

**EXAMINING THE ROLE OF APPEARANCE IDEAL INTERNALIZATION AND  
BODY IMAGE CONCERNS ON WOMEN'S EXPERIENCES OF COGNITIVE  
DISTRACTION DURING SEX AND SEXUAL DESIRE**

by

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## **Abstract**

Existing research grounded in objectification theory has demonstrated links between the internalization of sociocultural appearance ideals, body image concerns, and problems with sexual functioning and satisfaction for women in Western cultures. However, less is known about how these constructs impact women's experiences of distraction during sex and sexual desire. The purpose of this study was to examine the role of multiple facets of appearance ideal internalization and body image concerns in predicting women's experiences of sexual desire and distracting thoughts during partnered sexual activity. One hundred and thirty four adult women from Vancouver and the Lower Mainland participated in an online survey and completed measures of thin ideal internalization, weight bias internalization, body shape concerns, body esteem (sexual attractiveness, weight concern, physical condition), sexual desire, and appearance and performance-based distraction during sexual activity. Correlations supported previous research findings demonstrating links among appearance ideal internalization, body image concerns, and cognitive distraction during sex, with the exception of sexual desire, which was not associated with cognitive distraction during sex. As hypothesized, regression analyses revealed that appearance ideal internalization and body shape concerns uniquely predicted appearance and performance-based distractions during sex. Specifically, weight bias internalization, body shape and weights concerns, and low self-perceived sexual attractiveness emerged as the strongest predictors. Finally, results indicated that sexual desire was not predicted by body image concerns, appearance ideal internalization, or cognitive distraction during sex. Findings are discussed in the context of current literature.

## **Preface**

This thesis is an original intellectual product of the author, J. Zelichowska. The present study was approved by the UBC-Providence Health Care Research Ethics Board and covered by UBC-PHC REB Number H11-02432.

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## Chapter 1: Introduction

### **Statement of the Problem**

Intimate relationships play an important role in women's psychological wellbeing (Miller & Stiver, 1997). During adolescence and early adulthood, a defining aspect of young women's lives involves exploring and engaging in romantic and sexual relationships. These relationships are cited as a source of joy and pleasure for many women and thus have the potential to play an integral role in women's overall wellbeing (Miller & Stiver). However, heterosexual women often report feeling pressured to approximate the unrealistically thin body type that is perpetuated in popular culture, in order to be viewed as more desirable to men (Seifert, 2005). In Western culture and media, the characteristics that define women as sexually and romantically desirable are highly appearance-focused, narrowly defined, and directed toward the preferences of heterosexual men (Fowles, 1996; Goffman, 1979). Unrealistically thin, long-legged, and large-breasted women are repeatedly portrayed as happier, more successful, and admired than women who do not fit this profile (Dittmar, 2007). When thinness is equated with desirability, women become gradually socialized to view their bodies as objects that carry important social currency (Bordo, 1993).

One of the consequences of this socialization is the tendency to place great importance on how we are perceived by others. This notion is well understood in the context of objectification theory (Fredrickson & Roberts, 1997), which provided the theoretical basis upon which the current study was situated. The central tenant of this framework posits that girls and women are socialized to become hyperaware of their bodies as objects that are to be put on display and evaluated, particularly by men (Kaschak, 1992). The unrelenting and pervasive depictions of women as sexual objects in nearly every aspect of Western culture



and media, make women susceptible to adopting and internalizing the same outside observer lens towards themselves (Fredrickson & Roberts). Furthermore, when women become accustomed to being treated as a body rather than a person, more attention and cognitive resources are allocated to the evaluation of how their body appears to others. This shift in attention may result in a lowered capacity to be aware of internal bodily states. The authors posited that this decreased awareness could interfere with women's sexual experiences and functioning (Fredrickson & Roberts).

In fact, previous research has shown that it is common for women to report being distracted by thoughts that center on evaluating their appearance and performance during sexual activity with a partner (Purdon & Holdaway, 2006). Being distracted during sex has been demonstrated to negatively effect women's subjective and physiological experience of pleasure by diverting attention away from bodily sensations and feelings to cognitions (e.g. Adams, Haynes & Brayer, 1985; Dove & Wiederman, 2000). Graham and colleagues (2004) assessed factors that were important to women's sexual arousal through a series of focus groups with a diverse group of women and found that this sentiment was well captured in the women's own words. One women stated, "... My hair is just right and everything is working and it's much easier for me to feel aroused when I'm feeling really comfortable with myself..." (p.532). Such statements were common and lend support to the notion that distracting, self-evaluative thoughts have the potential to impact the quality of women's sexual experiences.

With the understanding that women's self-perceptions and evaluations can impact the extent to which they are present or distracted during sexual encounters, it is important to contextualize this by examining the larger sociocultural milieu of appearance ideals for

women. As previously stated, the current ideal female body type presented in the media is narrowly defined and hyper-sexualized to appeal to the preferences of heterosexual men (Bordo, 1993). Considering this standard is largely unattainable for the majority of women, it is not surprising that body image concerns are widespread and plague women of various ages, body shapes, and ethnicities (Swammi et al., 2009). In addition to thinness, recent decades have seen a trend towards emphasizing fitness and the appearance of a lean, toned physique (Grogan, 1999; Thompson, van den Berg, Roehrig, Guarda, & Heinberg, 2004). These pervasive and popular images suggest that women are expected to strike a balance between being thin, toned, but not too muscular, while ideally maintaining soft feminine features such as ample breasts (Hoyt & Kogan, 2001). Obtaining such a figure is nearly impossible for most women without the help of plastic surgery, or at the very least, without spending a substantial amount of time solely dedicated to maintaining their appearance (Hoyt & Kogan).

The recent emphasis on fitness as a component of the Western beauty ideal is noteworthy because it is accompanied by the belief that anyone can achieve the “ideal body” with enough motivation, hard work, and self-discipline. Not only are these physical ideals highly valued in Western society, they emphasize personal responsibility and a strong internal locus of control (Kilbourne, 2000). Health, beauty, and fashion industries rely heavily on advertising depicting thin, beautiful, women to promote their products. This marketing strategy, referred to as *aspirational advertising*, is intended to motivate consumers to purchase products by insinuating that the aesthetic standard presented in the advertisement is attainable by anyone (Gurrieri, Previte, & Brace-Govan, 2013; Kilbourne). However, this tactic ignores the fact that the current beauty ideal is *not* attainable for most women and may

contribute to feelings of inadequacy and failure (Gurrieri, Previte, & Brace-Govan). As a result, messages that emphasize personal determination and responsibility, contribute to weight prejudice and the attribution of negative stereotypes towards individuals who do not conform to the ideal (e.g., “*Overweight people are just lazy*”).

Extensive research has documented the prevalence of anti-fat attitudes and the consequences of such discrimination, particularly for women. In one survey, a nationally representative sample of 2,838 American adults ( $M= 44.8$  years, 50% female) found that women were 16 times more likely than men to report having experienced employment-related weight discrimination (Roehling, Roehling, & Pichler, 2007). Overweight women were 12 times more likely than normal weight women to experience this discrimination, while obese women were 37 times more likely, and severely obese women 100 times more likely. Taken together, these findings illustrate how deeply the thin ideal and relatedly, anti-fat prejudices, have permeated our society.

A considerable body of research has examined the impact of cultural standards of appearance ideals on women’s relationships with their bodies and the potential detrimental impact it can have on women’s sexual experiences (e.g. Grabe, Ward, & Hyde, 2008; Levine & Murnen, 2009). Woertman and Van den Brink (2012) conducted a review of 57 empirical studies on body image and female sexual functioning and behaviour among healthy women. The authors concluded that body image issues could impact all aspects of female sexuality and that, “cognitions and self-consciousness seem to be key factors in understanding the complex relationships” (p.184).

Objectification theory (Fredrickson & Roberts, 1997) has provided an organizing framework for understanding how messages about unrealistic appearance ideals may promote

body dissatisfaction, excessive appearance monitoring, and ultimately negatively impact women's sexual relationships. Finally, research exploring the increasing prevalence of anti-fat attitudes and the associated consequences of weight discrimination has highlighted an opportunity to evaluate whether this construct is relevant for women who are not overweight or obese, but nonetheless experience body image concerns.

In sum, women are confronted with increasingly unrealistic appearance ideals that are compounded by media messages and advertisements that emphasize personal responsibility in achieving and maintaining this ideal. Although previous research has established links among the internalization of appearance ideals and body image concerns on women's sexual experiences (e.g., Woertman & Van den Brink, 2012), little is known about the relative contribution of these constructs in relation to women's experiences of feeling distracted during sex and sexual desire. Furthermore, internalization of an anti-fat attitude has not yet been investigated as a facet of appearance ideal internalization in the context of an objectification theory framework. Research is needed to help delineate which aspects of appearance ideal internalization and body image concerns contribute to women's experiences of distraction during sex and sexual desire.

### **Purpose of the Study**

The first objective was to replicate previous research that identified associations among internalization of appearance ideals, body image concerns, distracting thoughts during sexual activity, and sexual desire. I extended on the existing literature by assessing multiple facets of body image concerns and by including the construct of weight bias stigma as a component of appearance ideal internalization. The second objective of this research was to examine the relative contribution of appearance ideal internalization versus body image

concerns in predicting distracting thoughts about appearance during sex. The third objective was to examine the relative contribution of appearance ideal internalization versus body image concerns in predicting distracting thoughts about performance during sex. Finally, the fourth objective was to explore whether appearance ideal internalization, body image concerns, or distracting thoughts during sex directly predicted low sexual desire.

Healthy sexual and romantic relationships are important components that contribute to the wellbeing of adult women's lives. The findings of this research could help to further elucidate what factors are most relevant in predicting the experience of being distracted by self-evaluation during sex. Furthermore, this research may also help to better focus counselling interventions by targeting and challenging objectification scripts and schemas that may be underlying sexual and relationship problems for women and couples.

## Chapter 2: Literature Review

### **Overview**

The following literature review is structured into three broad categories. First, objectification theory, which is the theoretical basis for this research, is discussed. In the next section, existing literature on body image and women's sexual experiences is reviewed, with a particular focus on studies that have examined the impact of distracting cognitions during sexual activity. Finally, in the third section, an overview of research on the internalization of Western appearance ideals and of weight bias stigma will be reviewed together, in an effort to draw new parallels that also inform the direction of the current study.

### **Objectification Theory**

Objectification theory (Fredrickson & Roberts, 1997) provides a conceptualization for understanding the experiences of women living in a culture that sexually objectifies the female body. Rooted in feminist theory, the objectification framework suggests that in a culture that is heavily saturated with sexuality, women's bodies are constantly looked at and evaluated (Bartky, 1990). The most subtle but pervasive way that women are sexually evaluated is through the "male gaze," or the visual inspection of the female body (Kaschak, 1992). Sexualized evaluation or gazing becomes objectification when a woman's body, or parts of her body, are separated from her as a human being and reduced for the consumption and gratification of others, as is often seen in advertising (Bartky).

The authors of the theory posit that the constant sexual objectification of women has created a culture that socializes girls and women to internalize an outsider perspective of their bodies, causing them to also view themselves as objects predominantly valued for their aesthetic appeal to others (Fredrickson & Roberts, 1997). Theorists suggest that adopting an

observer's perspective of oneself (self-objectification) leads to perpetual observation and evaluation of how one's body looks rather than how it feels to inhabit that body. Body surveillance, a construct that is closely related to self-objectification, specifically refers to the constant self-monitoring and preoccupation of how one's body appears to others (McKinley & Hyde, 1996). The intention underlying body surveillance is to ensure compliance and conformity with expected appearance norms, in an effort to avoid judgment and criticism (McKinley & Hyde). Self-objectification also entails constantly comparing oneself to the highly unachievable ideal, whereby perceived discrepancy with the ideal can induce body shame or body dissatisfaction. In turn, body dissatisfaction may motivate some women to try and attain the unrealistic appearance ideal through extreme behaviours such as dietary restriction, excessive exercise, or elective cosmetic surgery (Fredrickson & Roberts). Finally, these behaviours may put some women at risk for developing more significant issues like eating disorders, depression, and addictions (Fredrickson & Roberts; McKinley & Hyde).

According to Fredrickson and Roberts (1997), when cognitive energy is concentrated on evaluating and critiquing one's body and how others perceive it, less cognitive energy is available to notice internal bodily sensations. Attention and awareness of internal bodily states are critical to perceiving sexual arousal and pleasure (Elliot & O'Donohue, 1997; Masters & Johnson, 1970). Based on objectification theory, when a woman takes on an observer's perspective during a sexual encounter, her self-evaluative thoughts have the capacity to interfere with her experience of sexual pleasure. The causal model proposed by objectification theory informs the present study objectives by adopting the premise that the broader sociocultural landscape plays a key role in shaping the way women view and interact with their bodies, which ultimately can impact their sexual experiences and behaviours.

## **The Impact of Body Image on Women's Sexual Experiences**

Western culture and media are inundated with messages that a woman's sexual desirability is heavily based on her physical appeal to her heterosexual/male partner (Wiederman, 2002). There is evidence to support the notion that young women who do not conform to the thin ideal are more likely to be excluded from experiencing intimate relationships. Using data from the National Longitudinal Study of Adolescent Health, Halpern, King, Oslak, and Udry (2005) followed 5,487 Caucasian, African American, and Hispanic adolescent girls ( $M = 15.7$  years,  $SD = 0.12$ ) over the course of a year to explore the relationship between body mass index (BMI) and romantic relationship involvement. The authors found that for every one-point increase in BMI, the probability of the girls being in a romantic relationship decreased by 6%, with no differences between ethnic groups. These findings support the idea put forth by objectification theory that socialization to appearance ideals that are geared toward the preferences of heterosexual males begin at a young age.

It is also important to note that while some research has observed varying body image ideals as a function of ethnicity (e.g. Fitzgibbon, Blackman, & Avelonne, 2000), these findings appear to be changing. The most frequent finding has been that heterosexual African American and Hispanic women have a preference for larger female body frames than do their Caucasian counterparts. However, more recent research has suggested that rates of body image concerns among African American and Hispanic women have reached parity with Caucasian women (e.g., Halpern et al., 2005; Shaw, Ramirez, Trost, Randall, Stice, 2004). Furthermore, geography and socioeconomic status may be better predictors of endorsing the Western thin ideal than ethnicity, where middle to upper middle class urban dwelling adolescents and women report a preference for thinner body types, regardless of ethnicity



(Halpern et al.).

