kowalski, K. C. (1999). Gender differences in physical self-

- perceptions, global self-esteem and physical activity: Evaluation of the Physical Self-Perception Profile model. *Journal of Sport Behavior*, 22, 1-14.
- Heinberg, L. J., Thompson, J. K., & Matzon, J. L. (2001). Body image dissatisfaction as a motivator for healthy lifestyle change: Is some distress beneficial? In R. H. Striegel-Moore and L. Smolak (Eds.), *Eating disorders: Innovative directions in research and practice*. Washington, D.C.: American Psychological Association.
- Hoffman, R. M., Borders, L. D., & Hattie, J. A. (2000). Reconceptualizing femininity and masculinity; From gender roles to gender self-confidence. *Journal of Social Behavior & Personality*, 15, 475-504.
- Kearney-Cooke, A. (2002). Familial influences on body image development. In T. F. Cash & T. Pruzinsky (Eds.), *Body image: A handbook of theory, research, and clinical practice* (pp. 99-107). New York: Guilford.
- Kohl, H. W., Blair, S. N., Paffenbarger, Jr., R. S., Macera, C. A., & Kronenfeld, J. J. (1997). The Aerobics Center Longitudinal Study Physical Activity Questionnaire. *Medicine and Science in Sports and Exercise*, 29, S10-S14.
- Krane, V., Waldron, J., Michalenok, J., & Stiles-ShIPLEY, J. (2001). Body image concerns in female exercisers and athletes: A feminist cultural studies perspective. *Women in Sport and Physical Activity Journal*, 10, 17-54.
- Kretchmar, J. L. (2001). Objectified body consciousness in African American and Caucasian college-age women of varying physical activity levels. (Doctoral dissertation, University of North Carolina at Chapel Hill, 2001). *Dissertation Abstracts International*, 62, 912.
- Levine, M. P., & Smolak, L. (2002). Ecological and activism approaches to the prevention of body image problems. In T. F. Cash & T. Pruzinsky (Eds.), *Body image: A handbook of theory, research, and clinical practice* (pp. 497-505). New York: Guilford.
- Matacin, M. L. (2003, June). *Don't hate me because I'm beautiful: Transforming competition*

- among women*. Paper presented at the annual meeting of the National Women's Studies Association, New Orleans, LA.
- McKinley, N. M. (1995). Women and objectified body consciousness: A feminist analysis. (Doctoral dissertation, University of Wisconsin-Madison, Madison, WI, 1995). *Dissertation Abstracts International*, 56, 05B, 9527111.
- McKinley, N. M. (1998). Gender differences in undergraduate' body esteem: the mediating effects of objectified body consciousness and actual/ideal weight discrepancy. *Sex Roles*, 39 (1/2), 113-123.
- McKinley, N. M. (2002). Feminist perspectives and objectified body consciousness. In T.F. Cash & T.Pruzinsky (Eds.), *Body image: A handbook of theory, research, and clinical practice*. (pp. 55-62). New York: Guilford.
- McKinley, N. M., & Hyde, J. S. (1996). The objectified body consciousness scale: Development and validation. *Psychology of Women Quarterly*, 20, 181-215.
- Muth, J. L., & Cash, T. F. (1997). Body-image attitudes: What difference does gender make? *Journal of Applied Social Psychology*, 27, 1438-1453.
- Neeman, J., & Harter, S. (1986). *Manual for the Self-Perception Profile for College Students*. Denver, CO: University of Denver.
- Nunnally, J. C. (1978). *Psychometric theory* (2nd ed.). New York: McGraw-Hill.
- Parsons, E. M., & Betz, N. E. (2001). The relationship of participation in sport and physical activity to body objectification, instrumentality, and locus of control among young women. *Psychology of Women Quarterly*, 25, 209-222.
- Piran, N. (1999). The reduction of preoccupation with body weight and shape in schools: A feminist approach. In N. Piran, M. P. Levine, & C. Steiner-Adair (Eds.), *Preventing eating disorders: A handbook of interventions and special challenges*. Philadelphia: Brunner/Mazel.

