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An Investigation of Factors that Influence Acceptability of Parent Training

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An Investigation of Factors that Influence Acceptability of Parent Training

INTRODUCTION

Parent training is a treatment designed to decrease child behavior problems by teaching parents to interact more effectively with their children. Specifically, parents are taught how to reinforce their child for desired behaviors and to decrease the occurrence of undesired behaviors through consistent use of techniques such as differential attention and timeout. In a review article, parent training was classified as a “best practice recommendation” for young children with disruptive behavior problems (Eyberg, Nelson, & Boggs, 2008). A review of parent training effectiveness studies demonstrated that parent training is effective in a variety of non-laboratory treatment settings (Lee, Horvath, & Hunsley, 2013). Children’s problematic or externalizing behaviors decrease following mother and father participation in a parent training intervention (Thomas & Zimmer-Gembeck, 2007).

Historically, parent training was focused mostly on mothers. Father involvement was viewed as largely unnecessary (Lundahl, Tollefson, Risser, & Lovejoy, 2008). However, given the more recent findings on the importance of father involvement on child development, that view is no longer widely accepted (Lamb, 2010). Even as father involvement in parent training interventions has increased, the benefits that mothers and fathers receive are not equivalent. For example, one meta-analysis showed that improvement in children’s behaviors post-treatment tended to be larger for mothers than fathers (Lundahl et al., 2008). Also, when both parents were involved, mothers’ parenting behavior improved significantly more than fathers’ parenting behavior following the intervention. These results were obtained immediately following the treatment and maintained at follow-up (Lundahl et al., 2008). There is concern that unsuccessful results with fathers will lead to less father involvement in parent training. Therefore, finding ways to increase fathers’ meaningful participation in parent training programs is important.

One significant issue that decreases both mother and father involvement in parent training is treatment drop out. In *efficacy* studies, the number of mothers that drop out before parent training is completed ranges from 37% to 56% depending on the type of parent training program and the population served (Fernandez, Butler, & Eyberg, 2011; Peters, Calam, & Harrington, 2005). However, a review of parent training *effectiveness* studies revealed that treatment completion rates for mothers and fathers ranged from 69-96% (Lee, et al., 2013). Although many parent training studies do not report when participants drop out of treatment, one study of mothers found that 30% dropped out before the first scheduled treatment session (Chacko, Wymbs, Chimiklis, Wymbs, & Pelham, 2012). Another study found that 70% of mothers who drop out do not even attend the first scheduled treatment session following the initial intake (Fernandez et al., 2011).

Early termination of treatment might imply that the parents were not engaged in the treatment from the beginning. Socioeconomic status (SES) is the best predictor of whether parents will drop out of treatment; low SES mothers are much more likely to drop out (Fernandez & Eyberg, 2009; Kazdin, 1996; Peters et al., 2005). Other barriers to treatment completion include maternal age (with younger mothers being more likely to drop out) and diagnosis of child (mothers and fathers of children who have received a diagnosis or have more than one diagnosis are more likely to drop out; Kazdin, Holland, & Crowley, 1997; Peters, et al., 2005). Mothers and fathers who drop out often believe that their lives are very stressful and that their child is more difficult than other children with similar disorders (Friars & Mellor, 2009). It is likely that parents' negative perception of their child and the stressors in their life coupled with the barriers posed by certain child and family demographics make it more difficult for some parents to engage with and remain in treatment.

Despite the problem of drop out from parent training, parent training is typically perceived as an acceptable treatment (Carter, 2007; Johnston, Himmensen, & Seipp, 2008). Kazdin (1981) defined treatment acceptability as "judgments by lay persons, clients, and others of whether treatment procedures are appropriate, fair, and reasonable for the problem or client" (p. 493). Although parent training as a whole is perceived as acceptable, some components of parent training programs are rated as more acceptable than others. For example, mothers and fathers tend to approve of strategies used to increase positive behavior more than they approve of restrictive approaches designed to decrease negative child behaviors (Calvert & McMahon, 1987; Tiano, 2008). Some studies have found that treatment acceptability varies depending on the time commitment involved and possible adverse side effects of the treatment, with greater time commitment and more adverse side effects associated with decreased acceptability (Kazdin, 1981; Reimers, Wacker, & Koepl, 1987). Parents' culture and levels of acculturation also affect treatment acceptability; fathers who are more acculturated are more likely to participate in family interventions and find behavior management interventions more acceptable (Borrego, Ibanez, Spendlove, & Pemberton, 2007; Wong et al., 2013). For example, higher levels of acculturation in Mexican American fathers is associated with greater acceptance of reinforcement-based strategies such as token economies (Borrego et al., 2007).