Women's body types, and weight status in particular, have been shown linked to the likelihood that they will experience romantic relationships. A cross-sectional study of 554 undergraduate students (women,  $n = 362$ ) between the ages of 18 – 21 ( $M = 19.1$  years) found that overweight women were less likely to be dating than their normal weight peers (Sheets & Ajmere, 2005). In addition, of the students who were in an exclusive romantic relationship (49.1% of the sample), approximately 30% had been told to change their weight status by their partners. Women were most often told to lose weight while men were most often told to gain weight. Unsurprisingly, participants who were told to change their weight reported lower relationship satisfaction than did controls.

Given that the current study and bulk of the existing literature has focused on the experiences of heterosexual women, it is important to note the experiences of lesbian women. Previous research has supported the notion that lesbian and bisexual women are less dissatisfied with their bodies than heterosexual women (see meta-analysis by Morrison, Morrison, & Sager, 2004). Some theorists have proposed that lesbian women are at lower risk for developing body image concerns because they do not place the same value on thinness in comparison to heterosexual women (e.g. Brown, 1987). In this way, the lesbian community has been viewed as acting as a 'buffer' from mainstream culture's representation of the female appearance ideal that is geared toward the preferences of heterosexual men. However, recent research has suggested that this buffering effect may be shifting. A large internet survey of 1,619 heterosexual women and 130 lesbian women by Peplau and colleagues (2009) found no significant differences between heterosexual and lesbian women with regard to how much they perceived their body concerns as negatively impacting their

sexual experiences. The authors hypothesized that the increasing representation of lesbian women and lesbian relationships in popular media has begun depict the same unrealistic beauty ideals of thinness, fitness, and anti-fat attitudes (Peplau et al).

Together, these findings suggest that the messages adolescent and young women receive from the media regarding the ideal body size are being validated by their early romantic experiences. Recent findings suggest that lesbian women may be similarly impacted as media portrayals of lesbian women and relationships suggest a trend toward the narrowing of preferences among this group. Given that many young women are strongly motivated to be perceived as attractive romantic candidates, the pressure to attain the ideal body size may leave some women vulnerable to developing disordered eating, shape and weight concerns, and sexual problems (Hoyt & Kogan, 2001; Sheets & Amjere, 2005).

In an effort to evaluate whether self-objectification would predict some of these hypothesized negative outcomes, Tiggemann and Williams (2011) set out to comprehensively evaluate the model proposed by objectification theory using structural equation modeling. The authors hypothesized that self-objectification would be associated with appearance anxiety and body shame. They anticipated that appearance anxiety and body shame would be associated with less awareness of internal bodily sensations. Impaired awareness of bodily sensations would then predict decreased sexual functioning, depressed mood, and disordered eating. In a sample of 116 female Australian undergraduate students aged 18 – 30 ( $M = 20.4$ ,  $SD = 2.87$ ), the authors found that self-objectification accounted for 15% of the variance in predicting sexual functioning, but more strongly predicted disordered eating (explaining 93% of the variance) and depressed mood (60% of the variance).

Although the researchers assessed body surveillance as their measure of self-

objectification and not distraction during sex, the constructs are related. As defined in the literature, body surveillance refers to self-monitoring across a variety of contexts (McKinley & Hyde, 1996). In comparison, distracting thoughts during sexual activity can be understood as the behavioural manifestation, or symptom, of body surveillance in a sexual context. Thus, I argue that distracting thoughts about one's appearance and performance during sexual activity with a partner can be viewed as a consequence of the socially learned objectification of women's bodies. Since distraction during sex is the main dependent variable of this research, what follows is a review of the studies that focused on understanding the predictors and factors associated with cognitive distraction in a sexual context.

Purdon and Holdaway (2006) examined the possible range of content of distracting, non-erotic thoughts that people experience during sexual activity with a partner. In a quantitative study of 50 female and 47 male college students ( $M = 20$  years,  $SD = 1.5$ ) participants were asked to reflect on a recent sexual experience and record verbatim any thoughts they had during the encounter that detracted from their enjoyment of the experience. The researchers then coded and categorized the responses. No gender differences were observed in the amount of thoughts reported (range 1 – 12,  $M = 3.85$ ). However, there were differences with regard to the content of the thoughts. Female participants reported more thoughts concerning body image, while male participants reported more thoughts concerning their performance. Women also reported that their thoughts caused them more anxiety compared to the men in the study. These findings are in alignment with the heteronormative, gender role-based stereotypes that are perpetuated in the media and lend further support to objectification theory's premise that culture and media messages permeate into individual's schemas. Asking participants to offer the content of their own distracting thoughts during a

real sexual experience, as opposed to endorsing statements constructed by the researchers, supports the assertion made by objectification theorists that body surveillance concerns are especially salient for women (Fredrickson & Roberts, 1997).

In a similar study, Meana and Nunnink (2006) conducted research with 220 college men and 237 women to determine correlates of appearance and performance-based cognitive distractions during sex. The majority of participants were between the ages of 18-20 and 55% reported that they were currently in a romantic relationship. The researchers found that women reported more appearance-based distractions than did the men in the study, however, in contrast to Purdon and Holdaway's (2006) findings, there were no gender differences with regard to performance-based distractions. For women, both types of distractions were predicted by negative body image and psychological distress. Performance-based distractions for women were additionally predicted by sexual dissatisfaction.

The findings of these two studies suggest that distracting thoughts during sex may be especially distressing for women and have the potential to significantly detract from their enjoyment of sex. Both studies found a link between body image and distracting thoughts but did not examine the possible contribution of internalization of appearance ideals presented in the media as an additional possible predictor of distracting thoughts.

In contrast to these findings, other researchers have not replicated these associations. In a cross-sectional study of 237 Portuguese women aged 18-73 ( $M = 35.3$  years,  $SD = 11.8$ ), researchers investigated the relative contribution of various kinds of negative automatic thoughts in predicting sexual desire. The researchers found that conservative beliefs about sex and a lack of erotic thoughts during sex (as opposed to non-erotic distracting thoughts) predicted low desire. Although body image was considered, it did not emerge as a unique

predictor of sexual desire (Carvalho & Nobre, 2010). These findings suggest that cultural factors and religiosity may be important mediating/moderating factors in women's sexual desire.

Moreover, researchers in Australia conducted a cross-sectional survey of 226 women and 211 men aged 18 – 86 ( $M = 42.26$  years,  $SD = 17.11$ ) to examine relationships between body image and social, psychological and sexual functioning (Davison & McCabe, 2005). The authors stratified the sample by gender and across three age categories: young adulthood, middle adulthood, and late adulthood. Across all age groups, women reported higher levels of body image dissatisfaction than did men. Although bivariate correlations suggested individuals who reported more body image dissatisfaction were more likely to report symptoms of depression, anxiety, and worse sexual functioning, hierarchical regression analyses revealed that after controlling for self-esteem as a covariate, body image did not contribute any unique variance in predicting sexual functioning. However, when self-esteem was entered into the regression analyses as the dependent variable, body image predicted self-esteem across all age groups. The authors' postulated that since existing research on body image typically only includes one measure that assesses global body image and has rarely included self-esteem, it is possible that negative body image could be better understood as a component of a negative self-concept rather than as an antecedent or consequence of it, as it is commonly viewed. Alternatively, it is also plausible that self-esteem mediated the relationship between body image and sexual functioning. Finally, the authors noted that future research that investigates the impact of body image on sexual functioning should consider assessing multiple aspects of body image.

Five years later, Pujols, Meston, and Seal (2010) responded to Davison and

McCabe's recommendations in their research. The authors conducted an Internet survey of 154 women between the ages of 18 and 49 ( $M = 26.03$ ,  $SD = 6.6$ ) and set out to test the hypothesis that positive body image would predict sexual satisfaction. They improved upon existing literature by examining three facets of body image: sexual attractiveness, weight concern, and physical condition. The data supported their hypothesis; higher sexual satisfaction was predicted by high body esteem related to sexual attractiveness and low frequency of appearance-based distracting thoughts, even after controlling for sexual functioning status. The final model accounted for 42.6% of the variance in sexual satisfaction.

In summary, young women's experiences with romantic relationships appear to validate the cultural messages that thinner women are more desirable to men (Halpern, et al., 2005; Sheets & Ajmere, 2005). Given these experiences, it is not surprising that several studies have found that body image dissatisfaction predicted distracting thoughts about appearance and performance during sex, and that these thoughts were experienced as more distressing to women than men (Meana & Nunnink, 2006; Purdon & Holdaway, 2006).

Furthermore, research that investigated body image concerns as a direct predictor of sexual desire and satisfaction have offered mixed findings (Carvalho & Nobre, 2010 no support; Davison & McCabe, 2005 mixed; Pujols, Meston, & Seal 2010 supported). One of the issues identified in the literature concerns the measurement of body image. Most often researchers have utilized tools that assess body image in a broadly defined, non-specific context and have had mixed results with regards to predicting sexual outcomes (e.g. Davison & McCabe). In contrast, recent studies have shown that when more specific facets of body image are assessed, body image does play a role in sexual outcomes (e.g. Pujols et al.). The

current study addressed this limitation by considering the predictive utility of four components of body image (body shape concern, sexual attractiveness, weight concern, and physical condition) in explaining distracting thoughts during sex, as well as examining whether they predict low sexual desire.

### **Pro-Thin and Anti-Fat: Internalization of Appearance Ideals**

Research conducted in Western cultures has repeatedly demonstrated that women regard their appearance as significantly more important to their self-concept than do men (e.g., Muth & Cash, 1997). As previously stated, girls and women are bombarded with messages from the media regarding the value of thinness – messages that equate thinness with beauty. Given that the standards of attractiveness are considerably broader for men, it follows that women are more likely to be negatively impacted by media depictions of perfect bodies than are men (Davison & McCabe, 2005).

Over the past several decades, the average size of female fashion models, actresses, and women depicted in advertisements has been steadily decreasing (Halliwell & Dittmar, 2004; Seifert, 2005). A recent meta-analysis of 77 correlational and experimental studies exploring the relationship between media exposure, thin ideal internalization, and body image and eating disturbances, concluded that media exposure was robustly related to increased investment in appearance, body dissatisfaction, and increased endorsement of unhealthy weight control behaviours in women (Grabe, Ward, & Hyde, 2008). The authors noted that the inclusion of studies with multiple methodologies lends increased support to the validity of the findings.

Despite the value of this research, extant literature is predominantly cross-sectional and longitudinal studies in this field remain scant. To date, only one longitudinal study has

examined the effects of media exposure on adult women. In a study of 226 undergraduate students (66% women,  $M = 19.6$  years,  $SD = 0.76$ ), Aubrey (2007) found that increased exposure to sexually objectifying media at baseline predicted self-objectification two years later and was especially pronounced for women with low self-esteem. Among children, a prospective study of 257 Caucasian and African American girls (ages 7 – 12,  $M = 8.72$ ,  $SD = 0.99$ ) found that greater television exposure at the initial assessment predicted more disordered eating patterns and a preference for thinner *adult* body types one year later (Harrison & Hefner, 2006). These findings highlight how exposure to media depicting unrealistic appearance standards can shape girls' and women's cognitions, preferences, and behaviours toward acceptance and internalization of this ideal.

Given that the average body size of women and men in North America continues to climb, the increasingly slender appearance ideal is particularly concerning. Recent epidemiological research estimates that 25% of adult Canadians (Gotay et al., 2013) and 35% of adult Americans (Ogden, Carroll, Kit, & Flegal, 2014) meet the BMI criteria for being categorized as obese. The incongruity between these media-promoted ideals equating beauty and thinness with success and happiness, and the reality of many women's weight and size, inevitably engenders appearance dissatisfaction (Grabe, Ward, & Hyde, 2008; Hoyt & Kogan, 2001). The multibillion-dollar dieting and weight loss industries have a vested interest in highlighting the appearance discrepancy in an attempt to motivate women to buy and consume their products (Gurrieri, Previte, & Brace-Govan, 2013; Thompson, Heinberg, Altabe, & Tantleff-Dunn, 1999). Essentially, this marketing strategy actively facilitates self-objectification by promoting and amplifying self-evaluation; leading many women to conclude they are not good enough and can stand to improve themselves (Gurrieri, Previte, &



Brace-Govan).

The pressure to be thin is compounded by the extensive criticism and judgment of overweight individuals in Western society (Puhl, & Brownell, 2002). In North American culture, being overweight signifies ugliness, illness, laziness, and personal inadequacy. Puhl and Brownell have described these attributions as, “one of the last socially acceptable forms of discrimination” (p. 108). To determine the veracity and pervasiveness of these discriminatory perceptions, Andreyeva, Puhl, and Brownell (2008) analyzed data from two waves of the National Survey of Midlife Development in the United States. The authors investigated changes in prevalence of weight discrimination attitudes among adults (35 - 74 years) over a ten-year span (wave 1:  $N = 1,826$ ; wave 2:  $N = 1,136$ )<sup>1</sup>. They discovered that weight bias discrimination increased by 7% between the years 1994-1996 and by 12% between 2004-2006. Notably, the increase could not be attributed to changes in obesity rates, which did not significantly differ between the two time points.

Research has shown that overweight individuals are just as likely as normal weight individuals to hold discriminatory beliefs about being overweight (Wang, Brownell, & Wadden, 2004). A cross-sectional study examining internalized weight stigma among 68 overweight individuals enrolled in a weight loss research program (88% women,  $M = 43.1$  years,  $SD = 9.4$ ), found that participants endorsed negative stereotypes about overweight individuals to about the same extent as average weight individuals in other studies (Wang, Brownell, & Wadden). The authors posited that this finding suggests tacit and pervasive acceptance of weight discrimination, even among those who are most likely to experience

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<sup>1</sup> Different participants were randomly sampled at the two time-points. The aim of the study was to obtain a snapshot of trends regarding weight discrimination attitudes across the US rather than to compare changes in the same individuals over time (Andreyeva, Puhl, & Brownell).

such discrimination. Taken one step further, it could be argued that those who have anti-fat attitudes also indirectly condone thin idolization. In support of this notion, a survey of 308 undergraduate psychology students (62% women,  $M = 20.06$  years,  $SD = 2.58$ ) found that individuals who more strongly endorsed anti-fat attitudes also held stronger pro-thin attitudes (Carels & Musher-Eizenma, 2009).

