

Contents lists available at ScienceDirect

Eating Behaviors



What factors mediate the relationship between global self-worth and weight and shape concerns?



Edel Murphy ^a, Barbara Dooley ^{b,*}, Aoife Menton ^c, Louise Dolphin ^d

- ^a School of Psychology, University College Dublin, Belfield, Dublin 4, Ireland
- ^b School of Psychology, F202 Newman Building, University College Dublin, Belfield, Dublin 4, Ireland
- ^c Enable Ireland, Sandymount Avenue, Dublin 4, Ireland
- ^d School of Psychology, Newman Building, University College Dublin, Belfield, Dublin 4, Ireland

ARTICLE INFO

Article history: Received 13 July 2015 Received in revised form 22 December 2015 Accepted 19 January 2016 Available online 26 January 2016

Keywords: Global self-worth Shape concerns Weight concerns Mediation analysis

ABSTRACT

The primary aim of this study was to investigate whether the relationship between global self-worth and weight concerns and global self-worth and shape concerns was mediated by pertinent body image factors, while controlling for gender and estimated BMI. Participants were 775 adolescents (56% male) aged 12–18 years (M=14.6; SD=1.50). Mediation analysis revealed a direct and a mediated effect between global self-worth and two body image models: 1) weight concerns and 2) shape concerns. The strongest mediators in both models were physical appearance, restrained eating, and depression. Partial mediation was observed for both models, indicating that body image factors which span cognitive, affective, and behavioral constructs, explain the association between global self-worth and weight and shape concerns. Implications for future research, weight and shape concern prevention and global self-worth enhancement programs are discussed.

© 2016 Elsevier Ltd. All rights reserved.

1. Introduction

Body image is an umbrella term used to define an individual's thoughts and feelings about his/her appearance (Thompson, Burke, & Krawczyk, 2012). One element of body image is an individual's body image satisfaction/dissatisfaction (Thompson et al., 2012). Body image dissatisfaction is strongly related to global self-worth (GSW), also referred to as self-esteem (Crocker & Wolfe, 2001). Adolescence is a critical developmental period; the 12–18 year old age profile has been identified as most at risk of disordered body image thoughts, feelings and behaviors (Bearman, Martinez, Stice, & Presnell, 2006) While numerous studies have highlighted the relationship between GSW and body image dissatisfaction (Davison & McCabe, 2006; van den Berg, Mond, Eisenberg, Ackard, & Neumark-Sztainer, 2010), a cogent understanding of the factors that mediate the link, has not yet emerged (Mooney, Farley, & Strugnell, 2010). Although numerous univariate regression body image models have been assessed (e.g. Mäkinen, Puukko-Viertomies, Lindberg, Siimes, & Aalberg, 2012), this study suggests a more complex model that provides the possibility to study a range of body image factors within a common framework (rather than the more simplistic analyses reported in previous studies).

This study will consider relevant factors which span cognitive, affective, and behavioral constructs previously identified in the body

E-mail addresses: edel.murphy.2@gmail.com (E. Murphy), barbara.dooley@ucd.ie (B. Dooley), aoifementon@gmail.com (A. Menton), louise.dolphin@ucd.ie (L. Dolphin).

dissatisfaction literature. The factors included in the current paper are hypothesized to mediate the relationship between GSW and body image dissatisfaction (outcome variable). Body image dissatisfaction will be conceptualized as (and hereafter referred to as) weight and shape concerns (WSC; Thompson et al., 2012). This study is novel in its approach; no other study has used such a diverse range of mediators to investigate the association between GSW and WSC. By knowing which risk factors are the strongest contributors to WSC the effectiveness of interventions designed to prevent WSC and enhance GSW in adolescents can be significantly increased.

1.1. Mediator variables

Adolescents' physical appearance schema, defined as 'the cognitive structures that people use to process information about their physical appearance', is the most significant aspect of their self-concept in terms of judging feelings of GSW (Cash & Labarge, 1996; Garner & Bemis, 1982). Therefore, research is warranted to investigate whether physical appearance schema is also a buffering factor in protecting individuals with low GSW from WSC. In addition, emotional eating has been identified as an important factor in understanding the relationship between GSW and WSC. Johnson and Wardle (2005) found that emotional eating and self-esteem are strongly associated with body dissatisfaction among adolescent girls. However, whether emotional eating mediates the relationship between GSW and WSC requires examination.

WSC are associated with negative psychological outcomes including depression (Cash, 2002). However, low self-worth is also identified as a

^{*} Corresponding author.

significant risk factor for depression (Orth, Robins, Widaman, & Conger, 2014), as identified by Beck's (1987) depression vulnerability model. Specifically, adolescents report feelings of low self-worth preceding depression related emotions of shame and guilt (Harter & Jackson, 1993). Thus, the relationship between GSW, WSC and depression for adolescents requires clarification.

It has also been identified that part of GSW is constructed based on romantic appeal, such that individuals derive some of their GSW from the *feeling* of being desired romantically by others (Murray, Griffin, Rose, & Bellavia, 2003). WSC are driven in part by desire to appeal to potential romantic partners (Erikson, 1968). However, the association between romantic appeal and GSW is not clear-cut. Further research is necessary.