Some studies have shown that the acceptability of behavioral interventions depends on the severity of the problem being treated, with more severe problem behaviors being associated with increased treatment acceptability for both mothers and fathers (Bennett, Power, Rostain, & Carr, 1996). Additionally, medication and reductive approaches are rated as more acceptable for more severe problems while positive reinforcement approaches are rated

as more acceptable for less severe problems (Reimers, Wacker, Cooper, & de Raad, 1992). Other studies have shown no relationship between problem severity and treatment acceptability (Cowan & Sheridan, 2003; Wickstrom, Jones, LaFleur, & Witt, 1998). The influence of problem severity on treatment acceptability may depend on the setting and ecological validity of the study. Several studies of behavioral consultation in schools found no relationship between problem severity and mother and father rated or teacher-rated acceptability (Cowan & Sheridan, 2003; Wickstrom et al., 1998). Other studies, in which mothers and fathers rate the acceptability of using various interventions with their own children, found that problem severity did impact acceptability (Bennett et al., 1996). For example, parents rate positive reinforcement and time-out as more acceptable for less severe behavioral problems and medication as more acceptable for more severe problems (Reimers et al., 1992). Additionally, mothers and fathers of children with aggressive and disruptive behaviors are more accepting of counseling for their child than parents of children with less significant behavior problems (Bennett et al., 1996). Based on the literature to date, more research is needed to decisively determine whether problem severity affects treatment acceptability.

Mothers and fathers often differ in their views of the acceptability of various parenting strategies (Borrego et al., 2007; Tiano, 2008). Mothers tend to view response cost strategies, room time out, and positive reinforcement as significantly more acceptable than fathers (Miller & Kelley, 1992; Tiano, 2008). However, fathers view medication and spanking more favorably than mothers (Borrego et al., 2007; Miller & Kelley, 1992; Tiano, 2008). These differences may be due to the influence of gender role stereotypes which dictate that fathers be “tough” on their children. Additionally, at least one study has shown that fathers view the parent training program as a whole, as less acceptable than mothers (Tiano, Grate, & McNeil, 2013). However, this study looked at one specific type of parent training known as Parent-Child Interaction Therapy, and it is not clear if this finding is consistent for all parent training programs.

It is important to understand the variables that influence treatment acceptability because it is theorized to affect treatment use and treatment integrity. This in turn is hypothesized to affect treatment effectiveness (Eckert & Hintze, 2000; Reimers et al., 1987). These theories are largely based on logical conclusions, as there are limited empirical data to support them. The available research is unclear as to whether treatment acceptability affects adherence to treatment. Reimers et al. (1992) found that parents reported more compliance with a treatment that they initially rated as most acceptable. However, this finding was directional, indicating that compliance early in treatment led to more acceptability at follow-up. A study of parents of children with ADHD found that parents’

acceptability endorsements at intake were not predictive of follow-through with the recommended counseling and medication treatments at follow-up (Bennett et al., 1996). However, considerable research has also shown that treatment acceptability or consumer satisfaction with parent training is related to child behavior improvement post-treatment (Brestan, Jacobs, Rayfield, & Eyberg, 1999; MacKenzie, Fite, & Bates, 2004). Overall, the literature is mixed in regards to how much influence treatment acceptability has on treatment adherence and outcome.