At the more extreme end of the spectrum, it could be argued that the criterion of “intense fear of gaining weight or becoming fat, even though underweight” (American Psychiatric Association, 2013, p. 542), for the diagnosis of anorexia nervosa, is one manifestation of internalizing an extreme anti-fat attitude. In addition, it is commonly acknowledged in the field of eating disorders that cognitions regarding drive for thinness and fear of weight gain are the most persistent features of the disorder (e.g., Bachner-Melman, Zohar & Ebstein, 2006). In fact, recovery from anorexia nervosa is almost always defined as the cessation of behavioural symptoms and weight restoration with no mention of cognitive symptom remission (Bachner-Melman, Zohar & Ebstein). This is significant because it contributes to the assumption that body dissatisfaction has become “normative,” which in turn reinforces the pervasiveness of the thin ideal.

Significant body image distortions are not exclusive to women suffering from eating disorders. Research demonstrates that healthy women with normal body weights ( $BMI < 25$ ) commonly misidentify themselves as being overweight and express being dissatisfied with their bodies (Chang & Christakis, 2003; Neighbors & Sobal, 2007). Self-perception of weight status was assessed in the Third National Health and Nutrition Survey conducted in the United States (Chang & Christakis). Adult women ( $n = 8,165$ ) and men ( $n = 7,428$ ) were asked whether they perceived themselves to be underweight, overweight, or about the right

weight. Actual weight status was obtained via in-person interviews and direct physical examinations. Results revealed that 38% of normal weight women misidentified themselves as overweight, while 32% of overweight men misidentified themselves as about the right weight or underweight (Chang & Christakis). Despite the fact that this research is now more than twenty years old, these findings underscore just how normative expectations of female thinness are in Western culture.

More recently, a large online survey of 4,283 individuals between the ages of 13 – 79 ( $M = 34.6$  years, 83% female) examined weight bias attitudes and participants' willingness to experience aversive life events in exchange for avoiding becoming obese (Schwartz, Vartanian, Nosek, & Brownell, 2006). Remarkably, 46% of the sample reported that they would give up one year of their life in order to not become obese, and 15% reported a willingness to give up ten years of their life to avoid this fate. Also, 30% reported they would rather get divorced than be obese, and 25% said they would give up being able to have children to avoid being obese. Perhaps not surprisingly, there was a significant effect of body size, with thinner individuals in the study being more likely to endorse these tradeoffs than heavier individuals. These findings serve to provide a vivid illustration of the pervasiveness of fat-phobic attitudes in Western culture.

Considering the literature on thin ideals and anti-fat attitudes together provides a unique perspective on how media and cultural messages infiltrate women's beliefs and perceptions. To date, researchers have only considered the impact of internalizing weight bias beliefs for individuals who are overweight or obese. However, the research reviewed in this section reveals that current standards of beauty are not representative of healthy or normal weight women (Halliwell & Dittmar, 2004). It is common for women across the

weight spectrum to report being dissatisfied with their bodies, and for normal weight women to express a desire to lose weight (Grabe, Ward, & Hyde, 2008). The finding that 38% of normal weight women in the Third National Health and Nutrition Survey misclassified themselves as overweight, likely speaks more to the internalization of pro-thin and anti-fat attitudes than it does to women's ability to actually estimate their weight (Chang & Christakis, 2003). Given the pervasiveness of body dissatisfaction, it seems likely that self-directed weight bias may be a relevant construct for women across the weight spectrum.

### **Summary**

Previous research has identified that body image issues can affect nearly every aspect of female sexual functioning in a multitude of complex ways (for a review, see Woertman & Van der Brink, 2012). Similarly, cultural and media messages have long been implicated as a root cause of the body dissatisfaction epidemic among women in Western societies (e.g. Bordo, 1993; Aubrey 2007). Objectification theory (Fredrickson & Roberts, 1997) provided the theoretical underpinning for understanding how these phenomena intersect. The majority of existing literature has focused on either the connection between appearance ideal internalization and body image concerns or body image concerns and sexual functioning. In addition, studies that have examined the aforementioned constructs together have demonstrated mixed findings, and researchers have postulated that measurement limitations may be partially responsible for this lack of clarity (e.g., Davison & McCabe, 2005). Finally, the culture of weight bias stigmatization in Western societies was conceptualized by Durso and Latner (2008) as the inverse of thin idolization and hypothesized to be a relevant construct that may add to our understanding of how appearance ideals are internalized.

The contribution of the current study was to compare the influence of appearance ideal internalization and body image concerns in predicting the experience of being distracted by self-evaluative thoughts during sexual activity and sexual desire. Unlike existing research, the current study evaluated the direct independent effects and potential additive predicting effects of two appearance ideal internalization variables and four body image concern variables on two different types of distracting thoughts during sex and one measure of sexual desire. This study also improved upon previous research by investigating multiple facets of the body image concerns and by considering the previously unexamined construct of weight bias stigma.

### **Study Hypotheses**

There were twelve specific hypotheses of the current research that aimed to address four main objectives, specifically:

#### **Objective 1**

The first objective of the current study was to examine relations among appearance ideal internalization, body image, distracting thoughts during sexual activity, and sexual desire. This study hypothesized that:

**Hypothesis 1.** Women who reported higher rates of appearance ideal internalization would have more body image concerns.

**Hypothesis 2.** Women with higher rates of appearance ideal internalization would have more distracting thoughts about their appearance and performance during sexual activity.

**Hypothesis 3.** Women with more body image concerns would have more distracting thoughts about their appearance and their performance during sexual activity.

**Hypothesis 4.** Women who perceived themselves as less sexually attractive would report lower sexual desire.

**Hypothesis 5.** Women with more distracting thoughts about their appearance and performance during sex would report lower sexual desire.

## **Objective 2**

The second objective of the current study was to examine whether appearance ideal internalization and body image concerns predicted distracting thoughts about appearance during sexual activity. This study hypothesized that:

**Hypothesis 6.** Appearance ideal internalization would predict distracting thoughts about appearance during sexual activity.

**Hypothesis 7.** Body image concerns would predict distracting thoughts about appearance during sexual activity.

**Hypothesis 8.** Body image concerns would predict distracting thoughts about appearance during sexual activity, above and beyond the unique contribution of appearance ideal internalization.

## **Objective 3**

The third objective of the current study was to examine whether appearance ideal internalization and body image concerns predicted distracting thoughts about performance during sexual activity. This study hypothesized that:

**Hypothesis 9.** Appearance ideal internalization would predict distracting thoughts about performance during sexual activity.

**Hypothesis 10.** Body image concerns would predict distracting thoughts about performance during sexual activity.

**Hypothesis 11.** Body image concerns would predict distracting thoughts about performance during sexual activity, above and beyond the unique contribution of appearance ideal internalization.

**Objective 4**

The fourth objective of the current study was to examine whether appearance ideal internalization, body image concerns, and distracting thoughts about appearance and performance during sexual activity predicted low sexual desire.

**Hypothesis 12.** Appearance ideal internalization, body image concerns, and distracting thoughts about appearance and performance during sexual activity would predict low sexual desire.

## Chapter 3: Methodology

### Context and Setting

Data for the current study were collected within the context of a larger research project conducted at the St. Paul's Hospital (SPH) Eating Disorders Program (EDP) in Vancouver, British Columbia, under the supervision of the principal investigator, Dr. Josie Geller PhD R. Psych, Associate Professor of Psychiatry in the Faculty of Medicine at UBC and the Director of Research at the SPH EDP. I have been working at Dr. Geller's lab as a research assistant since 2009. The purpose of the original study was to examine the impact of self-compassion on disordered eating, and shape and weight concerns, in a community sample of 134 adult women with a mean age of 28.76 years ( $SD = 8.45$ ). As the study coordinator of the original research project, I and another research assistant were granted permission by Dr. Geller to include additional study measures that were of unique interest to us, with the intention of utilizing the same data to conduct other research projects at a later date. With Dr. Geller's approval, I independently identified variables and relationships that were not the specific focus of Dr. Geller's original study. In particular, I was interested in how sociocultural messages about female appearance ideals and women's views of their bodies are related to aspects of sexual functioning. The variables of interest that I identified were: internalization of the thin ideal, weight bias stigma internalization, body esteem, body shape concern, cognitive distraction during sex, and sexual desire. The six measures that assessed these constructs are described in detail in the following section. As the author of this thesis project, I was solely responsible for the selection of the variables and development of the hypotheses. In contrast, Dr. Geller's research focused on whether a self-compassionate attitude moderated the relationship between psychological distress and disordered eating and



body image concerns. Appendix A provides a complete list of the study measures that were utilized in Dr. Geller's original research and the six measures that were used in this thesis. The entire research proposal (within which all of the variables for Dr. Geller's original research project and this thesis project are contained) was funded by UBC's Humanities and Social Sciences Hampton Grant (grant number 20R65690) for which Dr. Josie Geller was the principal investigator. Ethical approval for this thesis project was obtained from the UBC-Providence Health Care Research Ethics Board and covered by UBC-PHC REB Number H11-02432.

### **Procedure and Recruitment of Participants**

A convenience sample of 134 adult women participated in a secure and anonymous online survey (hosted by [www.psychdata.com](http://www.psychdata.com)) that contained the study measures of Dr. Geller's original research, and the study measures for this current thesis research. Participants were invited to participate through online advertisements posted on a popular social networking website (Facebook), as well as from a popular classified advertisement website (Craigslist) under the "community volunteer" section. The study advertisement is provided in appendix C. The survey url provided in the study advertisement linked participants to an informed consent page (see appendix C). If participants agreed to participate, the study questions began on the following page. If participants selected "I do not want to participate," they were not taken into the survey. Recruitment commenced in January 2012 and online advertisements were refreshed every 3 – 4 weeks for approximately 8 months.

### **Measures**

Specific to the hypotheses tested in my study, participants completed measures of demographics, appearance ideal internalization, body image concerns, distraction during

sexual activity, and sexual desire. Copies of the measures can be found in appendix D. The measures assessing each of these domains included:

### **Demographics Questionnaire**

A general demographic questionnaire was created to describe the sample. The information obtained included: age, ethnicity, sex, gender, sexual orientation, height, weight, education, occupation, and personal and household income. In addition, participants were asked to indicate their current relationship status, sexual activity status, and number of previous romantic and sexual partners.

### **Appearance Ideal Internalization**

The Weight Bias Internalization Scale (WBIS) is an 11-item measure that assesses the degree to which respondents internalize negative stereotypes about weight (Durso & Latner, 2008). The measure was originally created to assess weight stigma in overweight individuals. The items address self-directed stigmatization of weight status, desire for change, effect of perceived weight status on mood, perceived personal value, public appearance and social interaction, and recognition of the existence and unfairness of weight stigma. Participants respond to items on a 7-point Likert scale ranging from, 1 (*strongly disagree*) to 7 (*strongly agree*). In an effort to make the scale accessible for all weight categories, Pearl and Puhl (2014) modified the measure by replacing the word “overweight” with “my weight” for 6 of the 11 items. For example, the item “I don’t feel that I deserve to have a really fulfilling social life, as long as I’m overweight” was revised to, “I don’t feel that I deserve to have a really fulfilling social life, as long as I’m at my weight.” The remaining 5 items did not need to be altered (e.g., “My weight is a major way that I judge my value as a person”). The WBIS-Modified (WBIS-M) was validated on a weight-diverse population ranging from

underweight to obese individuals. The WBIS demonstrated excellent psychometric properties ( $M=3.95$ ,  $SD = 1.28$ , Cronbach's alpha = 0.90) (Durso & Latner), while the WBIS-M either matched or exceeded the strength of the original WBIS ( $M = 3.27$ ,  $SD = 1.50$ , Cronbach's alpha = 0.94 (Pearl & Puhl).

The Internalization-General (IG) subscale of the Sociocultural Attitudes Towards Appearance Questionnaire-3 (SATAQ: Thompson et al., 2004) assessed the extent to which individuals have internalized messages about thinness and beauty ideals from the media (e.g., "I compare my appearance to the appearance of TV and movie stars"). The SATAQ-IG is comprised of 9 items and participants respond using a 5-point Likert scale, ranging from 1 (*completely disagree*) to 5 (*completely agree*). Higher scores on the SATAQ-IG subscale indicate more internalization of thinness and beauty norms. Cronbach's alpha for the IG subscale is .91 and .94 for the entire measure (Thompson et al.). The SATAQ has demonstrated excellent convergent and discriminant validity with other measures of media consumption and internalization.

### **Body Image Concerns**

The Body Shape Questionnaire (BSQ: Cooper, Taylor, Cooper, & Fairburn, 1987) was used to assess the frequency of experiencing body shape preoccupations over the previous four weeks. Participants respond to items on a 6-point Likert scale (*never, rarely, sometimes, often, very often, always*). The following is an example of one of the items: "Have you felt so bad about your shape that you have cried?" Higher total scores indicate a higher frequency of body shape concerns. The original BSQ contains 34-items and a shortened, validated, 8-item version was used for this research (Evans & Dolan, 1993). This shortened version has demonstrated good psychometric properties (Cronbach's alpha ranged

from 0.87-0.92) and was validated using a non-clinical sample of women (Evans & Dolan).

The Body Esteem Scale (BES: Franzoi & Shields, 1984) was used to assess participants' attitudes towards their body parts (e.g., "buttocks") and functions (e.g. "body scent"). The BES is comprised of 35-items that are answered using a 5-point Likert scale ranging from 1 (*I have strong negative feelings*) to 5 (*I have strong positive feelings*). The BES yields three subscale scores: Sexual Attractiveness (BES-SA), Weight Concern (BES-WC), and Physical Condition (BES-PC). The BES-SA subscale is comprised of items associated with physical attractiveness that cannot be altered by exercise (e.g. face, breasts, or sex organs). The BES-WC subscale contains items that can be altered by exercise (e.g. thighs, buttocks and weight). The BES-PC subscale refers to items relating to physical qualities that are typically not under public scrutiny for women (e.g. stamina, strength and agility). All items on the BES were reverse-scored so that higher scores indicated greater body dissatisfaction. The BES has demonstrated internal consistency (Cronbach's alpha > 0.78) and test-retest reliability over a 3-month period ( $r > 0.75$ ).

