

Body Image Self-Consciousness during Physical Intimacy and Sexual Dissatisfaction in Women: The Mediating Role of Sexual Self-Esteem

Master thesis

Previous research indicated that negative cognitions about one's physical appearance and self-consciousness during sexual activity are associated with greater sexual dissatisfaction. The present study investigated the mediating role of sexual self-esteem in the association between body image self-consciousness during physical intimacy and sexual dissatisfaction. In a cross-sectional design, 163 Dutch female university students completed an online survey measuring body image self-consciousness during physical intimacy, sexual dissatisfaction and sexual self-esteem. Results of a correlation analysis showed that higher levels of body image self-consciousness during physical intimacy was related to greater sexual dissatisfaction. A mediation analysis revealed that higher levels of body image self-consciousness during physical intimacy was associated with lower sexual self-esteem which, in turn, was associated with greater sexual dissatisfaction. Additionally, higher levels of body image self-consciousness during physical intimacy was directly related to greater sexual dissatisfaction. The results support the role of cognitive distraction based on appearance during sexual activities and confident in oneself as a sexual partner in predicting sexual dissatisfaction. Based on these findings, clinicians should assess body image self-consciousness in female patients with sexuality-related mental health issues, as well as sexual self-esteem to determine the best therapeutic intervention.

Keywords: body image self-consciousness during physical intimacy; sexual self-esteem; sexual dissatisfaction.

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Body image self-consciousness during physical intimacy and sexual dissatisfaction

Even though sexual health is increasingly recognized to be important to good overall health and well-being, sexual dissatisfaction is still common. Earlier research conducted in 27 countries has shown that more than half of all women (58%) are not fully satisfied with the quality of their sexual relationships (Mulhall, King, Glina, & Hvidsten, 2008). Sprecher, Cate, Harvey, and Wenzel (2004) defined sexual dissatisfaction as a degree to which an individual is dissatisfied or unhappy with the sexual aspect of her relationship. Sexual dissatisfaction is found to be negatively associated with overall well-being (e.g., Davison, Bell, LaChina, Holden & Davis, 2009; Hajivosough, Tavakolizadeh, Rajayi & Atarodi, 2012; Peleg-Sagy & Shahar, 2013), quality of life (e.g., Chao et al., 2011; Mohammed-Alizadeh-Charandabi, Mirghafourvand, Asghari-Jafarabadi, Tavananezhad & Karkhaneh, 2014), and relationship satisfaction (e.g., Henderson-King & Veroff, 1994; Sprecher, 2002). Since sexual dissatisfaction is significantly associated with overall quality of life, identifying determinants thereof is important in order to be able to formulate better psychological treatments.

As many women that undergo sex and couple therapy are struggling with their physical appearance (Wiederman, 2002), concerns about appearance might be one of the factors influencing sexual dissatisfaction. A process likely to be related to these concerns about appearance is called 'spectatoring', a term that was introduced by Masters and Johnson. Spectatoring is a cognitive process wherein individuals fixate on and monitor personal body parts and/or the adequacy of personal sexual functioning during sexual activity (Masters & Johnson, 1970). Spectatoring makes it difficult to focus on what is pleasurable and enjoyable about the sexual activity because it shifts one's attention to fixating on, monitoring and judging one's own body and sexual performance. Based on Masters and Johnson's work, Barlow suggested a working model of sexual dysfunction that is based on cognitive interference and anxiety. In this model, he argued that spectatoring individuals moved their attention from arousal, excitement, and gratification to the negative consequences of an expected sexual failure because of performance anxiety (Barlow, 1986). He suggested that a cognitive distraction interacting with anxiety is responsible for sexual dysfunction and specifically sexual dissatisfaction because of inhibited sexual excitement. Thus, in line with Masters and Johnson's perspective on 'spectatoring' and Barlow's (1986) model of anxious self-focus processes during sexual activity, concerns about bodily appearance tend to arise in situations where the body is on display or is the focus of an

activity and can distract actors from enjoying erotic sensations during sexual activity.