Parent training programs commonly provide rationales to parents at the outset of treatment, which are intended to help increase parent “buy-in” (or acceptability) of the intervention. For example, in Parent-Child Interaction Therapy, parents are told that they are not responsible for their child’s problems, but they have the power to resolve the problems. They are then given an explanation of “specialized parenting,” which includes the idea that very difficult children require a special kind of parenting to effectively manage their challenging behaviors (McNeil & Hembree-Kigin, 2010). Another parent training program states that “all parties to the problematic interaction bear some responsibility for its resolution” (Barkley, Edwards, & Robin, 1999). Other parent training programs do not explicitly state how they describe their program to parents, but they do note the importance of using a supportive and facilitative style rather than being confrontational (Barkley, 1997). There is variation among treatment manuals in how much responsibility is assigned to parents during the introduction to treatment. Although previous research has not examined what influence the introduction to therapy has on treatment acceptability, it seems to be a clinically significant topic given that many treatment manuals address the introduction. Additionally, there is evidence that an individual’s previous experience with mental health services influences treatment acceptability for future interventions, thus, treatment introductions provided by clinicians at the outset of treatment likely influence treatment acceptability during the course of the intervention (Chavira, Stein, Bailey, & Stein, 2003). Modifications made by therapists in terms of how they explain the parent training program may impact initial parental acceptability of the program.

Parent training is a unique intervention for children in that the parents’ behavior, rather than the child’s behavior is targeted in treatment. Thus, parents’ beliefs about the extent to which they have influence over their child’s behavior is particularly salient and parental locus of control may influence acceptability of parent training interventions. Locus of control is a belief about the extent to which one can control his or her environment (Rotter, 1966). Parental locus of control is defined as parents’ sense of control over and responsibility for their child’s behavior (Campis, Lyman, & Prentice-Dunn, 1986). One study found that mothers who have an internal locus of

control believe that their child's behaviors are determined by their parenting efforts while mothers who have an external locus of control believe that their child's behaviors are due to forces outside of her control (Freed & Tompson, 2011).

Parental locus of control tends to follow predictable patterns. For example, mothers' locus of control tends to be more external than fathers. This is the case in parents experiencing typical levels of stress and parents experiencing high levels of stress (Rubinstein, 2004). Also, both mothers and fathers who have children with significant behavior problems tend to have a more external locus of control (Hagekull, Bohlin, & Hammarberg, 2001). However, there is evidence that the relationship between parental locus of control and child behavior problems is bidirectional with greater child behavior problems associated with an increase in parental external locus of control and external locus of control predicting greater child behavior problems for both mothers and fathers (Freed & Tompson, 2011; Tone, Goodfellow, & Nowicki, 2012). There is also evidence that a parent's locus of control impacts parental stress. Mothers and fathers who have an external locus of control experience more parenting stress and stress in general than parents who have an internal parenting locus of control (Hassall, Rose, & McDonald, 2005; Lanfranchi & Vianello, 2012). Parental locus of control can also impact how parents respond to interventions. Mothers and fathers with an internal locus of control tend to find parent training strategies that target their management of the child's behavior more acceptable than parents with an external locus of control since they believe they have an influence over their child's behavior (Mah & Johnston, 2008).

The purpose of this study was to evaluate some of these factors that may be related to parent acceptability of parent training programs and better understand the impact of parent gender, treatment description / rationale, child problem severity, and parental locus of control on ratings of acceptability. The specific research questions for this study were as follows: First, will fathers and mothers differ in their acceptability ratings of a description of parent training and do their acceptability ratings vary when presented with a treatment description that focuses on enhancing existing parenting skills versus a description that focuses on addressing deficits in parenting skills? Second, will a parent's locus of control (internal versus external) and the severity of a child's behavior problems predict acceptability of the parent training treatment descriptions?

METHOD

Participants

There were 78 participants (39 mother-father dyads) in this study. Participants were required to have their spouse, partner, or coparent complete the study measures and have a child between the ages of 2 and 12. The family characteristics, as reported by mothers, are shown in Table 1. The average child age was 4.83 ($SD = 3.08$). Most of the children were white/Caucasian (94.9%), with two children who represented a mix of ethnic/racial groups. The majority of the children were female (61.5%). Most of the parent participants (90%) reported that their child had never received mental health services or medication for mental health concerns. The ethnic/racial background of mothers in this sample was 97.4% white/Caucasian and 2.6% Asian/Asian-American. The ethnic/racial background of fathers in this sample was 89.7% white/Caucasian, 5.1% Native American, 2.6% black/African American, and 2.6% Latino/Hispanic. A large number of participants (73%) reported being members of The Church of Jesus Christ of Latter-day Saints (LDS; a religious group prominent in the area in which the study was conducted). Additional parent characteristics are shown in Table 2.

