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1 The relationships between parental conditional regard and adolescents' self-critical and  
2 narcissistic perfectionism

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## Abstract

Studies show that the development of perfectionism in adolescence is associated with psychologically controlling parenting. The current study extends research in this area by examining the relationship between a specific aspect of psychologically controlling parenting, parental conditional regard, and two dimensions of perfectionism, self-critical perfectionism and narcissistic perfectionism. Three hundred and sixteen adolescents ( $M$  age = 15.69 years,  $s = 1.23$ ) completed a standardised questionnaire. Structural equation modelling revealed that both self-critical perfectionism and narcissistic perfectionism were positively predicted by parental conditional regard. Our findings are the first to suggest that parent socialization characterised by guilt inducement and love withdrawal may be common to the development of these two distinct dimensions of perfectionism.

1           Research suggests that perfectionism is associated with a range of psychological and  
2 social difficulties among adolescents (Shafran & Mansell, 2001). This includes substantial  
3 evidence that perfectionism is associated with burnout, depression, and suicide ideation (e.g.,  
4 Hill & Curran, 2016; O'Connor, 2007; Smith, Sherry, et al., 2016). While the possible outcomes  
5 of perfectionism are well-studied, much less research has examined its development. Models  
6 focused on explaining the origins of perfectionism have placed heavy emphasis on parental  
7 socialization and, in particular, controlling parent behaviors (Flett, Hewitt, Oliver, & Macdonald,  
8 2002). In the current study, we extend research in this area by examining the relationship  
9 between perceptions of psychologically controlling parenting and self-critical and narcissistic  
10 perfectionism.

### 11 **Perfectionism**

12           Perfectionism is a personality trait that entails a combination of excessively high personal  
13 standards and overly critical self-evaluation (Frost, Marten, Lahart, & Rosenblate, 1990).  
14 Perfectionism is multidimensional and has been examined using different models and measures.  
15 It has been studied using individual models and their constituent sub-dimensions (e.g., Frost et  
16 al., 1990; Hewitt & Flett, 1991), as well as using combinations of multiple models to create  
17 higher-order dimensions of perfectionism (e.g., Frost, Heimberg, Holt, Mattia, & Neubaur, 1993;  
18 Rice, Ashby, & Slaney, 1998). Research adopting these approaches has illustrated the benefits of  
19 a multidimensional perspective with dimensions of perfectionism often associated with different  
20 (sometimes opposing) correlates, processes, and outcomes (Stoeber & Otto, 2006). As a  
21 consequence of a multidimensional perspective, we now have a better appreciation of the many  
22 guises perfectionism can take, as well as related issues such as the differences between

1 intrapersonal (imposed on the self) and interpersonal (directed towards others, perceived to  
2 originate from others, or displayed for the benefit of others) dimensions of perfectionism.

3         Self-critical perfectionism is an intrapersonal dimension of perfectionism that continues  
4 to receive attention. According to Dunkley, Zuroff, and Blankstein (2003), self-critical  
5 perfectionism entails harsh self-scrutiny, overly critical self-evaluation, concern of others'  
6 criticism, and an inability to derive satisfaction from success. The construct is based on the self-  
7 criticism element of the Depressive Experiences Questionnaire (Blatt, D'Afflitti, & Quinlan,  
8 1976), which taps into introjected sources of depression (i.e., guilt and shame). Research  
9 consistently shows that self-critical perfectionism exhibits positive relationships with anxiety and  
10 depression in adolescents and adults (Stoeber & Otto, 2006). Furthermore, longitudinal studies  
11 with college students reveal that self-critical perfectionism predicts increases in depressive  
12 symptoms over several years (e.g., Dunkley, Sanislow, Grilo, & McGlashan, 2009; Mandel,  
13 Dunkley, & Moroz, 2015). Overall, self-critical perfectionism is an especially debilitating  
14 dimension of perfectionism.