Previous empirical studies supported the relationship between cognitive distraction and sexual dissatisfaction (e.g., Beck, Barlow, & Sakheim, 1983; Sakheim, Barlow, Beck, & Abrahamson, 1984). However, the content of the cognitive distraction has not been distinguished in this early research. Dove and Wiederman (2000) were the first to make a distinction between performance-based cognitive distraction and appearance-based cognitive distraction. When studying performance-based cognitive distraction and appearance-based cognitive distraction separately, they found that both were positively related to sexual dissatisfaction. Based on their findings, researchers continued studying appearance-based cognitive distraction in relation to sexual experiences. In these studies, appearance-based cognitive distraction was mostly defined as body image self-consciousness during sexual activity or contextual body image during sexual activity (e.g., Carvalheira, Godinho, & Costa, 2016; Wiederman, 2000; Yamamiya, Cash, & Thompson, 2006). Body image self-consciousness during physical intimacy indicates an internalized process where people are consequently prone to heightened awareness of how one's own body appears to others (Dove & Wiederman, 2000).

Research supported the relationship between body image self-consciousness during physical intimacy and sexual dissatisfaction. Those who report greater body image self-consciousness during physical intimacy with a partner also report more problems with sexual pleasure (Wiederman, 2000). Another study showed that low esteem over one's physical appearance and high frequency of appearance-related thoughts during sexual activity predicted sexual dissatisfaction (Pujols, Meston, & Seal, 2010). Furthermore, greater body image self-consciousness during physical intimacy was linked with lower sexual self-efficacy, more ambivalence in sexual decision-making, and more emotional disengagement during sexual activities, implying that contextual body image is a predictor of women's sexual dissatisfaction. (Yamamiya et al., 2006).

In sum, theory and empirical studies have indicated that higher levels of body image self-consciousness during physical intimacy are associated with greater sexual dissatisfaction. However, less is known about how body image self-consciousness during physical intimacy affects sexual dissatisfaction. It is valuable to understand which factors impact the connections between body image self-consciousness during physical intimacy

and sexual dissatisfaction, so clinicians can assess the factors which have a substantial influence on sexual dissatisfaction.

Sexual self-esteem as mediator

A construct that explains body image self-consciousness is the objectification of the female body in Western culture. Objectification is the experience of being treated as a body, predominantly valued for one's usefulness to others (Fredrickson & Roberts, 1997). Moreover, objectification can lead to self-objectification, a process wherein women internalize the sexual objectification and start treating themselves as objects to be evaluated based upon bodily appearance. Self-objectification, in turn, leads to self-consciousness over their appearance and habitual body monitoring (Fredrickson & Roberts, 1997). In this regard, body image self-consciousness results in more insecurity about one's (sexual) attractiveness and therefore about oneself as a sexual partner. Body image self-consciousness during physical intimacy might lower sexual self-esteem, which in turn, affects sexual dissatisfaction. For example, women who are more aware of their appearance may feel less (sexually) attractive and confident as a sexual partner and, thus, may find less enjoyment in sexual activities. Therefore, sexual self-esteem might be an explaining factor for the relationship between body image self-consciousness during physical intimacy and sexual dissatisfaction.

Sexual self-esteem can be described as "the value one places on oneself as a sexual being" (Mayers, Heller, & Heller, 2003) or, alternatively, "positive regard for and confidence in the capacity to experience one's sexuality in a satisfying and enjoyable way" (Snell & Papini, 1989). Furthermore, sexual self-esteem can refer to self-evaluation as a sexual partner in relation to others (Wiederman & Allgeier, 1993) or include aspects of one's own sexuality (Mayers et al., 2003; Rosenthal, Moore, & Flynn, 1991). Body image self-consciousness during physical intimacy was found to be negatively associated with sexual self-esteem (Wiederman, 2000; Wiederman & Dove, 2002) In other words, cognitive distractions due to preoccupation with their own physical appearance during sexual activity is associated with lower sexual self-esteem. These findings suggest that women's self-consciousness about their physical appearance during sexual activities affects their sexual self-esteem.