- Rieves, L., & Cash, T. F. (1996). Social developmental factors and women's body image attitudes. *Journal of Social Behavior and Personality, 11*, 63-78.
- Sonstroem, R. J., Harlow, L. L., & Josephs, L. (1994). Exercise and self-esteem: Validity of model expansion and exercise associations. *Journal of Sport and Exercise Psychology, 16*, 29-42.
- Sonstroem, R. J., & Morgan, W. P. (1989). Exercise and self-esteem: Rationale and model. *Medicine and Science in Sports and Exercise, 21*, 329-337.
- Sonstroem, R. J., Speliotis, E. D., & Fava, J. L. (1992). Perceived physical competence in adults. An examination of the Physical Self-Perception Profile. *Journal of Sport and Exercise Psychology, 10*, 207-221.
- Spitzack, C. (1990). *Confessing excess: Women and the politics of body reduction*. Albany: State University of New York Press.
- Steiner-Adair, C., Sjostrom, L., Franko, D. L., Pai, S., Tucker, R., Becker, A. E., & Herzog, D. B. (2002). Primary prevention of risk factors for eating disorders in adolescent girls: Learning from practice. *International Journal of Eating Disorders, 32*, 401-411.
- Tabachnick, B. G., & Fidell, L. S. (2001). *Using multivariate statistics* (4th ed.). Needham Heights, MA: Allyn and Bacon.
- Thomas, J. R., Salazar, W., & Landers, D. M. (1991). What is missing in $p < .05$? Effect size. *Research Quarterly for Exercise and Sport, 62*, 344-348.
- Thompson, J. K., Heinberg, L. J., Altabe, M., & Tantleff-Dunn, S., (1999). *Exacting beauty. Theory, assessment, and treatment of body image disturbance*. Washington, DC: American Psychological Association.
- Turner, A. S. (2001). Psychological correlates of objectified body consciousness in younger and older adolescent girls. (The Fielding Institute). *Dissertation Abstracts International, 61*, 12B, 6741.

Worell, J., & Remer, P. (1992). *Feminist perspectives in therapy: An empowerment model for women*. Chichester, England: Wiley.

Zumph, C. L., & Harter, S. (1989). Mirror, mirror on the wall: The relationship between appearances and self-worth in adolescent males and females. In S. Harter, *The construction of the self*. New York: Guilford.

APPENDICES

Appendix A

Objectified Body Consciousness Scale Questionnaire

HOW BODY AWARE AM I?

How people feel about themselves and their bodies could influence their behaviors. Rate your personal level of agreement with each of the following statements by circling the corresponding number with: (1) indicating *strong disagreement* (strongly disagree), (2) *pretty much disagree*, (3) *sort of disagree*, (4) *neutral* (*neither agree or disagree*) (5) *sort of agree*, (6) *pretty much agree*, or (7) indicating *strong agreement* (strongly agree).

Please respond as accurately as possible and base your response on your personal feelings.

1. I THINK A PERSON'S WEIGHT IS MOSTLY DETERMINED BY THE GENES THEY ARE BORN WITH.

<i>Strongly Disagree</i>			<i>Neither agree or disagree</i>			<i>Strongly Agree</i>
1	2	3	4	5	6	7

2. A LARGE PART OF BEING IN SHAPE IS HAVING THAT KIND OF BODY IN THE FIRST PLACE

<i>Strongly Disagree</i>			<i>Neither agree or disagree</i>			<i>Strongly Agree</i>
1	2	3	4	5	6	7

3. I REALLY DON'T THINK I HAVE MUCH CONTROL OVER HOW MY BODY LOOKS.

<i>Strongly Disagree</i>			<i>Neither agree or disagree</i>			<i>Strongly Agree</i>
1	2	3	4	5	6	7

4. I THINK IT IS MORE IMPORTANT THAT MY CLOTHES ARE COMFORTABLE THAN WHETHER THEY LOOK GOOD ON ME.

<i>Strongly Disagree</i>			<i>Neither agree or disagree</i>			<i>Strongly Agree</i>
1	2	3	4	5	6	7