15         Researchers have also recently begun to examine narcissistic perfectionism. Narcissistic  
16 perfectionism is an interpersonal dimension of perfectionism that encapsulates an outward  
17 projection of perfection reflected by expressions of grandiosity, entitlement, and lofty  
18 expectations of others in the service of promoting an idealized self-image (Nealis, Sherry,  
19 Sherry, Stewart, & Macneil, 2015). There are thought to be few benefits of this dimension of  
20 perfectionism, and it is particularly debilitating in a social context because it promotes a sense  
21 that life is a collection of struggles for dominance, provoking conflict and aggression against  
22 perceived rejection or insult. In support of this theorising, recent work by Nealis and colleagues  
23 (Nealis et al., 2015; Nealis, Sherry, Lee-Baggley, Stewart, & Macneil, 2016) has found that

1 narcissistic perfectionism positively predicts interpersonal conflict, denigration, and anger even  
2 after controlling for other dimensions of perfectionism (e.g., self-critical perfectionism; Nealis et  
3 al., 2015, 2016). Like self-critical perfectionism, then, narcissistic perfectionism is debilitating.  
4 However, unlike self-critical perfectionism, its consequences are predominantly interpersonal.

### 5 **Development of perfectionism**

6         Given the potentially damaging effects of self-critical and narcissistic perfectionism, an  
7 important goal for researchers is to understand how they develop. In prioritizing the study of  
8 perfectionism's outcomes, though, its origins have received comparatively less attention  
9 (Appleton & Curran, 2016). When explaining the possible origins of perfectionism theorists have  
10 emphasized parent socialization (Flett et al., 2002). Aligned with seminal descriptions of  
11 perfectionism development (e.g., Missildine, 1963; Hollander, 1965), four parental pathways  
12 have been described by Flett et al (2002). The social expectations pathway suggests that  
13 excessive demands from parents foster perfectionism as a coping mechanism to the rejection and  
14 shame of failing. The social learning pathway posits that parents are conduits of perfectionism,  
15 passing their own perfectionistic traits to their offspring through social learning. The social  
16 reaction pathway purports that perfectionism develops in the service of harsh, punitive, and  
17 abusive parent socialization yielding a desire to strive for perfection to avoid parental  
18 disapproval. The anxious rearing pathway hypothesizes that anxious parents rear perfectionistic  
19 children because they utilize over-controlling socialization to reduce the likelihood that their  
20 child will make a mistake.

21         The social expectations pathway within Flett et al.'s (2002) model of perfectionism  
22 development emphasises a particular form of parent psychological control, namely conditional  
23 regard. Parental conditional regard is an intrusive interpersonal style that is used to manipulate

1 self-conscious affect (e.g., guilt and shame) with the aim of eliciting desired behavior (Barber,  
2 1996). It works by connecting children's perceptions of self-worth with the attainment of parent  
3 expectations (Rogers, 1951). An emphasis on meeting parental expectations for self-worth  
4 affirmation has several implications for the development of perfectionism. Notably, parental  
5 conditional regard teaches children that their abilities, utility, and self-worth are limited to the  
6 extent to which their actions, behaviors, and performances live up to parental standards.  
7 Moreover, it promotes a sense that children's own standards are irrelevant, superseded instead by  
8 those of the parent. Accordingly, children adopt extremely high standards, and strive for  
9 perfection, to both gain parental approval and avoid the guilt and shame that follow love-  
10 withdrawal (Hamachek, 1978).

11 We suggest that self-critical and narcissistic perfectionism have a common origin in  
12 parental conditional regard. For self-critical perfectionism, the harsh self-evaluative tendencies  
13 that characterize the trait are a direct result of an internalization of self-worth contingencies that  
14 follow parent love-withdrawal. While perfection is initially pursued in service of parental  
15 approval, perceptions of conditional self-worth come to be adopted as a way in which children  
16 view themselves generally, as opposed to how they view themselves in relation to their parents.  
17 Hollander (1965) alluded to this possibility when he argued that it was the pursuit of parental  
18 acceptance, internalised and carried into adulthood, which underpinned perfectionism. Turning  
19 to narcissistic perfectionism, in addition to emerging via the internalization of parental regard,  
20 we consider it to develop when individuals come to view narcissistic behavior as a means of  
21 obtaining parent approval. Others have similarly suggested that self-aggrandizement can stem  
22 from a desire to gain parental affection, especially when affection is not forthcoming (Assor &  
23 Tal, 2012). This is also evident for other aspects of perfectionism where hiding imperfections

1 and actively promoting an image of perfection are associated with narcissistic acts (Hewitt, Flett,  
2 Besser, Sherry, & McGee, 2003).