Sexual self-esteem, in turn, has been linked to have a connection with sexual

dissatisfaction (e.g., Ménard & Offman, 2009; Schick, Calabrese, Rima & Zucker, 2010 ; Hally & Pollack, 1993) , with lower levels of sexual self-esteem being related to higher levels of sexual dissatisfaction. Women's cognitive preoccupation with the appearance of their bodies during sexual activity may compromise the quality of their sexual experiences indirectly by impeding their sexual self-esteem, suggesting a mediating role of sexual self-esteem.

To summarize, previous studies have found important associations between body image self-consciousness during physical intimacy, sexual self-esteem and sexual dissatisfaction. Previous study results also suggest that body image self-consciousness during physical intimacy and sexual dissatisfaction may be linked via sexual self-esteem. However, no study has been conducted to determine this indirect link. A better understanding of the determinants of sexual dissatisfaction is important in selecting the appropriate targets for treatment intervention in the context of sexual problems, as well as improving women's sexual health and well-being.

The present study

The present study focuses on the relationship between body image self-consciousness during physical intimacy and sexual dissatisfaction in women.

Based on the associations between body image self-consciousness during physical intimacy, sexual self-esteem and sexual dissatisfaction found in previous studies (e.g., Wiederman, 2000; Wiederman, 2002), it is expected that greater body image self-consciousness during physical intimacy and lower sexual self-esteem will be associated with higher levels of sexual dissatisfaction.

Additionally, based on previous findings (e.g., Wiederman & Dove, 2000), it is expected that sexual self-esteem will mediate the relationships between body image self-consciousness during physical intimacy and sexual dissatisfaction. More specifically, it is expected that higher levels of body image self-consciousness during physical intimacy will be associated with lower levels of sexual self-esteem, which in turn, will be associated with higher levels of sexual dissatisfaction.

These proposed hypotheses are summarized schematically in Figure 1.



Figure 1. Schematic summary of the hypothesized links between body image self-consciousness during physical intimacy with sexual dissatisfaction and the mediating role of sexual self-esteem.

Method

Procedure and participants

Present study invited female students, who have had at least one sexual partner in their lifetime, to take part in an online study. The online study was created with LimeSurvey. Participants were recruited through social media, flyers and the students' website of Utrecht University. Interested females could access the online study via a link to the online address (URL).

The study started with an informed consent form were voluntary participation and anonymity was highlighted. After agreeing with the informed consent seven demographic questions followed, including questions about age, educational level, height, weight, presence of romantic relationship, duration of the romantic relationship and sexual orientation. The demographic questions were followed by questionnaires about body self-consciousness during physical intimacy, sexual self-esteem and sexual satisfaction. It took, approximately, 45 minutes to complete the questionnaires. Students of the University of Utrecht received course credit for their participation. Other participants were not compensated for their participation.

A total of 163 females completed the questionnaire. Three participants were

excluded out of this study. One participants' age was 60, but since only female students were asked to take part of this study, it was decided to exclude this participant. Furthermore, there were two participants with an invalid answer (length in cm: 2 and weight in kg: 168). Participants' age ranged from 18 to 31 years with a mean age of $M=21.56$ years ($SD=2.195$). The average Body Mass Index was 22.63 ($SD= 3.41$). Most participants (90,8%) have been in a relationship at least once and 63,8% of the participants is currently in a relationship. The duration of the relationship was less than one month in 3.8 % ($n= 4$), between one and six months in 7.7 % ($n= 8$), between six and twelve months in 8.7 % ($n= 9$), between one and two years in 32.7 % ($n= 34$), and longer than two years in 47.1 % ($n= 49$) of these participants. Highest level of education (completed or current) was higher secondary school in 26.4 % ($n = 43$), lower vocational education in 3.7 % ($n = 6$), higher vocational education in 13.5 % ($n = 22$), and university in 56.4 % ($n = 92$) of the participants.