### **Distraction During Sexual Activity**

The Cognitive Distraction During Sexual Activity Scale (CDDSA: Dove & Wiederman, 2000) is a 20-item self-report questionnaire that was used to assess thoughts and worries during sexual activity and the extent to which they are distracting. Participants rated the frequency with which they have experienced each thought on a 6-point Likert scale, ranging from 1 (*always*) to 6 (*never*). All items on the CDDSA were reverse-scored such that higher scores indicate a higher frequency of distracting thoughts during sexual activity. Items are divided into two subdomains: Appearance Distractions (AD) and Performance Distractions (PD). The AD subscale refers to thoughts and worries concerning an

individual's physical attractiveness (e.g., "It is difficult to enjoy sex because of my concerns over how appealing my body is to my partner"). The PD subscale is comprised of items pertaining to an individual's anxiety over his/her sexual performance (e.g., "While engaged in sexual activity, I worry that my partner is *not* enjoying the way I am touching their body"). The authors demonstrated an internal consistency of 0.95 for both subscales (Dove & Wiederman).

### **Sexual Desire**

The Female Sexual Function Index (FSFI: Rosen et al., 2000) is a self-report scale designed to measure several key dimensions of sexual functioning in women over the previous 4 weeks. A total score and scores on six subdomains of female sexuality were obtained: Sexual Desire, Arousal (both subjective and physiologic), Lubrication, Orgasm, Satisfaction and Pain. Participants rate items on 5-point scales that were reverse scored so that higher scores indicated higher levels of sexual dysfunction. For the purpose of this research, the Desire, Arousal, and Satisfaction subscales were used. The Desire subscale (FSFI-D) assessed frequency and level of perceived sexual desire or interest (e.g., "Over the past 4 weeks, how often did you feel sexual desire or interest?"). The Arousal subscale assessed frequency, degree, confidence, and satisfaction with arousal during sexual activity or intercourse (e.g., "Over the past 4 weeks, how would you rate your level of sexual arousal ["turn on"] during sexual activity or intercourse?"). Finally, the Satisfaction subscale assessed emotional closeness, overall satisfaction with one's sexual relationship, and overall satisfaction with one's sex life (e.g., "Over the past 4 weeks, how satisfied have you been with the amount of emotional closeness during sexual activity between you and your partner?"). The FSFI has been validated for women with and without sexual dysfunction. It

demonstrates good discriminate and convergent validity, internal consistency (Cronbach's alpha = 0.97 in a community sample), and test-retest reliabilities over 2-4 weeks (0.79 – 0.86) (Rosen et al.).

## **Planned Statistical Analyses**

### **Preliminary Analyses and Descriptive Statistics**

All analyses were performed using the Statistical Package for the Social Sciences (SPSS) computer software, version 22. The data set was screened to detect any data entry errors or missing values, as well as to detect potential outliers. For each questionnaire, participants with 20% or more missing data were eliminated from the analyses. For participants with less than 20% missing data on a given questionnaire, the mean score of the sample for that particular item was used to replace the missing value (Graham, 2009). To ensure that there were no violations of statistical assumptions (e.g. assumption of normality), descriptive statistics (mean, mode, skewness, kurtosis, frequencies, range of scores) were computed for all study variables.

It is important to note that, while running descriptive statistics and examining the distributions for all of the study variables, the Arousal and Satisfaction subscales of the Female Sexual Function Index stood out as violating the assumption of normality. Both scales had a high positive skew: Arousal 0.899 and Satisfaction 1.058, and additionally the Arousal scale was highly kurtotic = 1.364. Consequently, they were dropped from the analysis. The Desire subscale of the FSFI, comprised of 2 items, had a normal distribution, and no skewness or kurtosis. Thus, this subscale was retained in the analyses.

Cronbach's alpha coefficients were calculated to assess the internal consistency of the study measures. Descriptive statistics (e.g., means, standard deviations, and ranges) were

computed for all study measures.

### **Correlational Analyses**

In order to test hypotheses 1 through 5 presented in objective 1, bivariate Pearson product moment correlations were computed. Alpha (two tailed) was set at .05 for interpreting significance.

### **Covariate Analyses**

Continuous demographic variables (age and BMI) were included in the correlation analyses in order to examine the magnitude of their relation to the study variables, as they were entered as control variables in subsequent analyses. Education, a categorical variable, was stratified into three groups: high school graduation or less ( $n = 16$ ), post secondary (including some college, college diploma, or undergraduate degree,  $n = 100$ ), and graduate education ( $n = 19$ ). Since education was not a continuous variable, a one-way ANOVA was conducted to compare differences between the three groups.

### **Regression Analyses**

To test hypothesis 6 through 12 presented in objectives 2, 3, and 4, hierarchical multiple regression analyses were conducted. In order to control for the potential confounding effect of demographic variables; BMI, age, and level of education were entered at Step 1 of each regression equation. Alpha (two tailed) was set at .05 for interpreting significance.

**Objective 2: Predicting Appearance Distractions During Sex. Hypothesis 6.** To test whether appearance ideal internalization predicted unique variance in appearance distractions during sexual activity, both variables assessing appearance ideal internalization

(WBIS-M and SATAQ-IG) were entered at Step 2 of the regression equation.

**Hypothesis 7.** To test whether body image concerns predicted unique variance in appearance distractions during sexual activity, all four variables assessing body image concerns (BSQ, BES-SA, BES-WC, and BES-PC) were entered at Step 2 of the regression equation.

**Hypothesis 8.** To test whether body image concerns predicted additional unique variance in appearance distractions during sexual activity, above and beyond the variance accounted for by appearance ideal internalization, both appearance ideal internalization variables (WBIS-M and SATAQ-IG) were entered at Step 2, and all four body image concern variables (BSQ, BES-SA, BES-WC, and BES-PC) were entered at Step 3 of the regression equation.

**Objective 3: Predicting Appearance Distractions During Sex. Hypothesis 9.** To test whether appearance ideal internalization predicted unique variance in performance distractions during sexual activity, both variables assessing body image (WBIS-M and SATAQ-IG) were entered at Step 2 of the regression equation.

**Hypothesis 10.** To test whether body image concerns predicted unique variance in performance distractions during sexual activity, all four variables assessing body image concerns (BSQ, BES-SA, BES-WC, and BES-PC) were entered at Step 2 of the regression equation.

**Hypothesis 11.** To test whether body image concerns predicted additional unique variance in performance distractions during sexual activity, above and beyond the variance accounted for by appearance ideal internalization, both appearance ideal internalization variables (WBIS-M and SATAQ-IG) were entered at Step 2, and all four body image



concern variables (BSQ, BES-SA, BES-WC, and BES-PC) were entered at Step 3 of the regression equation.

**Objective 4: Predicting Sexual Desire. Hypothesis 12.** To examine whether appearance ideal internalization, body image concerns, and distracting thoughts about appearance and performance during sexual activity predicted low sexual desire, both appearance ideal internalization variables (WBIS-M and SATAQ-IG) were entered at Step 2, all four body image concern variables (BSQ, BES-SA, BES-WC, and BES-PC) were entered at Step 3, and both distraction variables (CDDSA-AD and CDDSA-PD) were entered at Step 4 of the regression equation.

## Chapter 4: Results

### Descriptive Statistics

Means, standard deviations, and Cronbach's alpha coefficients for the Weight Bias Internalization Scale – Modified (WBIS-M; Durso & Latner, 2008), the Internalization-General subscale of the Social Attitudes Toward Appearance Questionnaire - 3 (SATAQ-IG; Thompson et al., 2003), Body Shape Questionnaire (BSQ; Bash et al.), Body Esteem Scale (BES; Franzoi & Shields, 1984), Cognitive Distraction During Sexual Activity (CDDSA; Dove & Wiederman, 2000), and the Sexual Desire subscale of the Female Sexual Function Index (FSFI-D; Rosen et al., 2000) are presented in Table 1.

Table 1.

*Descriptive Statistics for all Study Variables (N = 134)*

Variables	<i>M</i>	<i>SD</i>	<i>SE</i>	$\alpha$	Range	
					Possible	Actual
Weight Bias (WBIS-M)	37.07	19.16	1.65	.96	11 – 77	11 – 77
Internalization General (SATAQ)	28.70	9.36	.72	.93	9 – 45	9 – 45
Sexual Attractiveness (BES)	44.79	8.10	.71	.85	13 – 65	25 – 65
Weight Concern (BES)	28.03	9.68	.79	.93	10 – 50	10 – 50
Physical Condition (BES)	32.41	8.23	.63	.90	9 – 45	16 – 50
Body Shape Concern (BSQ)	25.77	9.74	.83	.90	8 – 48	8 – 48
Appearance Distraction (CDDSA)	44.02	14.46	1.23	.97	10 – 60	10 – 60
Performance Distraction (CDDSA)	44.27	12.64	1.08	.97	10 – 60	10 – 60
Sexual Desire (FSFI)	5.22	2.06	.11	.88	1.2 – 6	1.2 – 6

*Note:* WBIS-M = Weight Bias Internalization Scale – Modified, SATAQ = Sociocultural Attitudes Toward Appearance Scale, BES = Body Esteem Scale, BSQ = Body Shape Questionnaire, CDDSA = Cognitive Distraction During Sexual Activity Scale, FSFI-D = Female Sexual Function Inventory.

## Participants

Demographic information for the sample is provided in Table 2. Annual income and education information was gathered in order to describe the participants' socioeconomic status. However, incomplete income information was obtained; whereas all participants reported their education, only 44 (33%) participants provided their annual income. As a result, the highest level of education obtained was used as an indicator of socioeconomic status in the present study. Socioeconomic status is a complex phenomenon that is most commonly predicted in research by a combination of financial, occupational, and educational influences (Bravemen et al., 2005). Although not ideal, it is common in epidemiological research to use education as the only indicator of socioeconomic status (Bravemen et al., 2005).

Participants' self-reported height and weight was used to compute body mass index (BMI) using the formula  $weight (kg)/height (m)^2$ . In order to illustrate the body size diversity of the sample, participants were stratified into weight categories as defined by Health Canada (2003). Previous research has demonstrated that self-reported body weight and height are reliable (e.g., Larsen, Ouwens, Engels, Eisinga, & van Strien, 2008).

## Demographic Analyses

Relations among the demographic variables age and BMI were also examined. Results are presented in Table 3. Age was significantly negatively correlated with general appearance internalization (SATAQ-IG) while BMI was significantly positively correlated with all study variables except general appearance internalization (SATAQ-IG), sexual attractiveness (BES-SA), and sexual desire.

Table 2.

*Participant Characteristics*

Variable	<i>M</i>	<i>SD</i>	Range
Age	28.54	8.33	18 – 59
Previous sexual partners	11.66	11.67	1 – 51
Previous romantic relationships	4.61	4.28	1 – 27
BMI	23.97	4.73	16.46 – 39.91
	<u>N</u>	<u>%</u>	
BMI Category:			
Underweight (BMI <18.5)	10	8	
Normal Weight (BMI 18.5 - 24.9)	79	79	
Overweight (BMI 25 – 29.9)	33	25	
Obese (BMI > 30)	12	9	
Education:			
High school or less	15	12	
Post secondary	100	75	
Graduate	19	14	
Ethnicity:			
Caucasian	94	70	
Asian	19	15	
Other	18	13	
Hispanic/Latina Asian	3	2	
In a relationship	77	58	
Sexually active	81	60	
Sexual Orientation:			
Exclusively heterosexual	114	86	
Bisexual	8	19	
Exclusively homosexual	12	6	

Table 3.

*Bivariate Correlations Between all Study Variables (N = 134).*

Dependent Variables	Appearance Ideal Internalization		Body Image Concerns				Distracting Thoughts During Sexual Activity		Sexual Desire	Demographics	
	WBIS-M	SATAQ-IG	BES-SA	BES-WC	BES-PC	BSQ	CDDSA-AD	CDDSA-PD	FSFI-D	Age	BMI
WBIS-M	1	.46***	.28***	.68***	.42***	.79***	.68***	.45***	.01	.00	.54***
SATAQ-IG	.46***	1	.18*	.44***	.31***	.53***	.37***	.21*	.02	-.30***	-.07
BES-SA	.28***	.18*	1	.59***	.68***	.22**	.37***	.39***	.26**	.02	.11
BES-WC	.68***	.44***	.59***	1	.66***	.65***	.52***	.33***	.12	.07	.43***
BES-PC	.42***	.31***	.68***	.66***	1	.36***	.34***	.34***	.24**	.09	.20*
BSQ	.79***	.53***	.22**	.65***	.36***	1	.61***	.39***	.00	-.08	.39***
CDDSA-AD	.68***	.37***	.37***	.52***	.34***	-.61***	1	.81***	.06	.02	.38***
CDDSA-PD	.45***	.21*	.39***	.33***	.34***	-.39***	.81***	1	.08	.05	.31***
FSFI-D	-.01	.02	.26**	.12	.24**	-.00	.06	-.08	1	.12	.11
Age	.00	-.30***	.02	.07	.09	-.08	.02	.05	.12	1	.30***
BMI	.54***	-.07	.11	.43***	.20*	.39***	.38***	.31***	.11	.30***	1

\* =  $p < .05$ , \*\* =  $p < .01$ , \*\*\* =  $p < .001$ 

Note: WBIS-M = Weight Bias Internalization Scale – Modified, SATAQ-IG = Sociocultural Attitudes Toward Appearance Scale – Internalization General, BES = Body Esteem Scale (SA = Sexual Attractiveness, WC = Weight Concern, PC = Physical Condition), BSQ = Body Shape Questionnaire, CDDSA = Cognitive Distraction During Sexual Activity Scale (AD = Appearance Distraction, PD = Performance Distraction), FSFI-D = Female Sexual Function Inventory – Desire, BMI = Body Mass Index

Table 4.