3 To date, no research has examined the relationship between parental conditional regard  
4 and adolescents' self-critical and narcissistic perfectionism. However, there is indirect evidence  
5 that supports the proposed relationships. Research consistently links forms of parent  
6 psychological control with the development of self-criticism in adolescents (e.g., Soenens,  
7 Vansteenkiste, & Luyten, 2010; Koestner, Zuroff, & Powers, 1991). Likewise, a number of  
8 studies have documented positive relationships between parent psychological control and  
9 narcissistic tendencies in adolescents (e.g., Assor & Tal, 2012; Horton, Bleau, & Drwecki,  
10 2006). More direct evidence is also provided by research linking various forms of parent  
11 psychological control to dimensions of perfectionism. The work of Soenens and colleagues (e.g.,  
12 Soenens, Luyckx, et al., 2008; Soenens, Vansteenkiste, Luyten, Duriez, & Goossens, 2005) is  
13 particularly noteworthy in this regard. Together, this research offers support for our suggestion  
14 that self-critical and narcissistic perfectionism have a common origin in parental conditional  
15 regard.

## 16 **The present study**

17 The aim of the current study was to examine the relationship between parental  
18 conditional regard and self-critical and narcissistic perfectionism. Based on the theoretical and  
19 empirical evidence presented above, we hypothesized that parental conditional regard would  
20 positively predict both dimensions of perfectionism.

## 21 **Method**

22 **Participants and procedure.** Three hundred and forty-five (234 males, 107 females, 4  
23 undisclosed gender;  $M$  age = 15.68 years,  $s$  = 1.24) adolescents were recruited from community



1 sport settings. Prior to data collection, ethical approval was provided by the research ethics  
2 committee of a British University and parental consent was sought for participation. A paper and  
3 pencil questionnaire was given to the participants, which took 15 minutes to complete.

#### 4 **Instruments**

5 **Parental conditional regard.** Perceived parental conditional regard was measured using  
6 the 6-item Parental Conditional Regard Scale (PCRS; Assor, Roth, & Deci, 2004). This instrument  
7 assesses the degree to which individuals perceive their mother (3-items) and father (3-items) to be  
8 conditionally regarding (e.g., “I often feel that I will lose much of my mother/father’s affection if  
9 I do poorly [in my sport]”). Sport was added when items mentioned specific domains/contexts so  
10 to capture parental behaviours in an appropriate and meaningful context for the sample. The scale  
11 is rated on a 7-point Likert scale ranging from 1 ‘*strongly disagree*’ to 7 ‘*strongly agree*’ and  
12 participants were asked to report on their mothers and fathers separately. This instrument has  
13 psychometric support in previous research with adolescents (Assor et al., 2004).

14 **Self-critical perfectionism.** We used Dunkley et al’s (2003) measurement model to  
15 capture self-critical perfectionism in this study. This model includes the 5-item socially prescribed  
16 perfectionism subscale of the short-form Multidimensional Perfectionism Scale (H-MPS; Cox,  
17 Enns, & Clara, 2002), the 4-item doubts about actions and 5-item short-form concern over mistakes  
18 sub-scales from the Frost Multidimensional Perfectionism Scale (F-MPS; Cox et al., 2002), and  
19 the 9-item self-criticism subscale of the Reconstructed Depressive Experiences Questionnaire  
20 (RDEQ; Bagby, Parker, Joffe, & Buis, 1994). The H-MPS and the RDEQ are responded on a 7-  
21 point Likert scale (1 = ‘*strongly disagree*’; 7 = ‘*strongly agree*’), the F-MPS is responded on a 5-  
22 point Likert scale (1 = ‘*strongly disagree*’; 5 = ‘*strongly agree*’). Research supports the reliability  
23 and validity of this measurement model (Dunkley et al., 2003).



1           **Preliminary analysis.** Missing value analysis revealed that there were 279 complete  
2 cases and 66 incomplete cases. Of these, 10 cases had more than 20% of items missing and were  
3 removed from the dataset (Peng, Harwell, Liou, & Ehman, 2006). Missing values for the  
4 remaining cases with incomplete data were imputed using the Expectation Maximisation  
5 algorithm at the variable level (Cole, 2008). Following imputation, in accordance with the  
6 recommendations of Osbourne (2013), univariate and multivariate outliers ( $p < .001$ ) were  
7 removed from the dataset ( $N = 19$ ). Although this process resulted in data that was approximately  
8 univariate normal, estimates of multivariate kurtosis (Mardia's normalised coefficient = 13.42)  
9 indicated the data remained multivariate asymmetrical. Therefore, we employed a bootstrapping  
10 procedure that drew 5,000 replication samples. Confidence intervals associated with the  
11 correlation and regression coefficients are those derived from the standard errors from this  
12 bootstrapping procedure. This data screening and cleaning procedure yielded a final sample of  
13 316 (218 males, 95 females, 3 undisclosed gender;  $M$  age = 15.69 years,  $s = 1.23$ ).