Measures

Body image self-consciousness during physical intimacy. Body image self-consciousness during physical intimacy was measured using the Dutch version (Van den Brink, Smeets, Hessen, Talens, & Woertman, 2013) of the body image self-consciousness scale (BISC; Wiederman, 2000). The 15-items scale measures self-consciousness over one's bodily appearance (e.g., 'The worst part of having sex is being nude in front of another person'). The items were answered on a 6-point Likert scale ranging from 1= never to 6= always. Items were averaged with higher scores indicating higher body self-consciousness during physical intimacy. The BISC has a high reliability ($\alpha=.94$) and validity (Wiederman, 2000). The Cronbach's alpha in present study was $\alpha=.90$.

Sexual self-esteem. The Dutch version (Van den Brink et al., 2013) of the Sexual Esteem Scale (SES; Snell & Papini, 1989) was used to assess sexual self-esteem. The SES consists of ten items (e.g., 'I am a good sexual partner'), including five reverse-keyed items. Responses were made on a 5-point Likert-type scale ranging from 1=definitely disagree to 5=definitely agree. Higher scores indicated more sexual self-esteem. The scale is found to be reliable with $\alpha = .92$ (Snell & Papini, 1989). The Cronbach's alpha in present study was $\alpha=.94$.

Sexual dissatisfaction. Sexual dissatisfaction was measured using the Dutch version (Schlaman, 2015) of the New Sexual Satisfaction Scale-Short (NSSS-s; Štulhofer, Buško, & Brouillard, 2011). The NSSS-s consists of 12 items that evaluated aspects including intensity

of self and partner's orgasms, sexual variety, and emotional openness. Participants were asked to rate their satisfaction with aspects of their sexual relationship (e.g., 'The quality of my orgasms') on a five-point Likert-scale ranging from 1=not at all satisfied to 5=extremely satisfied. Items were recoded and averaged so that higher scores indicated more sexual dissatisfaction. Štulhofer, Buško, & Brouillard (2010) reported high reliability ($\alpha = .90$) and validity. In this study, Cronbach's alpha was $\alpha = .95$.

Statistical analysis

All statistical analyses were performed with IBM SPSS Statistics Version 24.

In a first step, bivariate associations between the study variables (body image self-consciousness during physical intimacy, sexual self-esteem, and sexual dissatisfaction) were analysed by coefficients of Pearson correlation analyses.

In a second step, the mediation analysis with body image self-consciousness during physical intimacy as independent variable, sexual self-esteem as mediator, and sexual dissatisfaction as dependent variable was conducted by using process-macro for SPSS (Hayes & Preacher, 2014). Model 4 (Hayes, 2013) was used to estimate the total, direct and indirect effects of body image self-consciousness during physical intimacy on sexual dissatisfaction. The *total* effect refers to the relationship between body image self-consciousness during physical intimacy and sexual dissatisfaction. The *direct* effect refers to the association between body image self-consciousness during physical intimacy and sexual dissatisfaction while controlling for sexual self-esteem. The *indirect* effect refers to the relationship between body image self-consciousness during physical intimacy and sexual dissatisfaction through sexual self-esteem. The total and direct effects were estimated by means of a stepwise multiple regression analysis in which body image self-consciousness during physical intimacy was entered in the first and sexual self-esteem was entered in the second step. The indirect effect was estimated using bootstrap analysis with 5000 bootstrap samples. The significance of the indirect effect (i.e., the mediating role of sexual self-esteem) was based on bias-corrected 95% confidence intervals (BCa 95% CI). The absence of value 0 within the confidence intervals indicates the existence of the indirect effect. All coefficients will be reported in standardized form.