Procedures

University IRB approval was obtained prior to recruiting participants for this study. All study materials were available online using the Qualtrics survey platform website. The Qualtrics website included a letter of information describing the study, demographic questions, a description of a parent training intervention, the Treatment Evaluation Inventory-Short Form, the Eyberg Child Behavior Inventory, and the Parental Locus of Control Scale. Participants were recruited from university courses (including those delivered on-line) and from the community via posted flyers and information sent out to local family-oriented social media groups. Overall, 72% ($n = 28$) of the parent dyads were recruited from the University and 28% ($n = 11$) were recruited from the community.

When potential participants made contact with the researchers, eligibility for the study was confirmed by asking if the interested participants had a spouse, partner, or coparent who would participate in the study and a child between the ages of 2 and 12. After participants confirmed their eligibility, they were sent a link via email that directed them to the password-protected survey. Participants were given instructions to access the survey and were instructed to share the link with their partners or spouses. Upon entering the survey, participants created a unique code that allowed the researchers to match both partners' data without identifying them.

There were 126 individuals that participated in the study; however, only the data from 78 participants (39

matched mother-father dyads) were included in the analyses. There were 48 participants whose data were not included in the analyses for various reasons including the participant's partner not participating ($n = 22$), partners completing the measures on different children ($n = 14$), same-sex couple status ($n = 2$), incomplete surveys ($n = 4$), and outlier status ($n = 6$).

Prior to starting the survey, participants were randomly assigned to receive one of the two parent training descriptions, with partners receiving the same treatment description. Of those who were included in the final analysis, 20 mother-father dyads viewed the deficit description and 19 mother-father dyads viewed the empowerment description. All of the participants were instructed to complete the measures on their youngest child between the ages of 2 and 12. This ensured that bias was not introduced through parents selecting the child they felt had the most or the least behavioral problems. The presentation of the measures was counter balanced to control for potential order effects. At the end of the survey, participants were directed to another survey for the purpose of distributing incentives consisting of extra credit for those enrolled in university courses or monetary incentives (receiving a \$5 gift certificate or entering a drawing for one of four \$25 gift certificates). Their responses on the incentive survey were not linked to their responses on the research survey.

Measures

Two different descriptions of parent training were used in this study. The descriptions were one paragraph in length and were presented to the participants electronically, along with the other measures, on Qualtrics, an online survey platform. The two descriptions differed in the way that the intervention was presented to the parents. The *deficit description* focused on parents' contributions to the child's behavior problems and how parents can improve their deficits in parenting skills. The *empowerment description* focused on empowering parents to resolve the behavioral problems and explaining that some children are more difficult to parent due to temperament and other extraneous factors. Prior to the study, the two parent training descriptions were piloted with a small group of undergraduate students to determine if the students perceived differences in the two descriptions. The results of the pilot administration were mixed, but provided some support for the descriptions as conceptualized. Specifically, 80% of the participants stated that the *deficit description* attributed more responsibility to parents and 60% indicated it focused on both remediating poor parenting skills and enhancing existing skills. While 60% of participants stated that the *empowerment description* also attributed more responsibility to the parents, 100% of respondents indicated that the description focused on both remediating problems and enriching skills. Modifications were not made to

further differentiate between the treatment descriptions because it was concluded that if the descriptions were further polarized, the study would lose its relevance and generalizability because it is unlikely that the descriptions would resemble something that a clinician would actually say to parents seeking treatment.