5. I OFTEN WORRY ABOUT WHETHER THE CLOTHES I AM WEARING MAKE ME LOOK GOOD.

<i>Strongly Disagree</i>			<i>Neither agree or disagree</i>			<i>Strongly Agree</i>
1	2	3	4	5	6	7

6. DURING THE DAY, I THINK ABOUT HOW I LOOK MANY TIMES.

<i>Strongly Disagree</i>			<i>Neither agree or disagree</i>			<i>Strongly Agree</i>
1	2	3	4	5	6	7

7. THE SHAPE YOU ARE IN DEPENDS MOSTLY ON YOUR GENES.

<i>Strongly Disagree</i>			<i>Neither agree or disagree</i>			<i>Strongly Agree</i>
1	2	3	4	5	6	7

8. WHEN I'M NOT THE SIZE I THINK I SHOULD BE, I FEEL ASHAMED.

<i>Strongly Disagree</i>			<i>Neither agree or disagree</i>			<i>Strongly Agree</i>
1	2	3	4	5	6	7

9. I FEEL ASHAMED OF MYSELF WHEN I HAVEN'T MADE THE EFFORT TO LOOK MY BEST.

<i>Strongly Disagree</i>			<i>Neither agree or disagree</i>			<i>Strongly Agree</i>
1	2	3	4	5	6	7

10. I RARELY THINK ABOUT HOW I LOOK.

<i>Strongly Disagree</i>				<i>Neither agree or disagree</i>			<i>Strongly Agree</i>
1	2	3	4	5	6	7	

11. WHEN I'M NOT EXERCISING ENOUGH, I QUESTION WHETHER I AM A GOOD ENOUGH PERSON.

<i>Strongly Disagree</i>				<i>Neither agree or disagree</i>			<i>Strongly Agree</i>
1	2	3	4	5	6	7	

12. EVEN WHEN I CAN'T CONTROL MY WEIGHT, I THINK I'M AN OKAY PERSON.

<i>Strongly Disagree</i>				<i>Neither agree or disagree</i>			<i>Strongly Agree</i>
1	2	3	4	5	6	7	

13. IT DOESN'T MATTER HOW HARD I TRY TO CHANGE MY WEIGHT, IT'S PROBABLY ALWAYS GOING TO BE ABOUT THE SAME.

<i>Strongly Disagree</i>				<i>Neither agree or disagree</i>			<i>Strongly Agree</i>
1	2	3	4	5	6	7	

14. I FEEL LIKE I MUST BE A BAD PERSON WHEN I DON'T LOOK AS GOOD AS I COULD.

<i>Strongly Disagree</i>				<i>Neither agree or disagree</i>			<i>Strongly Agree</i>
1	2	3	4	5	6	7	

15. I CAN WEIGH WHAT I'M SUPPOSED TO WHEN I TRY HARD ENOUGH.

<i>Strongly Disagree</i>				<i>Neither agree or disagree</i>			<i>Strongly Agree</i>
1	2	3	4	5	6	7	

16. I RARELY COMPARE HOW I LOOK WITH HOW OTHER PEOPLE LOOK.

<i>Strongly Disagree</i>				<i>Neither agree or disagree</i>			<i>Strongly Agree</i>
1	2	3	4	5	6	7	

17. I NEVER WORRY THAT SOMETHING IS WRONG WITH ME WHEN I AM NOT EXERCISING AS MUCH AS I SHOULD.

<i>Strongly Disagree</i>				<i>Neither agree or disagree</i>			<i>Strongly Agree</i>
1	2	3	4	5	6	7	

18. WHEN I CAN'T CONTROL MY WEIGHT, I FEEL LIKE SOMETHING MUST BE WRONG WITH ME.

<i>Strongly Disagree</i>				<i>Neither agree or disagree</i>			<i>Strongly Agree</i>
1	2	3	4	5	6	7	

19. I AM MORE CONCERNED WITH WHAT MY BODY CAN DO THAN HOW IT LOOKS.

<i>Strongly Disagree</i>				<i>Neither agree or disagree</i>			<i>Strongly Agree</i>
1	2	3	4	5	6	7	