14           Descriptive statistics, bivariate correlations, and Cronbach alpha coefficients for the  
15 manifest variables are presented in Table 1. All manifest variables displayed adequate internal  
16 reliability ( $\alpha > .70$ ) and correlations ranged from small-to-medium in magnitude. To test for  
17 gender equivalence in the correlations, we compared the covariance matrices for males and  
18 females prior to our main analyses. Box's  $M$  was significant (Box's  $M = 82.02$ ,  $p = .02$ ) and thus  
19 gender was added as a covariate to the structural model (male = 1, female = 2).

20           **Assessment of the measurement model.** The measurement model consisted of three  
21 inter-correlated latent factors. Subscales were used as measured variables for parental conditional  
22 regard (two indicators; mother and father), self-critical perfectionism (four indicators; socially-  
23 prescribed perfectionism, concern over mistakes, doubts about actions, and self-criticism), and

1 narcissistic perfectionism (four indicators; grandiosity, entitlement, other-oriented perfectionism,  
 2 and high standards for others). A correlation between residual terms for grandiosity and  
 3 entitlement was included in the measurement model because a chi-square difference test  
 4 indicated a significant improvement in fit with it added:  $\Delta\chi^2[1] = 52.21, p < .01$ .<sup>1</sup>

5 All standardised factor loadings for the measured variables on their latent factors were  
 6 significant (parental conditional regard  $\beta$  range = .88 to .92; self-critical perfectionism  $\beta$  range =  
 7 .56 to .73; narcissistic perfectionism  $\beta$  range = .60 to .72). Furthermore, each of these latent  
 8 factors demonstrated acceptable composite reliability (parental conditional regard  $\rho = .90$ ; self-  
 9 critical perfectionism  $\rho = .76$ ; narcissistic perfectionism  $\rho = .76$ ). The measurement model  
 10 exhibited an acceptable fit to the data:  $\chi^2 = 85.06 (31), p < .05$ ;  $\chi^2/df = 2.74$ ; TLI = .93; CFI =  
 11 .95; SRMR = .05; RMSEA = .07 (90% CI = .06 to .09), and the error-free correlations between  
 12 all latent factors were significant and in the expected positive directions.

13 **Assessment of the structural model.** The hypothesised model that was tested can be  
 14 seen in Figure 1. Fit indexes suggested the hypothesized model possessed an acceptable fit to the  
 15 data:  $\chi^2 = 110.65 (38), p < .05$ ;  $\chi^2/df = 2.74$ ; TLI = .91; CFI = .94; SRMR = .05; RMSEA = .08  
 16 (90% CI = .06 to .09). In line with expectations, parental conditional regard positively predicted  
 17 both self-critical perfectionism and narcissistic perfectionism. Gender did not predict self-critical  
 18 perfectionism ( $\beta = .02$ , 95% BC CI = -.10, .14), but did negatively predict narcissistic  
 19 perfectionism ( $\beta = -.27$ , 95% BC CI = -.38, -.14). The model accounted for 28% of the variance in  
 20 self-critical perfectionism and 19% of the variance in narcissistic perfectionism.

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<sup>1</sup> We deem this modification to be justified because grandiosity and entitlement both load on a higher-order narcissism factor (see Raskin & Terry, 1988). The correlated residual terms therefore likely reflects their shared relationship with narcissism. Without this error term in the measurement model, model fit was marginally outside acceptable fit for TLI:  $\chi^2 = 137.27 (32), p < .05$ ; TLI = .89; CFI = .91; SRMR = .06; RMSEA = .10 (90% CI = .08 to .12).

## 1 **Discussion**

2 In the current study we examined the relationship between parental conditional regard  
3 and self-critical and narcissistic dimensions of perfectionism. Results supported our hypothesised  
4 associations. Both self-critical and narcissistic perfectionism were positively predicted by  
5 adolescents' perceptions of their parents' conditional regard.