To assess the acceptability of the hypothetical parent training interventions, the Treatment Evaluation Inventory—Short Form (TEI-SF) was used (Kelley, Heffer, Gresham, & Elliott, 1989). The TEI-SF was adapted from Kazdin's (1980) Treatment Evaluation Inventory (TEI) with the goal of creating a shorter and simpler measure. The TEI is a measure of the acceptability of treatments for children with behavior problems. A factor analysis was conducted (Kelley et al., 1989) using the 15 original TEI items and it yielded two factors: acceptability and ethical issues/discomfort. The six items with the highest loading on acceptability and the three items with the highest loading on ethical issues and discomfort were selected for the short form version. Both the TEI and the TEI-SF have adequate internal consistency with coefficient alphas of .89 and .85 respectively (Kelley et al., 1989). Respondents are asked to rate items such as "I like the procedures used in this treatment" and "I would be willing to use this procedure if I had to change the child's problem behavior" on a 5-point Likert scale with 5 representing strongly agree and 1 representing strongly disagree. Scores can range from 9 to 45 (Kelley et al., 1989). The TEI-SF total score was used in this study. In the current study, the Cronbach's alpha for the TEI-SF was .83 for mothers and .74 for fathers.

The Eyberg Child Behavior Inventory (ECBI; Eyberg & Pincus, 1999) was used to measure the frequency of externalizing behavior problems in the children of the parents who participated in this study. This measure was designed to be used with children ages 2 to 16. The inventory contains 36 items that measure both the intensity of the disruptive behavior and whether parents perceive it as problematic (Funderburk, Eyberg, Rich, & Behar, 2003). The intensity scale raw score was used in the current analyses. Intensity scale raw scores can range from 36 to 252. The raw scores can also be converted to standardized *T* scores, which range from 33 to 94. Raw scores above 131 (*T* scores above 60) are considered clinically significant. Test-retest reliability of the ECBI over ten months is .75 (Funderburk et al., 2003). The ECBI scales are highly correlated with the Child Behavior Checklist Externalizing scale, demonstrating concurrent validity (Boggs, Eyberg, & Reynolds, 1990). The Internal consistency coefficient reported in the ECBI professional manual is .95 for the Intensity scale (Eyberg & Pincus, 1999). In the current study, the Cronbach's alpha for the ECBI Intensity scale was .92 for mothers and .94 for fathers.

The Parental Locus of Control Scale (PLOC; Campis et al., 1986) was used to measure whether parents are

more internal or external in their locus of control orientation. The items were rated on a 5-point Likert scale ranging from 1 (strongly disagree) to 5 (strongly agree). Total scores can range from 47 to 235, with higher scores representing a more external locus of control. The scale contains five subscales: parental efficacy, parental responsibility, child control, fate/chance, and parental control. The total scale reliability coefficient for the full version of the PLOC was .92. Another analysis showed that subscale alpha coefficients range from .62 to .79. Discriminant validity was demonstrated in that parents who had previously requested services for parenting problems endorsed a more external locus of control than parents who had not reported difficulties with parenting (Campis et al., 1986). The total scale score was used in the current study. Campis et al. (1986) recommended omitting the item “My child usually ends up getting his/her way, so why try” due to the possibility that it could have multiple connotations. The analyses in this study were conducted using both the PLOC total score and the PLOC total score with the suggested item omitted. There were no statistically significant differences in the results of the analyses so all 47 items were retained. In this study, the wording was changed slightly on four of the items to increase clarity and remove regional colloquialisms. In the current study, the Cronbach’s alpha for the PLOC total scale was .85 for mothers and .88 for fathers.

Data Analysis

A mixed factorial ANOVA was used to answer the question of whether mothers and fathers differed in their acceptability ratings of the two different treatment descriptions. This analysis was conducted on couples (matched mother and father pairs) with parent gender (mother or father) serving as the within-subjects variable and parenting description type serving as the between subjects independent variable. The dependent variable was the TEI-SF total score. A variety of demographic variables that could have an impact on treatment acceptability were evaluated as possible covariates. Gender of the child and parent, age of the child and parent, and number of children in the family were explored as covariates in the analysis. None of the variables were significantly related to scores on the TEI-SF so no covariates were included in the final analyses. A regression analysis was conducted to answer the question of whether parental locus of control and child behavior problems predicted acceptability of the parent training descriptions.