20. I THINK A PERSON IS PRETTY MUCH STUCK WITH THE BODY THEY ARE BORN WITH.

<i>Strongly Disagree</i>				<i>Neither agree or disagree</i>			<i>Strongly Agree</i>
1	2	3	4	5	6	7	

21. I THINK MORE ABOUT HOW MY BODY FEELS THAN HOW MY BODY LOOKS.

<i>Strongly Disagree</i>				<i>Neither agree or disagree</i>			<i>Strongly Agree</i>
1	2	3	4	5	6	7	

22. I WOULD BE ASHAMED FOR PEOPLE TO KNOW WHAT I REALLY WEIGH.

Strongly Disagree

Neither agree or disagree

Strongly Agree

1

2

3

4

5

6

7

23. I RARELY WORRY ABOUT HOW I LOOK TO OTHER PEOPLE.

Strongly Disagree

Neither agree or disagree

Strongly Agree

1

2

3

4

5

6

7

24. I THINK A PERSON CAN LOOK PRETTY MUCH HOW THEY WANT TO IF THEY ARE WILLING TO WORK AT IT.

Strongly Disagree

Neither agree or disagree

Strongly Agree

1

2

3

4

5

6

7

Appendix B

Physical Self-Conceptions Questionnaire

	Really True For Me	Sort of True For Me			Sort of True For Me	Really True For Me
4.	[]	[]	Some people are not very confident about their level of physical conditioning and fitness	BUT	Others always feel confident that they maintain excellent conditioning and fitness.	[] []
5.	[]	[]	Some people feel that they are physically stronger than most people of their sex	BUT	Others feel that they lack physical strength compared to most others of their sex.	[] []
6.	[]	[]	Some people like the way they are leading their lives	BUT	Others don't like the way they are leading their lives.	[] []
7.	[]	[]	Some people feel extremely accepting of who they are and what they can do physically	BUT	Others are sometimes not quite as accepting of who they are physically.	[] []
8.	[]	[]	Some people feel that they are among the best when it comes to athletic ability	BUT	Others feel that they are not among the most able when it comes to athletics.	[] []
9.	[]	[]	Some people feel that they have difficulty maintaining an attractive body	BUT	Others feel that they are easily able to keep their bodies looking attractive.	[] []
10.	[]	[]	Some people are sometimes not so happy with the way they are or what they can do physically	BUT	Others always feel happy about the kind of person they are physically.	[] []
11.	[]	[]	Some people make certain that they take part in some form of regular vigorous physical exercise	BUT	Others don't often manage to keep up regular vigorous physical exercise.	[] []

	Really True For Me	Sort of True For Me		Sort of True For Me	Really True For Me
12.	[]	[]	Some people feel that their muscles are much stronger than most others of their sex	BUT	Others feel that on [] [] the whole their muscles are not quite so strong as most others of their sex
13.	[]	[]	Some people are very happy being the way they are	BUT	Others would like [] [] to be different
14.	[]	[]	Some people are sometimes not so approving of the way they are or what they can do physically	BUT	Others always feel [] [] approving about the kind of person they are physically.
15.	[]	[]	Some people are not quite so confident when it comes to taking part in sports activities	BUT	Others are among [] [] the most confident when it comes to taking part in sports activities.
16.	[]	[]	Some people feel embarrassed by their body when it comes to wearing few clothes	BUT	Others do not feel [] [] embarrassed by their body when it comes to wearing few clothes.
17.	[]	[]	When it comes to the physical side of themselves, some people do not feel very confident	BUT	Others seem to [] [] have a real sense of confidence in the physical side of themselves.
18.	[]	[]	Some people do not usually have a high level of stamina and fitness	BUT	Others always [] [] maintain a high level of stamina and fitness.
19.	[]	[]	When it comes to situations requiring strength, some people are one of the first to step forward	BUT	When it comes to [] [] situations requiring strength, some people are one of the last to step forward.
20.	[]	[]	Some people sometimes question whether they are a worthwhile person	BUT	Others feel that they [] [] are a worthwhile person.