Results

Bivariate associations between body image self-consciousness during physical intimacy, sexual self-esteem, and sexual dissatisfaction

Means, standard deviations, and correlations between study variables are shown in Table 1. As expected, body image self-consciousness during physical intimacy as well as sexual self-esteem were significantly related to greater sexual dissatisfaction. Also higher levels on the body image self-consciousness scale were related to lower levels on the sexual self-esteem scale. Sexual self-esteem was related to higher sexual dissatisfaction.

Table 1. Means, Standard Deviations, and bivariate correlations between body image self-consciousness during physical intimacy, sexual self-esteem, and sexual dissatisfaction (N =163)

	1	2	3	M	SD
1. Body image self-consciousness during physical intimacy	-	-.45**	.36**	1.66	.97
2. Sexual self-esteem		-	-.51**	3,27	.87
3. Sexual dissatisfaction			-	2,70	.71

Note. ** $p < .001$.

Total, direct and indirect effects through sexual self-esteem of body image self-consciousness during physical intimacy on sexual dissatisfaction

Table 2 presents the results from the stepwise multiple regression analysis. A significant total effect (step 1) and a significant direct effect (step 2) of body image self-consciousness during physical intimacy on sexual dissatisfaction was found. Additionally, the analysis showed a significant direct effect (step 2) of sexual self-esteem on sexual dissatisfaction.

Furthermore, the bootstrap analyses revealed an indirect effect of body image self-consciousness during physical intimacy on sexual dissatisfaction via sexual self-esteem (completely standardized effect size = .19, BCa 95% CI [.077, .223]). Thus, as expected, greater body image self-consciousness during physical intimacy was related to lower sexual self-esteem, which in turn, was related to greater sexual dissatisfaction.

Table 2. Results of the stepwise regression analysis with sexual dissatisfaction as outcome: Total and direct effects of body image self-consciousness during physical intimacy on sexual dissatisfaction

Predictors	β step 1	β step 2
Step 1: adj. $R^2 = .12$, $F(1,161) = 23.30^{**}$		
Body image self-consciousness during physical intimacy	.26**	.12*
Step 2: $\Delta R^2 = .15$, $F(1,160) = 34.43^*$, adj. $R^2 = .27$, $F(2,160) = 31.28^{**}$		
Sexual self-esteem		.36**

Note. β 's in step 1 represent total effects of body image self-consciousness during physical intimacy on sexual dissatisfaction. β 's in step 2 represent direct effects of body image self-consciousness during physical intimacy on sexual dissatisfaction.

** $p < .001$, * $p < .05$

Discussion

The general objective of the present study was to examine the relationships between body image self-consciousness during physical intimacy, sexual self-esteem and sexual satisfaction. In particular, the potential mediating role of sexual self-esteem in the relationship between body image self-consciousness during physical intimacy and sexual dissatisfaction was assessed.

As expected, body self-consciousness during physical intimacy was found to be associated with sexual dissatisfaction. This finding is in line with Masters and Johnson's perspective on 'spectatoring', Barlow's model of anxious self-focus processes during sexual activity, and previous research (e.g., Pujols et al., 2010; Yamamiya et al., 2006; Wiederman, 2000). The results of the correlation analyses showed that higher levels of body image self-consciousness during physical intimacy were significantly related to greater sexual dissatisfaction. Thus, women who focus their attention on their physical appearance during sexual activity are likely to be distracted from erotic cues and therefore more prone having negative sexual experiences. The results of the present study underline the importance of context specificity in studying appearance based cognitive distraction in relation to sexual experience. Furthermore, the results of the present study support and extend extant evidence for the relationship between body image self-consciousness during physical intimacy and sexual dissatisfaction.

Secondly, a significant negative association was found between sexual self-esteem and sexual dissatisfaction. Lower levels of sexual self-esteem were related to higher levels of sexual dissatisfaction. This is in line with the hypothesis and results of prior studies (Ménard & Offman, 2009; Schick et al., 2010; Hally & Pollack, 1993). These findings suggest that confidence in oneself as a sexual entity influences sexual experiences and thus is an important determinant influencing sexual dissatisfaction.