RESULTS

Means and standard deviations were calculated for all of the measures included in the study. The means and standard deviations for the TEI-SF, the ECBI, and the PLOC are contained in Table 3. The mean ECBI Intensity

score for both mothers and fathers was within the normal range, which indicates that, on average, parents in this sample did not have children with clinically significant behavior problems.

Mothers' and Fathers' Treatment Acceptability

A mixed factorial ANOVA was conducted to address the question of whether fathers and mothers differed in their acceptability ratings across the two treatment description types as measured by scores on the TEI-SF. There was not a significant interaction between parent gender and parent training description type, $F(1, 37) = 1.12, p = .296, \eta^2 = .029$. There was a significant main effect for parent gender, $F(1, 37) = 5.64, p = .023, \eta^2 = .132$ which suggests that mothers and fathers differed in their judgments of the acceptability of the parent training descriptions. Mothers rated both descriptions as more acceptable than did fathers (see Table 3). There was not a significant main effect for parent training description type, $F(1, 37) = .008, p = .929, \eta^2 = .000$ indicating no differences in acceptability ratings based on how the parent training program was described.

Prediction of Treatment Acceptability

Prior to conducting the linear regression analysis, bivariate Pearson correlations were examined between the study measures. The correlation between TEI-SF scores and ECBI scores was not significant for fathers ($r = -.040$) or mothers ($r = -.027$). The correlations between TEI-SF scores and PLOC scores for fathers ($r = -.565, p < .001$) and mothers ($r = -.395, p < .05$) were statistically significant, such that an external locus of control was associated with lower acceptability ratings of the parent training descriptions. The correlation between PLOC scores and ECBI scores was not statistically significant for fathers ($r = .251$); however, there was a statistically significant correlation for mothers' scores ($r = .610, p < .001$), such that higher levels of child behavior problems were associated with a more external parental locus of control.

A linear regression was conducted to further examine whether parental locus of control scores and child problem severity predicted ratings of treatment acceptability. A visual inspection of the residual versus fit plot was conducted and the data appeared to be linear. Prior to running the regression analysis, paired sample t tests were conducted to examine the difference between mothers and fathers' scores on the PLOC and the ECBI. There was a significant difference between mothers and fathers on the ECBI ($t = 2.35, p = .024$). There was not a significant difference between mothers and fathers on the PLOC ($t = -.882, p = .384$). Given that the study measures correlated differently for mothers and fathers and that there was a significant difference between mothers' and fathers' scores on the ECBI, the regression analysis was run separately for mothers and fathers. The results of the regression

analysis are contained in Table 4.

The PLOC Total score and ECBI raw score were entered into the regression equation using the enter method. For fathers, the regression equation significantly predicted TEI-SF scores: $F(2, 36) = 8.85, p = .001; R^2 = .33$. However, the PLOC score was the only significant predictor ($t = -4.20; p < .001$; see Table 4). For mothers, the regression equation also significantly predicted TEI-SF scores: $F(2, 36) = 5.34, p = .009; R^2 = .23$. Again, the PLOC score was the only statistically significant predictor ($t = 3.26, p = .002$); however, there was a trend towards higher ECBI scores predicting higher TEI-SF scores ($t = 1.84, p = .074$; see Table 4). These results indicate that a more internal parental locus of control in both mothers and fathers predicted greater treatment acceptability. Additionally, for fathers there was a trend towards higher levels of behavior problems in children predicting greater treatment acceptability.