	Really True For Me	Sort of True For Me		Sort of True For Me	Really True For Me
21.	[]	[]	When it comes to the physical side of themselves, some people do not feel very favorable	BUT	Others seem to have a real sense of feeling favorable toward the physical side of themselves.
22.	[]	[]	Some people feel that they are always one of the best when it comes to joining in sports activities	BUT	Others feel that they are not one of the best when it comes to joining in sports activities.
23.	[]	[]	Some people feel that they are often admired because their physique or figure is considered attractive	BUT	Others rarely feel that they receive admiration for the way their body looks.
24.	[]	[]	Some people always have a really positive feeling about the physical side of themselves	BUT	Others sometimes do not feel positive about the physical side of themselves.
25.	[]	[]	Some people tend to feel a little uneasy in fitness and exercise settings	BUT	Others feel confident and at ease at all time in fitness and exercise settings.
26.	[]	[]	Some people tend to lack confidence when it comes to their physical strength	BUT	Others are extremely confident when it comes to their physical strength.
27.	[]	[]	Some people are disappointed with themselves	BUT	Others are quite pleased with themselves.
28.	[]	[]	Some people always have a really accepting feeling about the physical side of themselves	BUT	Others sometimes do not feel accepting about the physical side of themselves.
29.	[]	[]	Some people are sometimes a little slower than most when it comes to learning new skills in a sports situation	BUT	Others have always seemed to be the quickest when it comes to learning new sports skills.

	Really True For Me	Sort of True For Me			Sort of True For Me	Really True For Me
30.	[]	[]	Some people feel that compared to most, their body does not look in the best shape	BUT	Others feel that compared to most their body always looks in excellent physical shape.	[] []
31.	[]	[]	Some people wish that they could have more respect for their physical selves	BUT	Others always have great respect for their physical selves.	[] []
32.	[]	[]	Some people feel extremely confident about their ability to maintain regular exercise and physical conditioning	BUT	Others don't feel quite so confident about their ability to maintain regular exercise and physical conditioning.	[] []
33.	[]	[]	Some people feel that they are very strong and have well developed muscles compared to most people	BUT	Others feel that they are not so strong and their muscles are not very well developed.	[] []
34.	[]	[]	Some people are dissatisfied with themselves	BUT	Others are satisfied with themselves.	[] []
35.	[]	[]	Some people wish that they could have more approval for their physical selves	BUT	Others always have great approval for their physical selves.	[] []
36.	[]	[]	Given the chance, some people are always one of the first to join in sports activities	BUT	Other people sometimes hold back and are not usually among the first to join in sports.	[] []
37.	[]	[]	Some people are extremely confident about the appearance of their body	BUT	Others are a little self-conscious about the appearance of their body.	[] []

	Really True For Me	Sort of True For Me			Sort of True For Me	Really True For Me
38.	[]	[]	Some people feel extremely satisfied with the kind of person they are physically	BUT	Others sometimes feel a little dissatisfied with their physical selves.	[] []
39.	[]	[]	Some people feel that compared to most they always maintain a high level of physical conditioning	BUT	Others feel that compared to most their level of physical conditioning is not usually so high.	[] []
40.	[]	[]	Some people feel that they are not as good as most at dealing with situations requiring physical strength	BUT	Others feel that they are among the best at dealing with situations which require physical strength.	[] []
41.	[]	[]	Some people like the kind of person they are	BUT	Others would like to be someone else.	[] []
42.	[]	[]	Some people feel extremely favorable with the kind of persons they are physically	BUT	Others sometimes feel a little unfavorable with their physical selves.	[] []

Appendix C

Physical Activity Questionnaire

PHYSICAL ACTIVITY QUESTIONNAIRE

In this section we would like to ask you about your current physical activity and exercise habits that you perform **regularly, at least once a week**. Please answer as accurately as possible. Circle your answer or supply a specific number when asked.

Exercise/Physical Activity

1) For the last **three months**, which of the following moderate or vigorous activities have you performed **regularly**? (Please circle **YES** for all that apply and **NO** if you do not perform the activity. Provide an estimate of the amount of activity for all marked **YES**. Be as complete as possible.)