### 6 **Theoretical implications**

7 Our findings are supportive of Flett et al.'s (2002) assertion that when children perceive  
8 that parental approval is based upon their ability to meet parental expectations, they are more  
9 likely to report perfectionism. In this study, we found evidence that this may be the case for both  
10 self-critical and narcissistic perfectionism. The implication is that parenting styles that condition  
11 behaviour by love-withdrawal may not only be problematic for the internalisation of harsh  
12 evaluative concern directed inward on the self, but may also be problematic for the development  
13 of grandiose and lofty standards projected outwards to others. More generally, we consider this  
14 finding to be supportive of the notion that contingent self-worth is a core feature of perfectionism  
15 (Greenspon, 2000). This has been evidenced for other dimensions of perfectionism in previous  
16 studies (e.g., DiBartolo, Frost, Chang, LaSota, & Grills, 2004; Hill, Hall, & Appleton, 2011) and  
17 is also likely to be the case for self-critical and narcissistic perfectionism.

18 There were differences, though, in the degree to which each perfectionism dimension was  
19 predicted by parental conditional regard. Notably, parental conditional regard was an especially  
20 strong predictor of self-critical perfectionism. This finding is perhaps not surprising. The  
21 psychological control encapsulated by conditional regard closely aligns with the characteristics  
22 of self-critical perfectionism. That is, the punitive and self-corrective features of perfectionism  
23 are understood to be a learnt counterbalance to lowered self-esteem that follows guilt and shame

1 in failure (Sorotzkin, 1985), and guilt and shame are the levers of compliance for socialization by  
2 conditional regard (Barber, 1996). Hence, it follows that continued exposure to parental  
3 conditional regard will strengthen the association between contingencies of self-worth, guilt, and  
4 shame – resulting in harsh self-evaluative tendencies that are indicative of self-critical  
5 perfectionism.

6         In the case of narcissistic perfectionism, parental conditional regard was a comparatively  
7 weaker predictor. Although parental conditional regard may have a role in promoting narcissistic  
8 perfectionism via both a dependence on parent affection and a defence to hide imperfections, our  
9 findings indicate that other socialization practices may be more important. The treatment of  
10 children as gifted or special is one such possible practice supported by research documenting  
11 links between overindulgence in childhood and narcissism in adulthood (Horton et al., 2006).  
12 Another possibility is that narcissistic perfectionism develops when parents use children to fulfil  
13 their own failed ambitions (Rothstien, 1979). Such over-involvement blocks children's  
14 opportunities to psychologically separate from their parents, resulting in a narcissistic personality  
15 dependent upon parental reinforcement (Kohut, 1977). Finally, grandiosity, entitlement, and  
16 high standards for others are also likely to be learned and modelled in the same manner as  
17 perfectionism can be generally learned from parents (Flett et al., 2002). Examining these three  
18 alternative pathways is an important avenue for future research.

19         The gender covariate in our structural model negatively predicted narcissistic  
20 perfectionism. This indicated that males reported higher levels of narcissistic perfectionism than  
21 females. As only a handful of studies have examined narcissistic perfectionism to date, and ours  
22 is the first to examine gender as a covariate, it is difficult to draw any firm conclusions on this  
23 finding. In the general perfectionism area gender is typically unrelated to other dimensions of

1 perfectionism (e.g., Stoeber & Stoeber, 2009). However, research does suggest that men  
2 typically endorse more grandiose and entitled self-opinions than women (Grijalva, Newman, et  
3 al., 2015). For this reason it might be expected that there would be gender differences for this  
4 particular dimension of perfectionism. Again, future research should examine this possibility.

### 5 **Applied implications**

6 Many existing interventions for perfectionism are rooted in individualised cognitive  
7 behaviour therapy (e.g., Flett & Hewitt, 2008; Nehmy & Wade, 2015). However, the associations  
8 documented in this study, and elsewhere (e.g., Soenens et al., 2008; Soenens et al., 2005),  
9 suggest that interventions may need to include parents. To this end, there is considerable  
10 evidence that developmental problems in adolescence can be prevented with early parenting  
11 intervention (Britto, Lye, et al., in press) and community initiatives have proven especially useful  
12 here (e.g., the Triple P-positive parenting programme; Sanders, Markie-Dadds, & Turner, 1999).  
13 Our research suggests that, to prevent the development of perfectionism, such initiatives should  
14 consider adding education components aimed at reducing the use of conditional regard. These  
15 strategies include acknowledging and attempting to understand negative emotions in adolescents,  
16 providing rationales for rules, limits, and expectations, offering unconditional support when  
17 children have tried but failed, and encouraging input into decision-making (Grolnick, 2003).