DISCUSSION

Although parent training is a well-established treatment for child behavior problems, there is a high dropout rate from treatment (Fernandez et al., 2011; Nock & Kazdin, 2005; Silverman et al., 2008). Examining ways to further increase acceptability of parent training is an important area of study because greater acceptability may be associated with treatment compliance and completion; however, the literature is mixed in regards to how much influence treatment acceptability has on treatment adherence and outcome (Bennett et al., 1996; Chorpita, 2003; Stewart & Carlson, 2010). The purpose of the current study was to determine whether mothers and fathers differed in their acceptability ratings of two different descriptions of parent training interventions and if parental locus of control and child problem severity predicted parents' acceptability ratings. The results indicated that there was not a significant interaction between parent gender and parent training description type. There also was not a significant difference in the acceptability between the empowerment and the deficit descriptions. However, there was a significant difference in mothers' and fathers' acceptability ratings, with mothers rating the parent training descriptions as significantly more acceptable than fathers. Although reasons for acceptability ratings were not evaluated in this study, lower acceptability in fathers could be due to several factors including dislike of the techniques used in behavioral parent training, a mismatch between the structure of the intervention and father's needs, and a belief that their behavior management skills do not require intervention. This finding is consistent with previous findings that fathers tend to find the behavior management techniques associated with parent training less acceptable than do mothers (Miller & Kelley, 1992; Tiano, 2008). Additionally, previous research has shown that

behavioral parent training may not meet fathers' needs. For example, many studies of parent training address correspondence to mothers and only require mothers to complete questionnaires and interviews (Fabiano, 2007). Additionally, the content of parent training sessions often focuses on roles and activities for which the mother is primarily responsible; fathers may not consider the content to be applicable to them (Fabiano, 2007; U.S. Bureau of Labor Statistics, 2014). Another possible explanation is that fathers may not feel that their behavior management skills need to be improved, and thus they may not be interested in a program they feel they do not need. This explanation is consistent with previous research that shows that fathers tend to be more confident in their parenting skills than mothers (Hoza et al., 2000).

As noted above, there was not a significant difference in the acceptability of the two different parent training descriptions. There are several possible explanations for this. The most obvious reason is that the manipulation may not have been powerful enough. Perhaps, a written description presented electronically does not capture the variability with which interventions are presented by live therapists. Variables like interpersonal style, tone of voice, facial expression, and the therapist's relationship with the family all may have a greater impact on the acceptability of the intervention presented than the actual words that are used. It also may be that treatment acceptability of parenting interventions is influenced more broadly by an individual's attitudes towards treatment in general, rather than subtle differences between treatment descriptions.

The results indicated that for fathers and mothers, locus of control orientation significantly predicted acceptability ratings of the parent training descriptions, with a more external locus of control associated with lower acceptability of the parent training descriptions and a more internal locus of control associated with higher acceptability. The finding that an internal locus of control predicts greater acceptability of parent training makes intuitive sense. Parent training is an intervention that requires parents to actively participate and serve as the agent of change for their child's behavior. Parents with an internal locus of control are more likely to find this type of intervention acceptable because they have a sense of efficacy in changing their child's behavior. This finding is consistent with related research that demonstrates that parents who attribute the cause of their child's behavior problems outside of themselves (e.g., internal to the child) find behavioral strategies less acceptable (Morrissey-Kane & Prinz, 1999).

One reason that an external locus of control is associated with decreased acceptability may be a mismatch between parents' expectations for treatment and the treatment description. Parents who present for treatment, but

have not yet been introduced to parent training, may believe that the clinician will work with their child directly rather than working with them to change the child's behavior. Parents in the current study were aware that the treatment would target their parenting which may have decreased acceptability in those with an external locus of control. Previous research has demonstrated that pretreatment conceptualizations are associated with treatment engagement. For example, one study found that parents of children with conduct disorder who believed that therapy would directly target their child had the highest dropout rate from a parent-only treatment condition compared to a child-only treatment and parent-child treatment conditions (Miller & Prinz, 2003). It should be noted that there is an important difference in the task of rating the acceptability of a treatment that one does not plan to undertake and actually initiating treatment. Parents who are seeking treatment are likely occupied with the crisis of the child's behavior problems and the logistics of obtaining treatment and may not be thinking existentially about their influence as a parent. However, parents who are evaluating treatments in the abstract may have the luxury of thinking about their beliefs about the child's behavior problems and how those beliefs mesh with the described treatment.