Walking

NO YES How many sessions per week? _____
 How many miles (or fractions) per session? _____
 Average duration per session? _____ (minutes)

What is your usual walking pace? (*Please circle one only*)

CASUAL OR STROLLING (< 2 mph)	AVERAGE OR NORMAL (2 to 3 mph)	FAIRLY BRISK (3 to 4 mph)	BRISKLY OR STRIDING (4 mph or faster)
--	--------------------------------------	---------------------------------	---

Stair Climbing

NO YES How many flights of stairs do you climb UP each day? _____
 (1 flight = 10 steps)

Jogging or Running

NO YES How many sessions per week? _____
 How many miles (or fractions) per session? _____
 Average duration per session? _____ (minutes)

Treadmill

NO YES How many sessions per week? _____
 Average duration per session? _____ (minutes)
 Speed? _____ (mph) Grade? _____ (%)

Bicycling

NO YES How many sessions per week? _____
 How many miles per session? _____
 Average duration per session? _____ (minutes)

Swimming Laps

NO YES How many sessions per week? _____
 How many miles per session? _____
 (880 yds = 0.5 miles)
 Average duration per session? _____ (minutes)

Aerobic Dance/Calisthenics/Floor Exercise

NO YES How many sessions per week? _____
 Average duration per session? _____ (minutes)

Moderate Sports (e.g. leisure volleyball, golf (walking), social dance, doubles tennis)

NO YES How many sessions per week? _____
 Average duration per session? _____ (minutes)

Vigorous Racquet Sports (e.g. racquetball, squash, singles tennis)

NO YES How many sessions per week? _____
 Average duration per session? _____ (minutes)

Other Vigorous Sports or Exercise Involving Running (e.g. basketball, ultimate frisbee, soccer)

NO YES Please specify: _____
 How many sessions per week? _____
 Average duration per session? _____ (minutes)

Weight Training (e.g. machines, free weights)

NO YES Please specify: _____
 How many sessions per week? _____
 Average duration per session? _____ (minutes)

Other Activities

NO YES Please specify: _____
 How many sessions per week? _____
 Average duration per session? _____ (minutes)

Household Activities (sweeping, vacuuming, washing clothes, cleaning bathrooms/floors)

NO YES How many hours per week? _____ (hours)

Lawn and Garden Work

NO YES How many hours per week? _____ (hours)

2) How many times a week do you engage in **vigorous physical activity** long enough to work up a **sweat**? (defined in terms of average climate conditions) _____ (times per week)

Appendix D

Body Consciousness-Raising Curriculum

Raising Body Consciousness: A Body Consciousness-Raising Curriculum

Program Sessions One and Two - OBC Component: Body shame was introduced as the measure of internalization of cultural body standards and defined as feeling negatively about the self when cultural body standards are not achieved.

Primary Objective. To reduce the negative bodily experiences (body shame) resulting from the internalization of sociocultural body standards.

Strategies. Raising awareness of sociocultural body standards through media literacy facilitated with discussions of the impact of sociocultural mores for thinness, sharing perceptions of current mores, and examining cultural body ideals in the media.

Specific Learning Activities:

- Introduction to video: Identify the potential impact of body ideals on your body-related experiences, attitudes, and beliefs as put forth by the media. The video was used to guide thought processes and identify some areas that might be important. Handouts were provided for note-taking.
- View video: Killing Us Softly III
- Assignment – Use the handout to record how you personally receive body-related messages. Include the media (magazines, TV, movies, etc.), typical comments from family, peers, partners, or other important or less important persons in your life, and personal experiences, messages from yourself. This information will be used in large group discussion around the impact of body ideals on body-related attitudes and beliefs as informed by the film.
- Brainstorm activity – group discussion of the impact of body ideals on body-related attitudes and beliefs as informed by the film.

- Small group activity - Deconstructing Body Ideals: Identify and illustrate the roles of media, peers, and family in disseminating body-related messages through an analysis of magazine ads, typical comments from important others, and shared experiences. Create overhead of the source and value of body-related messages to share with class.
- Reflective writing - Students respond to the statement: "Dear Body, You make me proud because..." Students will free-write, identifying aspects of their bodies that function as a source of pride.
- Lesson evaluation: Putting learning into practice - Individually after each session, students write responses to the statements: The most important thing I got in touch with this session is ... How this applies to my life right now is... What I am going to do about it and when is...