*One-way Between Groups ANOVA by Level of Education.*

	Overall ( <i>N</i> = 134)		High school ( <i>n</i> = 15)		Post Secondary ( <i>n</i> = 100)		Graduate ( <i>n</i> = 19)	
	M	SD	M	SD	M	SD	M	SD
Weight Bias	37.11	19.23	44.20	22.55	37.21	18.57	31.00	18.94
Internalization General	28.69	9.35	26.55	11.38	29.77	8.54	24.50	10.85
Body Shape Concern	25.70	9.70	28.07	12.74	25.92	9.30	22.68	8.78
Sexual Attractiveness	44.72	8.02	42.50	6.17	45.17	8.23	44.00	8.23
Weight Concern	27.81	9.58	25.86	9.77	28.00	9.67	28.26	9.25
Physical Condition	32.20	8.20	30.21	7.15	32.35	8.55	32.84	7.10
Appearance Distraction	44.00	14.32	39.07	16.96	44.39	13.80	45.84	14.76
Performance Distraction	44.29	12.53	37.80	16.18	45.41	11.51	43.53	13.63
Sexual Desire	3.11	1.23	2.44*	.95	3.10	1.21	3.66*	1.28

\*  $p = <.05$

## **Group Comparison Analysis**

A one-way between subjects ANOVA was conducted to determine the effect of education on all study variables in the high school, post secondary, and graduate groups (see Table 4). The analysis yielded a significant effect for Sexual Desire  $F(2, 130) = 4.21, p = .017$ . Post hoc comparisons using the Tukey's HSD test indicated that the high school group ( $M = 2.44, SD = .95$ ) reported significantly lower sexual desire than the graduate group ( $M = 3.66, SD = 1.28$ ), while the post secondary group did not differ from either the high school or the graduate group. No significant between-group differences were observed for any of the other study variables.

## **Objective 1: Correlational Analyses**

The results of all bivariate Pearson product moment correlations for hypotheses 1 through 5 are presented in Table 3.

Hypothesis 1 stated that women with more appearance ideal internalization would have more body image concerns. The results supported this hypothesis. Both appearance ideal internalization variables (WBIS-M and SATAQ-IG) were significantly positively correlated with all four body image concern variables (BES-SA, BES-WC, BES PC, and BSQ).

Hypothesis 2 stated that women with more appearance internalization would have more distracting thoughts about their appearance and performance during sexual activity. The results supported this hypothesis. Both appearance ideal internalization variables assessed (WBIS-M and SATAQ-IG) were significantly positively correlated with both appearance and performance distraction during sex (CDDSA-AD and CDDSA-PD).

Hypothesis 3 stated that women with more body image concerns would have more

distracting thoughts about their appearance and their performance during sexual activity. The results supported this hypothesis. All four body image concern variables (BES-SA, BES-WC, BES PC, and BSQ) were significantly positively correlated with both appearance and performance distraction during sex (CDDSA-AD and CDDSA-PD).

Hypothesis 4 stated that women who perceived themselves as less sexually attractive would have lower sexual desire. The results supported this hypothesis. Perceived sexual attractiveness (BES-SA) was significantly positively associated with sexual desire (FSFI-D).

Hypothesis 5 stated that women with more distracting thoughts about their appearance and performance during sex would have lower sexual desire. This hypothesis was not supported. The relations between sexual desire (FSFI-D) and both appearance and performance distraction during sexual activity variables (CDDSA-AD and CDDSA-PD) were non-significant ( $r = .08$  and  $r = .06$ , respectively).

## **Objective 2: Regression Analyses Predicting Appearance Distractions During Sexual Activity**

For hypothesis 6, results supported the prediction that appearance ideal internalization predicted appearance distractions during sexual activity above and beyond the effect of demographic variables (see Table 5). The  $R^2$  of Model 1 was .151, indicating that demographic variables, specifically BMI, accounted for 15.1% of the variance in appearance distractions. Model 2 accounted for 45.2% of the variance in appearance distractions, indicating that the addition of appearance ideal internalization variables, specifically weight bias, contributed to explaining an additional 30.1% of the variability in appearance distractions during sexual activity.



Table 5.

*Hierarchical Regression Analyses Predicting Appearance Distractions*

Variable	Model 1		Model 2	
	$\beta$	SE	$\beta$	SE
Step 1				
Demographics				
BMI	.42***	.26	.07	.26
Age	.13	.15	.01	.13
Education	.07	2.36	.00	1.9
Step 2				
Appearance ideal internalization				
WBIS-M			.61***	.07
SATAQ-IG			.09	.13
R <sup>2</sup>	.170		.473	
Adjusted R <sup>2</sup>	.151		.452	

\*\*\* =  $p < .001$  (all two-tailed tests)

For hypothesis 7, results supported the prediction that body shape concerns predicted appearance distractions during sexual activity above and beyond the effect of demographic variables (see Table 6). Model 1 was the same as in hypothesis 6 with BMI accounting for 15.1% of the variance in appearance distractions. Model 2 accounted for 42.8% of the variance in appearance distractions, indicating that the addition of body image concern variables, specifically body shape concern and perceived low sexual attractiveness, contributed to explaining an additional 27.7% of the variability in appearance distractions during sexual activity.

Table 6.

*Hierarchical Regression Analyses Predicting Appearance Distractions*

Variable	Model 1		Model 2	
	$\beta$	SE	$\beta$	SE
Step 1				
Demographics				
BMI	.42***	.26	.17*	.24
Age	.13	.15	.03	.13
Education	.07	2.36	.03	1.9
Step 2				
Body image concerns				
BSQ			.50***	.14
BES-SA			.29**	.17
BES-WC			.01	.18
BES-PC			.08	.18
R <sup>2</sup>	.170		.458	
Adjusted R <sup>2</sup>	.151		.428	

\* =  $p < .05$ , \*\* =  $p < .01$ , \*\*\* =  $p < .001$  (all two-tailed tests)

For hypothesis 8, results supported the prediction that body shape concerns predicted appearance distractions during sexual activity above and beyond the effect of demographic and appearance ideal internalization variables (see Table 7). Models 1 and 2 were the same as in hypothesis 6; BMI and weight bias accounted for 45.2% of the variance in appearance distractions. Model 3 accounted for 49.4% of the variance in appearance distractions, indicating that the addition of body image concern variables, specifically perceived low sexual attractiveness, contributed to explaining an additional 4.2% of the variability in appearance distractions during sexual activity.

Table 7.

*Hierarchical Regression Analyses Predicting Appearance Distractions*

Variable	Model 1		Model 2		Model 3	
	$\beta$	SE	$\beta$	SE	$\beta$	SE
Step 1						
Demographics						
BMI	.42***	.26	.07	.26	.09	.26
Age	.13	.15	.01	.13	.00	.12
Education	.07	2.36	.00	1.92	.00	1.85
Step 2						
Appearance ideal internalization						
WBIS-M			.61***	.07	.47***	.09
SATAQ-IG			.09	.13	.07	.13
Step 3						
Body image concerns						
BSQ					.22*	.16
BES-SA					.30***	.16
BES-WC					.12	.18
BES-PC					.10	.17
R <sup>2</sup>	.170		.473		.528	
Adjusted R <sup>2</sup>	.151		.452		.494	

\* =  $p < .05$ , \*\*\* =  $p < .001$  (all two-tailed tests).

### Objective 3: Regression Analyses Predicting Performance Distractions During Sexual Activity

For hypothesis 9, results supported the prediction that appearance ideal internalization predicted performance distractions during sexual activity above and beyond the effect of demographic variables (see Table 8). The R<sup>2</sup> of Model 1 was .097, indicating that demographic variables, specifically BMI, accounted for 9.7% of the variance in performance distractions. Model 2 accounted for 18.0% of the variance in performance distractions, indicating that the addition of appearance ideal internalization variables, specifically weight bias, contributed to explaining an additional 8.3% of the variability in performance distractions during sexual activity.

Table 8.

*Hierarchical Regression Analyses Predicting Performance Distractions*

Variable	Model 1		Model 2	
	$\beta$	SE	$\beta$	SE
Step 1				
Demographics				
BMI	.35***	.23	.14	.28
Age	.14	.14	.07	.13
Education	.05	2.12	.01	2.06
Step 2				
Appearance ideal internalization				
WBIS-M			.35**	.08
SATAQ-IG			.04	.14
R <sup>2</sup>	.117		.211	
Adjusted R <sup>2</sup>	.097		.180	

\*\* =  $p < .01$ , \*\*\* =  $p < .001$  (all two-tailed tests)

For hypothesis 10, results supported the prediction that body shape concerns predicted performance distractions during sexual activity above and beyond the effect of demographic variables (see Table 9). Model 1 was the same as in hypothesis 9 with BMI accounting for 9.7% of the variance in performance distractions. Model 2 accounted for 27.0% of the variance in performance distractions, indicating that the addition of body image concern variables, specifically body shape concern, perceived low sexual attractiveness, and weight concerns, contributed to explaining an additional 17.3% of the variability in performance distractions during sexual activity.

Table 9.

*Hierarchical Regression Analyses Predicting Performance Distractions*

Variable	Model 1		Model 2	
	$\beta$	SE	$\beta$	SE
Step 1				
Demographics				
BMI	.35***	.23	.25**	.24
Age	.14	.14	.05	.13
Education	.05	2.12	.02	1.92
Step 2				
Body image concerns				
BSQ			.37***	.14
BES-SA			.41***	.17
BES-WC			.30*	.18
BES-PC			.08	.18
R <sup>2</sup>	.117		.308	
Adjusted R <sup>2</sup>	.097		.270	

Note. \* =  $p < .05$ , \*\* =  $p < .01$ , \*\*\* =  $p < .001$  (all two-tailed tests)

For hypothesis 11, results supported the prediction that body shape concerns predicted performance distractions during sexual activity above and beyond the effect of demographic and appearance ideal internalization variables (see Table 10). Models 1 and 2 were the same as in hypothesis 9; BMI and weight bias accounted for 18.0% of the variance in appearance distractions. Model 3 accounted for 28.3% of the variance in performance distractions, indicating that the addition of body image concern variables, specifically perceived low sexual attractiveness and weight concerns, contributed to explaining an additional 10.3% of the variability in performance distractions during sexual activity.

Table 10.

*Hierarchical Regression Analyses Predicting Performance Distractions*

Variable	Model 1		Model 2		Model 3	
	$\beta$	SE	$\beta$	SE	B	SE
Step 1						
Demographics						
BMI	.35***	.23	.14	.28	.20*	.27
Age	.14	.14	.07	.13	.03	.13
Education	.05	2.12	.01	2.06	.01	1.92
Step 2						
Appearance ideal internalization						
WBIS-M			.35**	.08	.26	.09
SATAQ-IG			.04	.14	.06	.13
Step 3						
Body image concerns						
BSQ					.20	.17
BES-SA					.42***	.17
BES-WC					.38**	.19
BES-PC					.06	.17
R <sup>2</sup>	.117		.211		.332	
Adjusted R <sup>2</sup>	.097		.180		.283	

\* =  $p < .05$ , \*\* =  $p < .01$ , \*\*\* =  $p < .001$  (all two-tailed tests)

#### Objective 4: Regression Analyses Predicting Sexual Desire

For hypothesis 12, results did not support the prediction that appearance ideal internalization, body image concerns, or appearance and performance distractions during sexual activity would predict low sexual desire (see Table 11). The only variable that contributed any variance in sexual desire was education. After demographic variables were entered at Step 1, appearance ideal internalization variables at Step 2, body image concern variables at Step 3, and distractions during sex at Step 4, the R<sup>2</sup> for education in Model 4 is .112, indicating that 11.2% of the variance in sexual desire was accounted for by education.

Table 11.

*Hierarchical Regression Analyses Predicting Sexual Desire*

Variable	Model 1		Model 2		Model 3		Model 4	
	$\beta$	SE	$\beta$	SE	$\beta$	SE	$\beta$	SE
Step 1								
Demographics								
BMI	.13	.02	.21	.03	.21	.03	.22	.03
Age	.10	.01	.12	.01	.14	.01	.14	.01
Education	.22*	.21	.23**	.22	.23**	.21	.23**	.21
Step 2								
Appearance ideal internalization								
WBIS-M			.15	.01	.03	.01	.00	.01
SATAQ-IG			.00	.01	.04	.02	.04	.02
Step 3								
Body image concerns								
BSQ					.05	.02	.04	.02
BES-SA					.17	.02	.15	.02
BES-WC					.06	.02	.05	.02
BES-PC					.22	.02	.22	.02
Step 4								
Distractions during sex								
CDDSA-AD							.06	.02
CDDSA-PD							.01	.02
R <sup>2</sup>	.079		.093		.184		.186	
Adjusted R <sup>2</sup>	.058		.057		.124		.112	

\* =  $p < .05$ , \*\* =  $p < .01$  (all two-tailed tests)

## Chapter 5: Discussion

### **Overview**

The following chapter is structured into four sections. The first two sections of this chapter review the findings of the current study in the context of the existing literature. Following this review, a discussion about the limitations and recommendations for future research directions are noted, leading into a discussion about the implications of this research for counselling practice.

The purpose of the present study was to investigate the role of appearance ideal internalization and body image concerns on women's experience of cognitive distraction during sexual activity and sexual desire. These findings add to the growing body of research (e.g. Meana & Nunnink, 2006; Sanchez & Kiefer, 2007; Pujols et al., 2010) documenting the important role of appearance ideals and body image on women's sexual wellbeing. The present study sought to address gaps in the existing literature by assessing various facets of body image including: perception of sexual attractiveness, concern about weight, concern about physical condition, and overall dissatisfaction with body shape. This study also expanded upon the construct of thin ideal internalization by including a measure of weight bias internalization, which assessed the extent to which individuals internalized messages about weight stigmatization.