Most importantly, this study hypothesized that sexual self-esteem is an explaining variable in the relationship between body image self-consciousness during physical intimacy and sexual dissatisfaction. In accordance with the hypothesis, the mediation analyses revealed a significant indirect effect of body image self-consciousness during physical intimacy on sexual dissatisfaction through sexual self-esteem. This implies that a heightened awareness of how one's own body appears to others during sexually intimate situations, instigates a decrease in sexual self-esteem, which, in turn, leads to greater sexual dissatisfaction. This is in line with the objectification theory, wherein women are socialized to believe that to be an adequate sex partner, one must conform to societal norms regarding physical attractiveness and what is considered "sexy." (Dove & Wiederman, 2000). Women may believe that being attractive equates to being a good sexual partner. Herein, being attractive and engaging a visual stimulus equates to performing well as a sexual partner. Women who reported higher levels of body image self-consciousness during physical intimacy may view themselves as less desirable as a sexual partner (i.e., demonstrate low sexual self-esteem). It might be possible that women who did not consider themselves as attractive, reported lower sexual self-esteem because they viewed their sexual performance negatively. This, in turn, may be caused by their own belief that they did not fit the stereotype of what makes a woman "sexy". However, this explanation remains hypothetical needing further investigation.

Overall, the findings indicate that body image self-consciousness is linked to sexual dissatisfaction in women. Moreover, sexual self-esteem was found to have a significant mediation effect on the relationship between body image self-consciousness during physical intimacy and sexual dissatisfaction. Since a large number of women are not (fully) satisfied with their sex life (Mulhall et al., 2008) and sexual dissatisfaction is related to quality of life, well-being, and relationship satisfaction (e.g., Chao et al., 2011; Davison et al., 2009; Sprecher, 2002), identifying determinants of sexual dissatisfaction can help in understanding

and treating problems related to sexuality. The findings of this study might have important clinical implications. For example, clinicians should assess body image self-consciousness in female patients with sexuality-related mental health issues, as well as sexual self-esteem to determine the best therapeutic intervention. Such interventions, for example, might focus on body image or attention techniques. Such an approach is supported by the finding that cognitive behavioural therapy was found to lower body image concerns in sexual contexts (Grant & Cash, 1995), and led to improved evaluations of sexuality (Butters & Cash, 1987).

Limitations

This study comprises some limitations. Given the cross-correlational design of this study, causality cannot be conclusive. Even though other mediation models are theoretically less plausible, the direction of the study variables might be reversed. For example, it is possible that women who reported higher levels of body image self-consciousness during physical intimacy have resulting higher sexual dissatisfaction. On the other hand, women who are initially less satisfied with their sex lives are more likely to be distracted as a result. Additionally, greater body image self-consciousness might cause lower sexual self-esteem. However, it is also assumable that insecurity in oneself as a sexual partner leads to more awareness of how one's body appears to others during sexual activity. Further research is needed to determine the directionality of the relationship between body image self-consciousness during physical, sexual self-esteem and sexual dissatisfaction.

Another limitation of the study was the homogeneity of the present sample. The sample consisted of primarily highly educated young women. Results of this study may not be representative for the general Dutch population of women. A more heterogeneous sample would be beneficial in future research on body image self-consciousness during physical intimacy and sexual self-esteem on sexual dissatisfaction.

Lastly, although online studies offer many advantages (i.e., ease of data gathering, minimal costs), there are also disadvantages that should be considered. One of the most important disadvantages of online studies is the absence of an interviewer. The absence of an interviewer might have led to less reliable data because uncertainties couldn't be clarified.