Program Sessions Three and Four - OBC Component: Appearance control beliefs reflect a measure of the extent to which an individual believes she/he can control her/his appearance. Believing in the ability to control body appearance may act as a source of efficacy information and contribute to higher physical self-worth. Conversely, believing that one can and does not, or that one cannot, control the appearance of one's body may prove to be a source of information that challenges one's sense of personal control and competence, contributing to lower physical self-worth.

Primary Objective. To increase an understanding of the extent to which body appearance can be controlled and the external/internal nature of motives for controlling body appearance.

Strategies. Bodies as a reflection of social norms, from the perspective of other-determined (extrinsic) appearance-based motives (sociocultural expectations for feminine/masculine physical appearance), are compared to bodies as a reflection of identity, from the perspective of self-determined (extrinsic) appearance-based motives (health, fitness, social

acceptance, affect), as well as to bodies as a reflection of self-expression, self-determined (intrinsic) appearance-based motives, such as enjoyment, mastery/competence, stimulation, play).

Specific Learning Activities:

- Combating Bodyisms - Exploring weightism, looksism, ableism, and athleticism as forms of prejudice through the construction of systems axis of privilege and inequality in the physical domain and collective action, a letter writing campaign to institutions that contribute to bodyisms.
- Looking at Looks - Reflective writing about a personal appearance-related experience of discrimination/denigration and verbally sharing that experience with a classmate.
- Large group activity: Modeling Appearance Beliefs and Motives - Discussion about bodies as a reflection of self-expression and appearance play Identification of and demonstration of individual self-determined (intrinsic) appearance-based choices with attention to engagement in these practices for personal enjoyment, mastery/competence, and/or stimulation.
- Small group activity: Who's In Control? Defining personal values vs. sociocultural values through an artistic analysis of other-determined (extrinsic) appearance-based disciplinary practices (sociocultural expectations/norms/standards for feminine/masculine physical appearance) in gender-segregated groups drawing on craft paper gender-related disciplinary practices.
- Activism Assignment: Power of Positive Action - Transformation through resistance - Redefining my physical self through personal contracts promoting individual authority in decision-making processes and rewards for personal competence without social comparison.

- Putting learning into practice - Individually after each session, students write responses to the statements: The most important thing I got in touch with this session is ... How this applies to my life right now is... What I am going to do about it and when is...

Program Sessions Five and Six - OBC Component: Body surveillance is conceptualized to represent the amount of time one spends watching her/his body as an outside observer. The contention is that this type of consciousness is informed by comparisons of the physical self with cultural standards, which may lead to observed discrepancies, and ultimately challenges to physical self-worth and psychological well-being.

Primary Objective. To reduce body surveillance as an externally motivated monitoring strategy.

Strategies. Increase awareness of the role of physical activity as an autonomous act of resistance, self-determined as opposed to other-determined, and motivated by health aspects, physical fitness, social aspects, relaxation, enjoyment, mastery, and stimulation, as well as enacted in accordance with personal values.

Specific Learning Activities:

- Individual Feedback: "Claiming Our Physical Strengths - A Positive Self-Assessment" Feedback on positive physical attributes from self to self, from self to another, responding to the statements, "What I like about my physical self is ...; what I like about _____'s physical self is ..."
- Dialog groups: Decrease surveillance and monitoring of external characteristics by developing an internal locus of control and intrinsic motivation, paying attention how one feels as a motivating force, promoting self-determined behavior - "Let the Source Be Within You"

- Role Playing: "I'm Not Looking" Challenging self-surveillance as a habitual behavior through a role playing activity exaggerating surveillance behaviors evident in UG populations.
- Assignment - Journal Entry: "Things I Find Beautiful About My Physical Self That I Can't See" Identify the things that you love about yourself, that you monitor through thoughts and feelings (self-awareness) rather than visually, and that you could use as internally motivating or rewarding toward some action.
- Putting learning into practice: Individually after each session, students write responses to the statements: The most important thing I got in touch with this session is ... How this applies to my life right now is... What I am going to do about it and when is ...