### **Correlational Findings**

Results for hypothesis 1 indicated that women who reported higher rates of appearance internalization also reported more body image concerns. That is, general thin ideal internalization and weight bias internalization were significantly positively related to all four measures of body image concerns. These findings are consistent with previous research



(e.g. Aubrey, 2007; Puhl & Brownell, 2014), and support the model presented by objectification theorists that implicate sociocultural messages as integral in shaping how women view their bodies (Fredrickson & Roberts, 1997). Results for hypothesis 2 yielded significant associations among general internalization, weight bias internalization and appearance and performance based distracting thoughts during sexual activity. These findings are also consistent with the associations hypothesized by objectification theory (Fredrickson & Roberts). The strength of the correlation between weight bias and distracting thoughts ( $r = .45 - .68$ ) offers novel support for weight bias internalization as a potentially important facet of appearance ideal internalization that has not been previously investigated. Results for hypothesis 3 were consistent with work done by Pujols et al. (2010), indicating that all four measures of body image concerns were significantly related to both appearance and performance distractions during sex. The strong correlations between weight bias internalization and all body image concern and distraction variables ( $r = .28 - .78$ ), further suggest that weight bias may be an important construct to consider for women across the weight spectrum. Whereas most research on appearance ideal internalization has focused on the internalization of media images of thinness, weight bias taps into the affective consequences of internalizing our culture's anti-fat attitudes (Durso & Latner, 2008). Until recently, these associated feelings of shame and low self-worth have been presumed to be more relevant for overweight and obese individuals (Pearl & Puhl, 2013). The results of this study suggest that dissatisfaction with one's body, irrespective of actual body size, may have the same detrimental effect on women's wellbeing. Thus, future research examining the consequences of appearance ideal internalization for women should consider assessing

weight bias internalization in addition to other well-established thin ideal measures (e.g., SATAQ; Thompson et al., 2004).

Results for hypothesis 4 also supported and replicated the finding that low perceived sexual attractiveness was associated with low sexual desire (Pujols et al., 2010; Satinsky et al., 2012). Furthermore, Seal, Bradford, and Meston (2009) found that high body confidence was positively related to sexual desire in response to erotica in a laboratory setting. Although not a specific hypothesis of this research, low sexual desire was also significantly related with having more concerns about weight, which is consistent with previous research (Satinsky et al.; Woertmen & Van den Brink, 2012). The results for hypothesis 4 also support Davison and McCabe's (2005) proposition that more specific facets of body image, like sexual attractiveness, are more clearly associated with sexual outcomes than are global impressions of body image.

The only hypothesis that was not supported was hypothesis 5, which predicted an association between higher rates of cognitive distractions and low sexual desire. There are theoretical and methodological considerations that are worth noting when interpreting this finding. As proposed in objectification theory, self-monitoring during sexual activity may lead to a decreased awareness of physiological states, which may in turn impede the sexual response cycle (Dove & Weiderman, 2000; Fredrickson & Roberts, 1997). Considering that sexual desire is a more subjective phenomenon than sexual arousal, it may be that distraction during sex is more directly linked to physiological arousal, whereas sexual desire may be more directly linked to feelings of confidence and attractiveness, as the results of hypothesis 4 suggest. Furthermore, it seems plausible that women may have become so accustomed to self-objectification and distraction during sex that it has become a normalized part of their

sexual experience. Therefore, it is possible that women may not consider the self-objectifying experience during sex as a factor that negatively impacts their sexual desire. Similarly, Meana and Nunnink (2006) hypothesized that because women are more familiar with the experience of self-objectification, distracting thoughts during sex might have a greater impact on sexual satisfaction for men than for women.

In addition, a possible methodological limitation that may have contributed to this null finding is the relative homogeneity of the sample with regards to relationship status. A majority of participants reported that they were in a relationship (58%) and for the most part, did not endorse problems with sexual function. Previous research has found that being in a relationship was associated with less difficulty achieving orgasm and less sexual self-consciousness for men and women (Sanchez & Keifer, 2007). In the current study, the lack of range in the distribution of scores observed for the other FSFI subscales (Arousal, Lubrication, Orgasm, Satisfaction, and Pain) necessitated that those scales be excluded from the analyses as they failed the assumptions of normality. If there had been more variability in the range of scores for the entire FSFI in this sample, it would have been possible to examine whether cognitive distractions were associated with the other related domains of sexual functioning (Arousal, Lubrication, Orgasm, Satisfaction, and Pain) that have been identified in previous research (e.g. Sanchez & Keifer). Based on the sample limitations and the potential theoretical gap in linking cognitive distraction directly to low sexual desire, the null findings in present study should be interpreted with caution. Future research that addresses these limitations is needed to clarify the current findings.

## Regression Findings

### Predicting Appearance Distractions

All three hypotheses predicting distracting thoughts about appearance in objective 2 were supported. In hypothesis 6, appearance ideal internalization explained approximately three times the variance in predicting appearance distraction than did demographic variables. In hypothesis 7, body image concerns also explained close to three times the variance in predicting appearance distraction than did demographic variables. Specifically, weight bias internalization (for hypothesis 6) and body shape concern and sexual attractiveness (for hypothesis 7) accounted for the variance above and beyond the effect of body mass index (BMI). When both appearance ideal internalization and body image concerns were considered together (for hypothesis 8), both constructs uniquely contributed in predicting appearance ideal internalization. Again, weight bias internalization, body shape concern, and sexual attractiveness were significant predictors. To date, few studies have investigated predictors and correlates of distracting thoughts about appearance during sex (Dove & Wiederman, 2000; Meana & Nunnink, 2006; Pujols et al., 2010; Purdon & Holdaway, 2006). The current study supports previous research findings that body image concerns were significant predictors of appearance distractions (Purdon & Holdaway). The finding that weight bias internalization was a significant predictor of appearance distractions is a novel finding and suggests that internalizing anti-fat attitudes may be especially relevant in this context given the recent shift in focus on towards fitness as part of the Western sociocultural appearance ideal for women.

## **Predicting Performance Distractions**

All three hypotheses predicting distracting thoughts about performance during sexual activity in objective 3 were supported. In hypothesis 9, appearance ideal internalization explained approximately two times the variance in predicting performance distraction than did demographic variables. In hypothesis 10, body image concerns explained close to three times the variance in predicting performance distraction than did demographic variables. Specifically, weight bias internalization (for hypothesis 9) and body shape concern, sexual attractiveness, and weight concern (for hypothesis 10) accounted for the variance above and beyond the effect of body mass index (BMI). When both appearance ideal internalization and body image concerns were considered together (for hypothesis 11), body image concerns (sexual attractiveness and weight concerns) and BMI most strongly predicted performance distractions during sexual activity. Similarly, the findings of the current study support previous research indicating that body image concerns significantly predicted performance-based distracting thoughts (Purdon & Holdaway, 2006), while research by Meana & Nunnink (2006) found that psychological distress, negative body image, and sexual dissatisfaction predicted performance distracting thoughts.

Studies that have examined the causal model suggested in objectification theory have taken appearance ideal internalization into account by operationalizing the construct as self-monitoring, self-objectification, and/or thin ideal internalization (the latter being common to the present study). These studies have found varying levels of support for the role of appearance ideal internalizations in predicting sexual satisfaction and desire (e.g., Pujols et al., 2010; Seal, Bradford & Meston, 2009), sexual avoidance (e.g., La Rocque & Cioe, 2011), and sexual functioning (Satinsky, et al., 2012; Tiggeman & Williams, 2011). However, none

of the aforementioned studies examined distractions during sex as the dependent outcome variable or the role of weight bias internalization in predicting cognitive distractions during sex.

Surprisingly, in this study general internalization of the thin beauty ideal (as measured by the SATAQ-IG in this research) did not predict distraction during sex the way it has predicted other sexual outcomes in previous research (e.g. Tiggeman & Williams, 2011). Although general internalization of the thin ideal was significantly associated with both types of distraction during sex, only weight bias internalization emerged as a significant predictor. Although further research is needed to confirm these findings, the results of the present study suggest that weight bias internalization may be an important facet of appearance ideal internalization that is of particular relevance in our increasingly fat-phobic culture. The self-evaluative statements that are believed to represent an internalized acceptance of these anti-fat attitudes (e.g., “Because of my weight, I don't understand how anyone attractive would want to date me”) seem to be especially salient in women who experience distracting thoughts about their appearance during sex.

### **Predicting Sexual Desire**

In contrast to previous research (e.g., Seal et al., 2009), hypothesis 12 of objective 4 was not supported in this research. The only variable that was predictive of sexual desire in the regression analysis was level of education. However, the one-way ANOVA analysis by education group indicated that participants with a high school education significantly differed from participants with graduate degrees on sexual desire, with the less educated group reporting lower levels of desire. Thus, the significant education finding in the regression may be a product of this significant group difference. In addition, considering the homogeneity of

the sample previously mentioned in reference to the null findings of hypothesis 5, these issues limit the interpretability of these findings.

Having said that, I would postulate that hypothesis 12 may have been supported in a more demographically diverse sample with a measure that captured the subjective components of sexual desire and satisfaction more comprehensively. For example, Pujols et al. (2010) used the Sexual Satisfaction Scale for Women (SSS-W; Meston & Trapnell, 2005) as their main outcome measure and controlled for sexual functioning status (as measured by the FSFI), rather than predicting sexual functioning as an outcome, as was done in this research. The SSS-W is more comprehensive than the FSFI (Rosen et al., 2000) in that it assesses five different domains of satisfaction including: ease and comfort around sexual communication, compatibility regarding preferences and desires, overall sexual contentment, personal distress regarding sexual problems, and interpersonal distress regarding impact of sexual problems (Meston & Trapnel). The authors found that body image concerns and distracting thoughts about appearance both uniquely predicted low sexual satisfaction after controlling for the impact of sexual functioning (Pujols et al.).

Furthermore, similarly to the discussion regarding the null findings for hypothesis 5, it is possible that body image concerns have become so normative for women that they do not interfere with what they consider to be sexual desire in a discernable way. Alternatively, it is also possible that sexual desire in women may be defined more relationally rather than individually (Hall, & Travis, 2002), and as such distractions during sex may reflect concerns about the relational aspects of sex (Meana & Nunnink, 2006). This perspective is consistent with research that states men are more likely to view others as objects of desire, whereas women are more likely to view themselves as objects of sexual desire (Bogaert & Brotto,

2013; Fredrickson & Roberts, 1997). In this way, women may equate their perception of their sexual attractiveness with being a good sexual partner, which might translate to a high degree of overlap and shared variance between the way the constructs of sexual attractiveness and distraction during sex were measured in this research. The inter-correlations between sexual attractiveness and appearance and performance distractions in the current study were strong,  $r = .37$  and  $r = .39$ , respectively. Taken together, the null findings in predicting sexual desire should be understood in the context of the methodological and theoretical issues described. Future research is needed to determine whether relational concerns during sex are distinguishable from body image concerns and seek to explore the potential influence of each on sexual desire.

### **Limitations and Implications for Future Research**

One limitation of the present study was the sample size, particularly with regards to ethnicity, socioeconomic status, and sexual orientation. The current sample was comprised of adult women who primarily identified as Caucasian (70%), exclusively heterosexual (86%), and having had at least some post-secondary education (89%). The uneven demographic distribution of participants among these groups limited the ability to conduct between group comparisons by ethnic groups or sexual orientation status, due to power constraints. A more representative sample would have helped to elucidate some of the mixed findings regarding the relationship between body image concerns and sexual functioning in women with diverse ethnicities and sexual orientations. As referenced in the literature review, recent research has pointed to a potential shift towards the predominantly Caucasian and heteronormative depiction of female beauty among African American and Hispanic women (e.g., Shaw et al., 2004) and lesbian women (e.g., Peplau et al., 2009). Future research should seek to examine



whether the findings of this study could be replicated in these populations.

Relatedly, the homogeneity of the current sample limits the potential generalizability of the findings of this study. Participants in the present study were obtained via convenience sampling and thus only represent a small segment of the urban setting in which the research was conducted. In order for the findings to be generalizable to the general population, a larger sample size and random sampling would have been required. Considering the recruitment method for this study, it is possible that selection bias contributed to the results of this research. Given that the study advertisement described the study as being about, “women’s health, sexuality, and *resilience* to sociocultural beauty ideals” it is possible that women who viewed their relationships with their bodies and their sexuality positively were more likely to participate. The relative absence of sexual problems reported by the study participants lends support to this notion. The null findings in relation to hypotheses 5 and 12 regarding sexual desire should be examined in a sample of women with a more diverse range of sexual problems. Furthermore, including additional measures of sexual satisfaction that capture the relational components of sex in addition to the more physiological measures of sexual functioning (e.g. FSFI, Rosen et al., 2000) would help to clarify the relationship between body image concerns, distraction during sex, and sexual desire.

Another limitation of the current study is that it focused solely on the experiences of women in the absence of the context of their romantic partners. Although it was beyond the scope of the current thesis, previous research has identified that communication style (verbal and non-verbal) and interactions between partners further influence women’s experiences of their sexual encounters (see Woertman & van den Brink, 2012 for a review). Given that the findings of the current study suggest that weight bias internalization plays a role in women’s

experiences of distraction during sex, future research should explore the potential role that partners may play in exacerbating or minimizing these beliefs.

Finally the cross sectional methodology of the present study precludes any interpretations to be made with regard to causality. Although objectification theory posits that internalization of unrealistic appearance ideals lead women to become unduly conscious of their bodies, it seems possible that the reverse may also be true. In other words, women that experience more distress around body image concerns may be more likely to compare themselves to media representations of women, resulting in a self-evaluation that confirms their pre-existing dissatisfaction with their bodies. In fact, even the most comprehensive studies that have evaluated objectification theory have also utilized a cross-sectional methodology (e.g., Colagaro & Thompsom, 2009; Tiggeman & Williams, 2011). To date, only a handful of studies have conducted longitudinal research on whether frequency and amount of media exposure to the thin ideal predict body image concerns and sexual attitudes and behaviours over time (e.g., Levine & Murnen, 2007; Aubrey, 2007). These few longitudinal studies do support objectification theory's model that internalization of appearance ideals precedes body image concerns and subsequent negative sexual health outcomes, but more research following cohorts over time is needed. Future research should attempt to replicate these findings using a longitudinal study design and utilize more comprehensive measures of sexual desire and satisfaction in order to address the limitations of the current study. Finally, more qualitative research would help to elucidate the meaning that women ascribe to their sexual experiences and help researchers and clinicians to understand which aspects are important to them. For example, Graham and colleagues' (2004) qualitative work regarding factors that contribute to women's sexual arousal helped to

inform the development of a new tool. Qualitative research aims to understand women's lived experiences and thus is critical in identifying new directions for exploration in this complex area of inquiry.