Conclusion

To conclude, this study adds to the literature by targeting relationships between body image self-consciousness during physical intimacy, sexual self-esteem and sexual dissatisfaction. Given the fact that body image self-consciousness during physical intimacy and sexual self-esteem are related to sexual dissatisfaction, it is important to further study causality of these variables. Understanding how body image self-consciousness during physical intimacy associates to sexual dissatisfaction will be valuable in selecting the appropriate targets for treatment intervention and thereby improve woman's overall well-being.

References

- Beck, J. G., Barlow, D. H., & Sakheim, D. K. (1983). The effects of attentional focus and partner arousal on sexual responding in functional and dysfunctional men. *Behaviour Research and Therapy*, 21(1), 1-8.
- Carvalho, A., Godinho, L., & Costa, P. (2017). The impact of body dissatisfaction on distressing sexual difficulties among men and women: the mediator role of cognitive distraction. *The Journal of Sex Research*, 54(3), 331-340.
- Chao, J.-K., Lin, Y.-C., Ma, M.-C., Lai, C.-J., Ku, Y.-C., Kuo, W.-H., & Chao, I.-C. (2011). Relationship among sexual desire, sexual satisfaction, and quality of life in middle-aged and older adults. *Journal of Sex & Marital Therapy*, 37, 386–403. doi:10.1080/0092623X.2011.607051
- Davison, S. L., Bell, R. J., LaChina, M., Holden, S. L., & Davis, S. R. (2009). The relationship between self-reported sexual satisfaction and general well-being in women. *The Journal of Sexual Medicine*, 6, 2690-2697. doi: 10.1111/j.1743-6109.2009.01406.x.
- Fredrickson, B. L., & Roberts, T. A. (1997). Objectification theory: Toward understanding women's lived experiences and mental health risks. *Psychology of women quarterly*, 21(2), 173-206.
- Hajivosough, N. S., Tavakolizadeh, J., Rajayi, A., & Atarodi, A. (2012). The Effect of Cognitive-Behavioral Teaching on Improvement of Women's Sexual Function with Hypoactive Sexual Desire Disorder. *Zahedan Journal of Research in Medical Sciences*, 14(10), 100-102.
- Hally, C. R., & Pollack, R. (1993). The effects of self-esteem, variety of sexual experience, and erotophilia on sexual satisfaction in sexually active heterosexuals. *Journal of Sex Education and Therapy*, 19(3), 183-192.
- Hayes, A. F. (2013). Introduction to mediation, moderation, and conditional process analysis: A regression-based approach. New York: Guilford Press.
- Hayes, A. F., & Preacher, K. J. (2014). Statistical mediation analysis with a multicategorical independent variable. *British Journal of Mathematical and Statistical Psychology*, 67, 451-470. doi:10.1111/bmsp.12028
- Henderson-King, D. H., & Veroff, J. (1994). Sexual satisfaction and marital well-being in the first years of marriage. *Journal of Social and Personal Relationships*, 11, 509–534. doi:

10.1177/0265407594114002

- L. Dove, Michael W. Wiederman, N. (2000). Cognitive distraction and women's sexual functioning. *Journal of Sex & Marital Therapy*, 26(1), 67-78.
- Masters, W., and Johnson, V. (1970). *Human Sexual Inadequacy*, Little, Brown, Boston, MA.
- Orbach, S. (1978). *Fat is a Feminist Issue*, Berkeley, New York.
- Mayers, K. S., Heller, D. K., & Heller, J. A. (2003). Damaged sexual self-esteem: A kind of disability. *Sexuality and Disability*, 21(4), 269-282.
- Ménard, A. D., & Offman, A. (2009). The interrelationships between sexual self-esteem, sexual assertiveness and sexual satisfaction. *The Canadian Journal of Human Sexuality*, 18(1/2), 35.
- Mohammad-Alizadeh-Charandabi, S., Mirghafourvand, M., Asghari-Jafarabadi, M., Tavananezhad, N., & Karkhaneh, M. (2014). Modeling of socio-demographic predictors of sexual function in women of reproductive age. *Journal of Mazandaran University of Medical Sciences*, 23(110), 237-242.
- Mulhall, J., King, R., Glina, S., & Hvidsten, K. (2008). Importance of and satisfaction with sex among men and women worldwide: Results of the global better sex survey. *Journal of Sexual Medicine*, 5, 788-795. doi:10.1111/j.1743-6109.2007.00765.x
- Nederlands vertaling items (Van den Brink, F., Smeets, M. A. M., Hessen, D. J., Talens, J. G., & Woertman, L. (2012). Body satisfaction and sexual health in Dutch female university students. *Journal of Sex Research*, 50, 786-794.)
- Peleg-Sagy, T., & Shahar, G. (2013). The prospective associations between depression and sexual satisfaction among female medical students. *The journal of sexual medicine*, 10(7), 1737-1743.
- Pujols, Y., Meston, C. M., & Seal, B. N. (2010). The association between sexual satisfaction and body image in women. *The journal of sexual medicine*, 7(2pt2), 905-916.
- Rosenthal, D., Moore, S., & Flynn, I. (1991). Adolescent self-efficacy, self-esteem and sexual risk-taking. *Journal of community & Applied social psychology*, 1(2), 77-88.
- Sakheim, D. K., Barlow, D. H., Beck, J. G., & Abrahamson, D. J. (1984). The effect of an increased awareness of erectile cues on sexual arousal. *Behaviour Research and Therapy*, 22(2), 151-158.
- Schick, V. R., Calabrese, S. K., Rima, B. N., & Zucker, A. N. (2010). Genital appearance dissatisfaction: Implications for women's genital image self-consciousness, sexual

- esteem, sexual satisfaction, and sexual risk. *Psychology of Women Quarterly*, 34(3), 394-404.
- Schlaman, K. J. T. (2016). *Hoe tevreden ben jij in je relatie?* (Master's thesis).
- Snell Jr, W. E., & Papini, D. R. (1989). The Sexuality Scale: An instrument to measure sexual-esteem, sexual-depression, and sexual-preoccupation.
- Sprecher, S. (2002). Sexual satisfaction in premarital relationships: Associations with satisfaction, love, commitment, and stability. *Journal of sex research*, 39(3), 190-196.
- Sprecher, S., Cate, R. M., Harvey, J. H., & Wenzel, A. (2004). Sexual satisfaction and sexual expression as predictors of relationship satisfaction and stability. *The handbook of sexuality in close relationships*, 235-256.
- Štulhofer, A., Buško, V., & Brouillard, P. (2010). Development and bicultural validation of the new sexual satisfaction scale. *Journal of Sex Research*, 47, 257-268.
doi:10.1080/00224490903100561
- Štulhofer, A., Buško, V., & Brouillard, P. (2011). The new sexual satisfaction scale and its short form. In T. D. Fisher, C. M. Davis, W. L. Yarber, & S.L. Davis (Eds.), *Handbook of sexuality-related measures* (3rd ed., pp. 530–532). New York, NY: Routledge.
- van den Brink, F., Smeets, M. A., Hessen, D. J., Talens, J. G., & Woertman, L. (2013). Body satisfaction and sexual health in Dutch female university students. *Journal of sex research*, 50(8), 786-794.
- Wiederman, M. W. (2000). Women's body image self-consciousness during physical intimacy with a partner. *Journal of Sex Research*, 37(1), 60-68.
- Wiederman, M. W. (2002). Body image and sexual functioning. *Body image: A handbook of theory, research, and clinical practice*, 287-294.
- Wiederman, M. W., & Allgeier, E. R. (1993). The measurement of sexual-esteem: Investigation of Snell and Papini's (1989) Sexuality Scale. *Journal of Research in Personality*, 27(1), 88-102.
- Yamamiya, Y., Cash, T. F., & Thompson, J. K. (2006). Sexual experiences among college women: The differential effects of general versus contextual body images on sexuality. *Sex Roles*, 55(5-6), 421-427.