### 18 **Limitations and future directions**

19 The study has limitations. First, we recruited adolescents from sports clubs, which may  
20 limit generalizability. Relatedly, our decision to measure conditional regard at domain level  
21 (sport) and perfectionism generally can also be considered a limitation. This may have attenuated  
22 the observed relationships and means we cannot be certain (though we feel it is likely) that  
23 similar relationships would be observed when variables are measured at the same level (general

1 vs domain). Variables were measured using self-reported instruments for which there is some  
2 evidence that agreement between parents and children is low in terms of parent behavior (Bögels  
3 & van Melick, 2004). Therefore, subsequent research should employ multiple sources of  
4 measurement, particularly observation methods, to verify perceptions of parents and adolescents.  
5 Our cross-sectional design, of course, does not allow any inference of temporality or causality.  
6 Reverse and reciprocal relationships are an especial consideration here given that narcissistic and  
7 self-critical adolescents outwardly express a commitment to extremely high achievement  
8 standards (Kopala-Sibley & Zuroff, 2014; Luyten, Corveleyn, & Blatt, 2005), to which parents  
9 may respond with conditional regard as a means of reinforcing such behavior. Accordingly, A  
10 test of whether conditional regard predicts change in perfectionism dimensions over time (or  
11 vice-versa) is required.

## 12 **Conclusion**

13 This study found evidence for the parental origins of perfectionism. Perceptions of  
14 parental conditional regard positively predicted both self-critical and narcissistic dimensions of  
15 perfectionism. In doing so, we highlight the possibility that these dimensions of perfectionism  
16 have common developmental origins.

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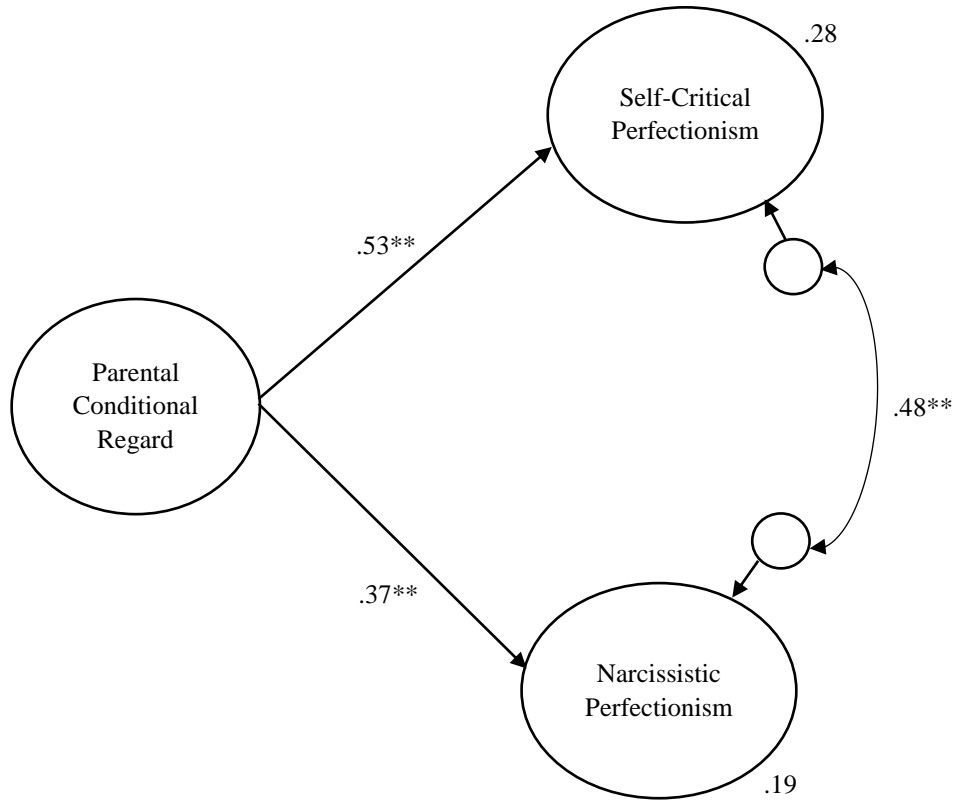
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33 **Figure 1.**

34 **Results of structural equation modelling for the hypothesized model**

35 *Note.*  $\chi^2 = 110.65 (38)$ ,  $p < .05$ ;  $\chi^2/df = 2.74$ ; TLI = .91; CFI = .94; SRMR = .05; RMSEA = .08 (90% CI = .06  
36 to .09). Not shown is the gender covariate which was added to the model as a predictor of self-critical perfectionism  
and narcissistic perfectionism.