### **Implications for Counselling**

The present study has multiple implications for counselling practice, particularly in how therapeutic work is approached with women and couples who have experienced sexual problems. The findings of this and previous research (e.g., Seal et al., 2009; Meana & Nunnink, 2006; Purdon & Holdaway, 2006) indicate that women across the weight spectrum may experience dissatisfaction with their bodies that may interfere with their ability to be present and fully engaged in their sexual relationships. These findings have potential implications for the treatment of sexual problems, or for the enhancement of sexual functioning.

For women that report feeling distracted by self-evaluative thoughts during sex, treatment may benefit from helping women to retrain or re-focus their attention to pleasurable, erotic stimuli and away from non-erotic or stress-inducing stimuli. Similarly to cognitive behavioural treatments for anxiety or obsessive-compulsive disorder, it may be useful to help women challenge the perceived need to persevere on and monitor what they perceive to be unpleasant or undesirable about themselves (Meana & Nunnink, 2006). With psychoeducation, helping women to understand that they have a choice in what stimulus they attend to could be a liberating experience that allows them to take charge of their own pleasure.

It may also be useful for some women to identify and target areas of their lives outside of sexual encounters that may be contributing to reinforcing self-objectifying habits.

For example, consciously examining the impact of any discriminatory attitudes held around shape and weight may illuminate unhelpful patterns of behaviour that contribute to the internalization of unrealistic body ideals. In addition, it may be less intimidating to practice re-focusing skills in a less vulnerable environment before applying those skills within a sexual context. Furthermore, attempting to gain an understanding of the sources underlying both performance and appearance distractions may help counsellors to further refine existing treatments like sensate-focus and other performance-focused therapies that may not specifically focus on these kinds of negative self-evaluations (Weiderman, 2001). It is also important to explore the potential impact that couples' interactions and communication may have on women's experiences of their bodies and sexual encounters. Although the current study focused exclusively on how women's interactions with the broader sociocultural landscape impacted their relationships with their bodies and subsequently their sexual experiences, it is important to address potential dyadic factors in the context of counselling. Basic psychoeducation around communication styles on how various comments or behaviours are intended by the partner, versus how they are received, may help to ameliorate or prevent potential patterns that may be negatively reinforcing harmful beliefs or schemas.

Finally, it may be a beneficial strategy for counsellors to focus on the thoughts that occur during sex as the primary target of their interventions rather than the effects of the distraction. Considering that both appearance and performance distractions were predicted by body image concerns and appearance ideal internalization beyond the impact of actual body size, cognitive interventions that challenge women's schemas around what it means to be viewed as sexy or desirable to their partners could be helpful. Furthermore, the strong finding regarding the importance of weight bias internalization suggest that counselors should

explore the extent to which clients may have internalized these beliefs, as they appear to be relevant for women of all body sizes and not only overweight women as previously understood.

### **Summary of Findings and Conclusion**

The current study sought to investigate the role of appearance ideal internalization and body image concerns on women's experiences of cognitive distraction during sex and sexual desire. The findings suggest that weight bias internalization, perceived low sexual attractiveness and weight concerns were most strongly predictive of both appearance and performance-based distracting thoughts during sex. Although the results did not support the hypothesis that appearance ideals, body image concerns, and experiences of distraction would predict low sexual desire, possible theoretical gaps and methodological limitations were discussed in order to contextualize the meaning of the null finding.

This study builds upon previous research and suggests that weight bias internalization may be an important factor to examine within the objectification theory framework. In addition, few studies have examined predictors of cognitive distraction during sex from an objectification framework as was examined in this research. Together, the findings contribute to our understanding of women's sexual experiences and offer insights into how this knowledge may be incorporated into counselling interventions aimed at improving women's sexual pleasure.

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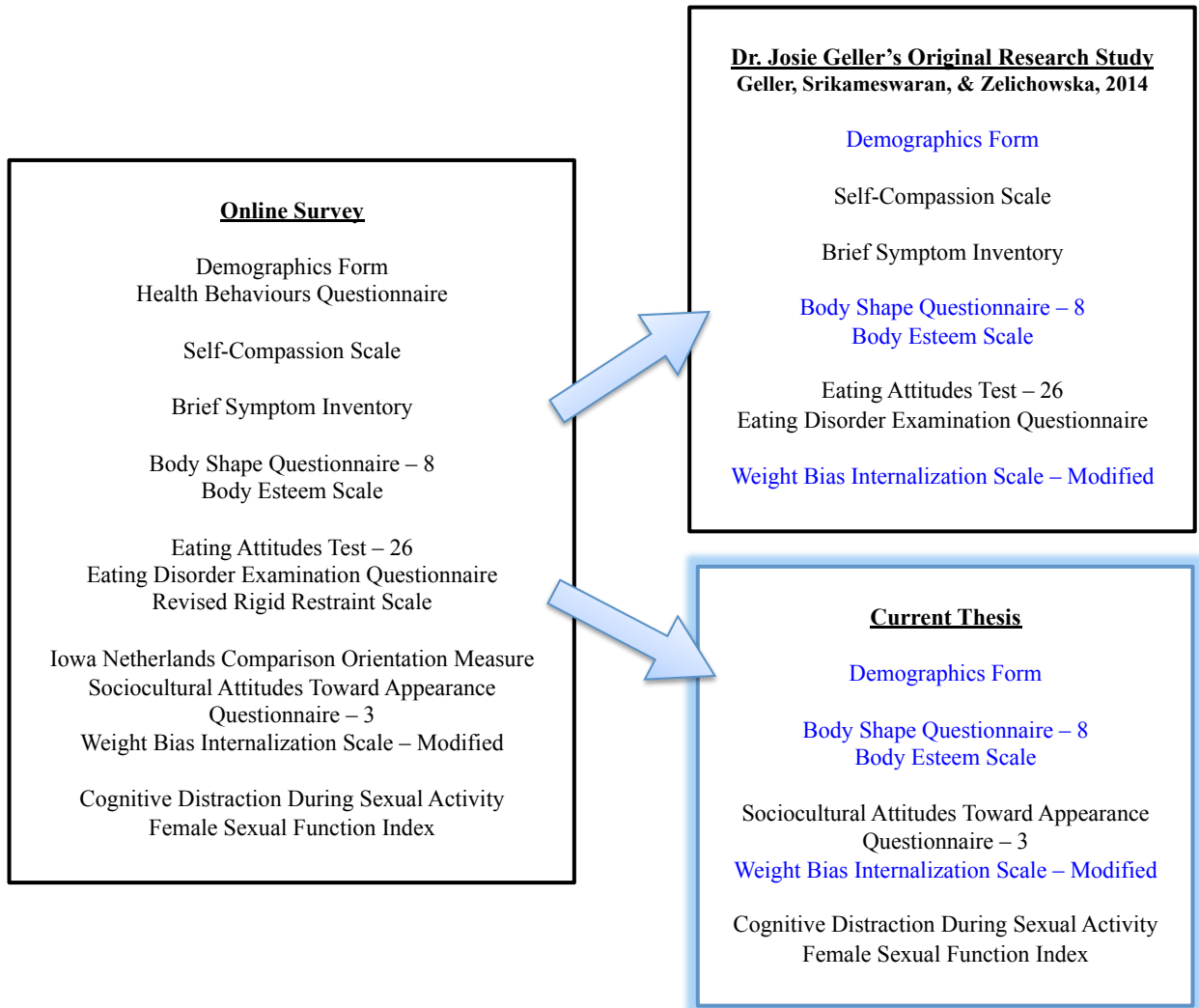
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## Appendices

### Appendix A: Study Variables of Dr. Geller's Research and the Current Thesis



## Appendix B: Recruitment Advertisement



### **Women's Health, Sexuality, and Resilience to Sociocultural Beauty Ideals**

**Are you a female 18 years of age or older interested in body image, sexuality and media influences?**

**Contribute to research examining women's health, sexuality and resilience to Western culture beauty ideals by participating in an online survey!**

**Participants will be entered into a draw to win a \$100 Visa gift card.**

**The anonymous online questionnaire takes less than a 1-hour to complete.**

**If you would like to participate, please access our questionnaire by going to this website: [www.psychdata.com/s.asp?SID=142152](http://www.psychdata.com/s.asp?SID=142152)**

**To learn more about this study, you may contact the study coordinator at: [jzeliowska@\\*\\*\\*\\*\\*.ca](mailto:jzeliowska@*****.ca)**

*This study is being conducted by researchers at St. Paul's Hospital and the University of British Columbia*



Appendix C: Informed Consent

**PARTICIPANT INFORMED CONSENT FORM**



**Principal Investigator:**

**Dr. Josie Geller**

**Study Coordinator (Contact Person):**

**Joanna Zelichowska**

**Women’s Health, Sexuality, and Resilience to Socio-Cultural Beauty Ideals**

You are being invited to participate in this research in order to increase our understanding of relations among women’s health behaviours, their experience of their bodies, sexuality and self-compassion. Participation in this study is entirely voluntary. You may decide to participate or not to participate, or you may withdraw from the study at any time.

A large body of literature suggests that living in a competitive, weight-, beauty- and youth-obsessed culture is associated with beliefs and behaviours that make women vulnerable to emotional distress, poor body image and harmful appearance-oriented health behaviours, such as fad dieting and excessive over-exercising. The societal emphasis on physical attractiveness in Western culture also leaves women vulnerable to sexual difficulties. To date, little is known about factors that are associated with resilience to or protection from these influences.

**PURPOSE**

The purpose of this research is to examine relations among women’s health behaviours, emotional wellbeing, sexual health, attitudes about shape and weight, and self-compassion. To date, these relations have not been investigated.

**PROCEDURES**

Participation in this study will require the completion of an online questionnaire. These questions will appear on the website after you agree to participate by clicking on the “I Agree to the above” box at the end of this form. This study will take approximately 1 hour to complete. The questionnaire addresses demographic information, health behaviours, sexuality, emotional wellbeing, attitudes about shape and weight, and self-compassion. You are free to omit any questions you are uncomfortable answering and may withdraw from the study at any time.

Example Questions:

Please rate the degree to which you agree or disagree with the following statements:

*“I’ve felt pressure from TV or magazines to lose weight.”*

*“I try to be loving towards myself when I’m feeling emotional pain.”*

*“During sexual activity, I am worried about how my body looks to my partner.”*

**POTENTIAL BENEFITS**

No direct risks or benefits are anticipated from this research. However, by participating you may gain a better understanding of your relationship with your body and possible cultural and media influences on your health. You may experience emotional reactions to some of the questions, or feel embarrassed when answering questions regarding your sexuality. You will be provided with the name and contact information of counseling services should you require them upon completion of this study (counseling services contact information are listed at the end of the survey).

**MONETARY COMPENSATION**

By participating in this study, you will be entered into a draw to win a \$100 Visa gift card.

**CONFIDENTIALITY**

All information obtained is confidential. No names will be used in records. All data will be identified with code numbers only. All completed questionnaires will be stored on a password-protected computer and will only be accessible to the investigators. During the data collection phase of this study, the data will be temporarily stored on secured servers located in the United States. While the findings may be used in future studies, there will be no identification of you personally on any permanent records. All information will be reported in group form and will remain anonymous.

**QUESTIONS ABOUT THE STUDY OR YOUR RIGHTS**

You do not waive any legal rights by signing this form. If you have any questions about your rights as a research participant, you may contact the director of Research Services, University of British Columbia at \*\*\* \*\*\*. If you have any questions or concerns at any time during the study, you may contact Dr. Geller or Joanna Zelichowska at the numbers listed above. You will be informed of any significant information that may concern you.

**CONSENT**

You may refuse to participate, withdraw from the study or decline answering any questions without any consequences. Your participation in this study is entirely voluntary and no penalty will result if you choose not to participate in this research. Choosing the “I agree to the above” button at the bottom of this page indicates that you consent to participate in this study.

I agree to the  
above

I do not want to  
participate

Appendix D: Study Measures

**Demographics**

1. Age (in years): \_\_\_\_\_
2. Gender: Male / Female / Transgender / Other
3. Height (in feet and inches): \_\_\_\_\_
4. Weight (in pounds): \_\_\_\_\_
5. Ethnicity (e.g. Chinese, Caucasian): \_\_\_\_\_
6. Annual Household Income (approximate): \_\_\_\_\_
7. Personal Annual Income (approximate): \_\_\_\_\_
8. What is your current occupation? \_\_\_\_\_
9. English Language Reading Ability (*please circle*):

0	1	2	3	4	5	6
Difficulty Reading or Comprehending Written English			Some Difficulty Reading/ Comprehending Written English			No Difficulties Reading/ Comprehending Written English

10. Sexual Orientation (*please circle*):

0	1	2	3	4	5	6
Exclusively Heterosexual			Bisexual			Exclusively Homosexual

11. Highest level of education:
  - a. Some High school
  - b. High school Degree
  - c. Trades school
  - d. Some college
  - e. College diploma
  - f. Bachelors Degree (BA, BSc, LLP, MD)
  - g. Master's Degree (MA, MSc, MEd)
  - h. Doctorate Degree (PhD, PsyD)

12. What is your current relationship status?
- a. I am in a monogamous relationship and am having sexual intercourse with my partner
  - b. I am in a monogamous relationship and am not having sexual intercourse with my partner
  - c. I am in an open relationship and am having sexual intercourse with multiple partners
  - d. I am single and am having sexual intercourse with multiple partners
  - e. I am single and am not having sexual intercourse
13. Number of previous romantic relationships: \_\_\_\_\_
14. Number of previous sexual partners: \_\_\_\_\_

## Body Shape Questionnaire - 8A

We should like to know how you have been feeling about your appearance over the **PAST FOUR WEEKS**. Please read each question and circle the appropriate number to the right. Please answer all the questions.