The restriction of calories to control body weight is associated with WSC (Anschutz, van Strien, & Engels, 2008). This relationship is contingent on feelings of GSW (Kong et al., 2013). In fact, low GSW seems to be an antecedent to an eating pathology (Johnson, Pratt, & Wardle, 2012). Adolescents with low GSW often report high WSC; this can be coupled with high engagement in harmful restrained eating behaviors (Hoffmeister, Teige-Mocigemba, Blechert, Klauer, & Tuschen-Caffier, 2010). Thus WSC, restrained eating and GSW are complexly interrelated. WSC are also associated with dysfunctional body change behaviors, such as dieting behaviors (Neumark-Sztainer, Wall, Story, & Standish, 2012). Numerous studies have found that GSW is a strong factor differentiating adolescents who engage in unhealthy weight control practices from those who do not (Croll, Neumark-Sztainer, Story, & Ireland, 2002). Although Williamson et al. (2007), argue that the concepts restrained eating and dieting behaviors overlap, they have been identified as distinct concepts that relate differently to eating behavior (Guerrieri, Nederkoorn, Schrooten, Martijn, & Jansen, 2009). One important distinction between these factors appears to be the *purpose* of restricting caloric intake vis. to avoid gaining as opposed to losing weight (Lowe, Sapna, Katterman, & Feig, 2013). In sum, the six mediators we are interested in in this study are physical appearance schema, emotional eating, depression, romantic appeal, restrained eating and dieting behavior.

1.2. Demographic factors

Adolescent females consistently demonstrate lower GSW and higher WSC than males (Buchanan, Bluestein, Nappa, Woods, & Depatie, 2013; von Soest & Wichstrøm, 2009). Although GSW has been found to decrease during adolescence (Mäkinen et al., 2012), a comprehensive understanding of adolescent body image concerns over time has not emerged. Empirical evidence suggests that WSC increase (e.g., Bearman et al., 2006), decrease (e.g. Eisenberg, Neumark-Sztainer, & Paxton, 2006) or remain stable (von Soest & Wichstrøm, 2009) during adolescence. High estimated BMI has consistently been linked with low GSW (Quick, Eisenberg, Bucchianeri, & Neumark-Sztainer, 2013) and WSC (Mäkinen et al., 2012).

1.3. The present research

The first goal of the current research is to understand how gender, age and estimated BMI influence GSW, WSC and the following factors previously identified as important: physical appearance schema, emotional eating, depression, romantic appeal, restrained eating and dieting behavior, within a 12–18 year old age cohort. The second and central aim is to test a model of body image factors that mediate the relationship between GSW and WSC. It is hypothesized that there will be a direct relationship between GSW and WSC. However, it is hypothesized that this relationship will be mediated by physical appearance schema, emotional eating, depression, romantic appeal, restrained eating and dieting behavior.

This study is novel; it suggests a complex model that allows for the inclusion of relevant factors, which span cognitive, affective, and behavioral constructs, within a common framework. While many previous

studies have used samples of undergraduate psychology students (e.g. Jones, Crowther, & Ciesla, 2014), WSC tend to emerge during adolescence (Bearman et al., 2006). Thus, we employ a more appropriate age cohort (12–18 year olds).

2. Method

2.1. Design

The present study uses quantitative data archived in the authors' institution. This study has two analysis designs. Part A is a natural groups design where independent variables were gender (K=2; males, females), age (K=2; 12–15 year olds, 16–18 year olds, dichotomized to reflect the two academic cycles in the Irish second level education system) and estimated BMI (K=3; underweight, normal weight and overweight). Part B is a correlational design (mediation model) where the following factors: physical appearance, emotional eating, depression, romantic appeal, restrained eating, and dieting behaviors were used as mediators in the association between global self-worth (GSW) and weight and shape concerns (WSC).

2.2. Participants and recruitment

Participants were 775 adolescents aged 12–18 years (433 male). The mean age was 14.6 years (SD=1.50) (12–15 years old n=558; 16–18 years old n=212). Participants were recruited from randomly selected second level schools in the greater Dublin area, stratified according to size of school, gender mix and socio-economic status.

2.3. Measures

2.3.1. Demographic profile

Gender and age were reported by participants.

2.3.2. BMI

Age and gender adjusted Body Mass Index (BMI; Centers for Disease Control and Prevention, 2000) was recorded using self-report height and weight data in line with guidelines established for age- and gender-adjusted BMI levels (www.cdc.gov/growthcharts/). Based on these guidelines, 23.5% (n=157) of participants were classified as underweight, 48.4% (n=323) as normal weight and 28% as overweight (n=187).

GSW was measured using the global self-worth subscale of the Self Perception Profile for Adolescents—Revised (SPPA-R; Wichstrøm, 1995). This subscale consists of 5 items and higher scores are indicative of higher self-worth. Statements include "I don't like the way I am leading my life". Wichstrøm (1995) reported good psychometric properties for this scale and high internal consistency with an adolescent sample ($\alpha=0.77$). Cronbach's α was 0.82 for this sample.

WSC were measured using subscales of the Eating Disorder Examination Questionnaire (EDE-Q; Fairburn & Beglin, 1994). For both subscales, higher scores are indicative of greater severity/frequency of disordered eating. The weight and shape concern subscales have displayed excellent validity, test–retest reliability (2-weeks) (0.81–0.94) and good internal consistency with a community sample of adolescents ($\alpha=0.90$ and $\alpha=0.80$ respectively; Machato et al., 2014; Rø, Reas, & Lask, 2010). For this sample, Cronbach's α was 0.87 (weight concern) and 0.90 (shape concern).

Physical appearance schema was assessed using the SPPA-R physical appearance subscale (Wichstrøm, 1995). This subscale consists of 5 items, e.g. "I think that I am good looking". Higher scores are indicative of higher concern. This measure has been well validated (Rose, Hands, & Larkin, 2012). Luce and Crowther (1999) report good internal consistency with an adolescent sample ($\alpha=0.87$). Internal consistency was also high in this sample ($\alpha=0.87$). The DEBQ emotional eating subscale

Download English Version:

https://daneshyari.com/en/article/906245

Download Persian Version:

https://daneshyari.com/article/906245

Daneshyari.com