### OVER THE PAST FOUR WEEKS:

	Never		Rarely			Sometimes			Often			Very often				Always
1. Has feeling bored made you brood about your shape?.....	1	2	3	4	5	6										
2. Have you thought that your thighs, hips or bottom are too large for the rest of you?.....	1	2	3	4	5	6										
3. Have you felt so bad about your shape that you have cried?.....	1	2	3	4	5	6										
4. Have you avoided running because your flesh might wobble?.....	1	2	3	4	5	6										
5. Has being with thin women made you feel self-conscious about your shape?.....	1	2	3	4	5	6										
6. Have you worried about your thighs spreading out when sitting down?	1	2	3	4	5	6										
7. Has eating sweets, cakes, or other high calorie food made you feel fat?	1	2	3	4	5	6										
8. Has worry about your shape made you feel you ought to exercise?.....	1	2	3	4	5	6										

## Body Esteem Scale

Please rate the degree to which you feel positive or negative about the body parts and functions listed below using the following response options:

- 1 = Have strong negative feelings
- 2 = Have moderate negative feelings
- 3 = Have not feeling one way or the other
- 4 = Have moderate positive feelings
- 5 = Have strong positive feelings

Body scent	1	2	3	4	5
Appetite	1	2	3	4	5
Nose	1	2	3	4	5
Physical stamina	1	2	3	4	5
Reflexes	1	2	3	4	5
Lips	1	2	3	4	5
Muscular strength	1	2	3	4	5
Waist	1	2	3	4	5
Energy Level	1	2	3	4	5
Thighs	1	2	3	4	5
Ears	1	2	3	4	5
Biceps	1	2	3	4	5
Chin	1	2	3	4	5
Buttocks	1	2	3	4	5
Body build	1	2	3	4	5
Physical coordination	1	2	3	4	5
Breasts	1	2	3	4	5
Appearance of eyes	1	2	3	4	5
Cheeks/cheekbones	1	2	3	4	5
Hips	1	2	3	4	5
Agility	1	2	3	4	5
Width of shoulders	1	2	3	4	5
Arms	1	2	3	4	5
Legs	1	2	3	4	5
Figure or physique	1	2	3	4	5
Sex drive	1	2	3	4	5
Feet	1	2	3	4	5
Sex organs	1	2	3	4	5
Appearance of stomach	1	2	3	4	5
Health	1	2	3	4	5
Sex activities	1	2	3	4	5
Body hair	1	2	3	4	5
Physical condition	1	2	3	4	5
Face	1	2	3	4	5
Weight	1	2	3	4	5



### Sociocultural Attitudes Towards Appearance Scale - 3 (SATAQ-3)

Please read each of the following items carefully and indicate the number that best reflects your agreement with the statement.

**Definitely Disagree = 1**  
**Mostly Disagree = 2**  
**Neither Agree Nor Disagree = 3**  
**Mostly Agree = 4**  
**Definitely Agree = 5**

1. TV programs are an important source of information about fashion and "being attractive." \_\_\_\_\_
2. I've felt pressure from TV or magazines to lose weight. \_\_\_\_\_
3. I do not care if my body looks like the body of people who are on TV. \_\_\_\_\_
4. I compare my body to the bodies of people who are on TV. \_\_\_\_\_
5. TV commercials are an important source of information about fashion and "being attractive." \_\_\_\_\_
6. I do not feel pressure from TV or magazines to look pretty. \_\_\_\_\_
7. I would like my body to look like the models who appear in magazines. \_\_\_\_\_
8. I compare my appearance to the appearance of TV and movie stars. \_\_\_\_\_
9. Music videos on TV are not an important source of information about fashion and "being attractive." \_\_\_\_\_
10. I've felt pressure from TV and magazines to be thin. \_\_\_\_\_
11. I would like my body to look like the people who are in movies. \_\_\_\_\_
12. I do not compare my body to the bodies of people who appear in magazines. \_\_\_\_\_
13. Magazine articles are not an important source of information about fashion and "being attractive." \_\_\_\_\_
14. I've felt pressure from TV or magazines to have a perfect body. \_\_\_\_\_
15. I wish I looked like the models in music videos. \_\_\_\_\_
16. I compare my appearance to the appearance of people in magazines. \_\_\_\_\_
17. Magazine advertisements are an important source of information about fashion and "being attractive." \_\_\_\_\_
18. I've felt pressure from TV or magazines to diet. \_\_\_\_\_
19. I do not wish to look as athletic as the people in magazines. \_\_\_\_\_

20. I compare my body to that of people in "good shape." \_\_\_\_\_
21. Pictures in magazines are an important source of information about fashion and "being attractive." \_\_\_\_\_
22. I've felt pressure from TV or magazines to exercise. \_\_\_\_\_
23. I wish I looked as athletic as sports stars. \_\_\_\_\_
24. I compare my body to that of people who are athletic. \_\_\_\_\_
25. Movies are an important source of information about fashion and "being attractive." \_\_\_\_\_
26. I've felt pressure from TV or magazines to change my appearance. \_\_\_\_\_
27. I do not try to look like the people on TV. \_\_\_\_\_
28. Movie stars are not an important source of information about fashion and "being attractive." \_\_\_\_\_
29. Famous people are an important source of information about fashion and "being attractive." \_\_\_\_\_
30. I try to look like sports athletes. \_\_\_\_\_

## Weight Bias Internalization Scale - Modified

Please answer the following questions using this scale:

1	2	3	4	5	6	7
Strongly disagree	Disagree	Slightly disagree	Neutral	Slightly agree	Agree	Strongly agree

- \_\_\_\_\_ 1. At my current weight, I feel that I am just as competent as anyone.
- \_\_\_\_\_ 2. I am less attractive than most other people because of my weight.
- \_\_\_\_\_ 3. I feel anxious about being at my current weight because of what people might think of me.
- \_\_\_\_\_ 4. I wish I could drastically change my weight.
- \_\_\_\_\_ 5. Whenever I think a lot about my weight, I feel depressed.
- \_\_\_\_\_ 6. I hate myself for being at my current weight.
- \_\_\_\_\_ 7. My weight is a major way that I judge my value as a person.
- \_\_\_\_\_ 8. I don't feel that I deserve to have a really fulfilling social life, as long as I'm at my current weight.
- \_\_\_\_\_ 9. I am OK being the weight that I am.
- \_\_\_\_\_ 10. Because I'm at my current weight, I don't feel like my true self.
- \_\_\_\_\_ 11. Because of my weight, I don't understand how anyone attractive would want to date me.

### Cognitive Distraction During Sexual Activity Scale

Please use the following scale to indicate how often you agree with each statement or how often you think it would be true for you. The term partner refers to someone with whom you are or would be romantic or sexually intimate. Sexual activity refers to mutual stimulation of genitals, oral sex, or sexual intercourse

1	2	3	4	5	6
Always	Usually	Often	Sometimes	Rarely	Never

- 1) During sexual activity, I am worried about how my body looks to my partner.
- 2) While engaged in sexual activity, I worry that my partner is *not* enjoying the way I am touching his body.
- 3) During sexual activity, I worry the whole time that my partner will get turned off by seeing my body without clothes.
- 4) It is difficult not to think about whether my movements during sexual activity are pleasing to my partner.
- 5) I can only quit worrying about how my body looks to my partner if it is dark during sexual activity.
- 6) I am usually worried about my partner's satisfaction with my actions while engaged in sexual activity.
- 7) During sexual activity, it is difficult not to think about how unattractive my body is.
- 8) I often worry about the way I am behaving toward my partner during sexual activity.
- 9) It is difficult to enjoy sex because of my concerns over how appealing my body is to my partner.
- 10) During sexual interactions, I am concerned that my level of activity is *not* satisfying my partner.
- 11) While nude in front of a partner, I can't help but think about how unattractive my body is.
- 12) While engaged in sexual activity with a partner, I think too much about the way I am moving.
- 13) During sexual activity, I am distracted by thoughts about how I look to my partner.
- 14) Thoughts about whether my actions are satisfying my partner distract me during sexual activity.
- 15) If the lights are on during sexual activity, I worry too much about how appealing my body is to my partner.
- 16) During sexual activity, I think too much about whether my partner is happy with the way I am touching his body.
- 17) During sexual activity, I can focus on my pleasure much more if I am in a position such that my partner cannot see my body.
- 18) While engaged in sexual activity, I am distracted by thoughts regarding what my partner thinks about my behaviour.
- 19) I can only quit worrying about how my body looks to my partner if there are covers over my body during sexual activity.
- 20) Overall, during sexual activity, I am distracted by thoughts about my sexual performance.

### Female Sexual Function Index

FSFI: These questions ask about your sexual feelings and responses **during the past 4 weeks**. Please answer the following questions as honestly as possible. In answering these questions the following definitions apply:

- **Sexual Activity** can include caressing, foreplay, masturbation, and vaginal intercourse
- **Sexual Intercourse** is defined as penile penetration (entry) of the vagina
- **Sexual Stimulation** includes situations like foreplay with a partner, self-stimulation (masturbation), or sexual fantasy

**Please check only one box per question.**

1. Over the past 4 weeks, how satisfied have you been with your overall sexual life?
  - a. Very satisfied
  - b. Moderately satisfied
  - c. About equally satisfied and dissatisfied
  - d. Moderately dissatisfied
  - e. Very dissatisfied

Sexual desire or interest is a feeling that includes wanting to have a sexual experience, feeling receptive to a partner's sexual initiation, and thinking or fantasizing about having sex.

2. Over the past 4 weeks, how often did you feel sexual desire or interest?
  - a. Almost always or always
  - b. Most times (more than half the time)
  - c. Sometimes (about half the time)
  - d. A few times (less than half the time)
  - e. Almost never or never
3. Over the past 4 weeks, how would you rate your level (degree) of sexual desire or interest?
  - a. Very high
  - b. High
  - c. Moderate
  - d. Low
  - e. Very low or none at all
4. Over the past 4 weeks, did you engage in sexual activity of any kind with a partner and/or by yourself (masturbation)?
  - a. Sexual activity with a partner only
  - b. Sexual activity by myself only
  - c. Sexual activity both with a partner and by myself
  - d. No sexual activity (neither with a partner nor by myself) → If NO SEXUAL ACTIVITY, please SKIP items #5-20 of this questionnaire.

Sexual arousal is a feeling that includes both physical and mental aspects of sexual excitement. It may include feelings of warmth or tingling in the genitals, lubrication (wetness), or muscle contractions.

5. Over the past 4 weeks, how often did you feel sexually aroused (“turned on”) during sexual activity or intercourse?
  - a. No sexual activity
  - b. Almost always or always
  - c. Most times (more than half the time)
  - d. Sometimes (about half the time)
  - e. A few times (less than half the time)
  - f. Almost never or never
  
6. Over the past 4 weeks, how would you rate your level of sexual arousal (“turn on”) during sexual activity or intercourse?
  - a. No sexual activity
  - b. Very high
  - c. High
  - d. Moderate
  - e. Low
  - f. Very low or none at all
  
7. Over the past 4 weeks, how confident were you about becoming sexually aroused during sexual activity or intercourse?
  - a. No sexual activity
  - b. Very high confidence
  - c. High confidence
  - d. Moderate confidence
  - e. Low confidence
  - f. Very low or no confidence
  
8. Over the past 4 weeks, how often have you been satisfied with your arousal (excitement) during sexual activity or intercourse?
  - a. No sexual activity
  - b. Almost always or always
  - c. Most times (more than half the time)
  - d. Sometimes (about half the time)
  - e. A few times (less than half the time)
  - f. Almost never or never
  
9. Over the past 4 weeks, how often did you become lubricated (“wet”) during sexual activity or intercourse?
  - a. No sexual activity
  - b. Almost always or always
  - c. Most times (more than half the time)

- d. Sometimes (about half the time)
  - e. A few times (less than half the time)
  - f. Almost never or never
10. Over the past 4 weeks, how difficult was it to become lubricated (“wet”) during sexual activity or intercourse?
- a. No sexual activity
  - b. Extremely difficult or impossible
  - c. Very difficult
  - d. Difficult
  - e. Slightly difficult
  - f. Not difficult
11. Over the past 4 weeks, how often did you maintain your lubrication (“wetness”) until completion of sexual activity or intercourse?
- a. No sexual activity
  - b. Almost always or always
  - c. Most times (more than half the time)
  - d. Sometimes (about half the time)
  - e. A few times (less than half the time)
  - f. Almost never or never
12. Over the past 4 weeks, how difficult was it to maintain your lubrication (“wetness”) until completion of sexual activity or intercourse?
- a. No sexual activity
  - b. Extremely difficult or impossible
  - c. Very difficult
  - d. Difficult
  - e. Slightly difficult
  - f. Not difficult
13. Over the past 4 weeks, when you had sexual stimulation or intercourse, how often did you reach orgasm (climax)?
- a. No sexual activity
  - b. Almost always or always
  - c. Most times (more than half the time)
  - d. Sometimes (about half the time)
  - e. A few times (less than half the time)
  - f. Almost never or never
14. Over the past 4 weeks, when you had sexual stimulation or intercourse, how difficult was it for you to reach orgasm (climax)?
- a. No sexual activity
  - b. Extremely difficult or impossible
  - c. Very difficult
  - d. Difficult

- e. Slightly difficult
  - f. Not difficult
15. Over the past 4 weeks, how satisfied were you with your ability to reach orgasm (climax) during sexual activity or intercourse?
- a. No sexual activity
  - b. Very satisfied
  - c. Moderately satisfied
  - d. About equally satisfied and dissatisfied
  - e. Moderately dissatisfied
  - f. Very dissatisfied
16. Over the past 4 weeks, how satisfied have you been with the amount of emotional closeness during sexual activity between you and your partner?
- a. No sexual activity
  - b. Very satisfied
  - c. Moderately satisfied
  - d. About equally satisfied and dissatisfied
  - e. Moderately dissatisfied
  - f. Very dissatisfied
17. Over the past 4 weeks, how satisfied have you been with your sexual relationship with your partner?
- a. No sexual partner
  - b. Very satisfied
  - c. Moderately satisfied
  - d. About equally satisfied and dissatisfied
  - e. Moderately dissatisfied
  - f. Very dissatisfied
18. Over the past 4 weeks, how often did you experience discomfort or pain during vaginal penetration?
- a. Did not attempt intercourse
  - b. Almost always or always
  - c. Most times (more than half the time)
  - d. Sometimes (about half the time)
  - e. A few times (less than half the time)
  - f. Almost never or never
19. Over the past 4 weeks, how often did you experience discomfort or pain following vaginal penetration?
- a. Did not attempt intercourse
  - b. Almost always or always
  - c. Most times (more than half the time)
  - d. Sometimes (about half the time)
  - e. A few times (less than half the time)



f. Almost never or never

20. Over the past 4 weeks, how would you rate your level (degree) of discomfort or pain during or following vaginal penetration?

- a. Did not attempt intercourse
- b. Very high
- c. High
- d. Moderate
- e. Low