Child behavior problem severity was also examined as a potential predictor of treatment acceptability. In the current study there was a trend indicating that for mothers, higher levels of child behavior problems were associated with greater acceptability of the parent training descriptions. One possible explanation for this is that mothers of children with more behavior problems are more likely to find any intervention acceptable, regardless of what it is. Conversely, mothers who do not report child behavior problems are less likely to want to engage in an intervention that targets their management of the child's behavior. It is interesting to note that in the current study, there was no association between child problem severity and treatment acceptability in fathers. It is possible that fathers see themselves as less responsible for their children's behavior problems given that mothers typically still have more responsibility for and spend more time providing child care (Craig, 2006). It should be noted that the majority of parents in this sample did not report clinical levels of behavior problems in their children which may limit the generalizability of these findings with parents of children who have more severe behavior problems. Overall, the results of this study do not provide a clear answer to the question of whether child behavior problem severity affects treatment acceptability. Previous research in this area is also mixed. Some studies have found that increased problem severity predicts parents' acceptance of intense treatments (e.g., medication; Bennett, English, Rennoldson, & Starza-Smith, 2013; Miller & Kelley, 1992; Reimers et al., 1992), while other studies have not found

that association (Cowan & Sheridan, 2003; Wickstrom et al., 1998).

Limitations

There were several limitations in this study. The first of which, was the unknown influence of the experimental manipulation. It is unknown to what extent the content of the parent training descriptions contributed to the non-significant results between the two descriptions. The results of the pilot study indicated that participants may not have perceived differences in the attributions of responsibility implied in the two descriptions. Using the treatment descriptions despite the mixed results from the pilot study, likely influenced the lack of significant differences in acceptability of the descriptions. As noted earlier, however, there were limitations to how powerful the distinction between the two descriptions could be. For example, although greater differences in acceptability ratings of the two descriptions likely could have been found if the deficit description had been made more pejorative, artificial unacceptability may have been created. Even the least skilled and least experienced therapists would likely not use such a pejorative explanation when presenting parent training.

Another limitation of the current study was the homogeneity and size of the sample. The sample size was smaller than desired, due in part, to the inclusion criteria requiring both partners to participate. Additionally, the sample was taken mostly from one city in the U.S. in which residents tend to be more religious, educated, and wealthier than the general population. While it is possible the results were impacted by the high percentage of parents who identified with the LDS religion, which has a strong focus on family, there is nothing specific in LDS doctrine that would lead one to think that results may be different in any systematic manner. The sample also had less racial and ethnic diversity than would be found in the general population. Thus, results should be generalized with caution. Another limitation of this study was that the sample contained parents who on average, would not actually be candidates for parent training. Perhaps, the acceptability ratings of the two descriptions would have been different if the study had been conducted with parents who needed parent training because the interventions described would have been more salient for them. Although most parents in this study had children who did not have clinically significant behavior problems, there was a small subset of parents who reported clinically significant problems. Given that there was some variation in problem severity, it was appropriate to use this variable as a predictor. However, results may have been different if solely parents of children with behavior problems were included.

Since individuals with an external locus of control find parent training less acceptable, it is important for

future research to examine how to increase treatment acceptability for parents with an external locus of control orientation. Increasing treatment acceptability is important because of the hypothesized relationship between acceptability and treatment compliance (Eckert & Hintze, 2000; Reimers et al., 1987). One possible way to do this is to have treatment providers address parents' misconceptions about whether the parents or the child will be working directly with the clinician and/or provide services that engage both the parent and the child when a parent has an external locus of control. Another way to increase acceptability in those with an external parental locus of control may be to emphasize the importance of parents in the management of their child's behavior when initially presenting the intervention. This could be thought of as a pre-intervention in order to increase parents' beliefs in their influence and control as parents.

Future research should also examine how to increase treatment acceptability of parent training for fathers. One suggestion is for practitioners to share with families the expectation that fathers will be involved in treatment (Fabiano, 2007). This would require practitioners to actively engage fathers in treatment perhaps by reaching out specifically to them to encourage their participation (Ramchandani & Iles, 2014). It would also be useful for practitioners to present child behavior problems and remediating them through parent training as a normative experience to make participating in the intervention less threatening for fathers (Addis & Mahalik, 2003). Additionally, there may be structural changes that a practitioner can make to encourage father participation including providing flexible scheduling of appointments and childcare so that both parents can attend (Fabiano, 2007). Treatments that focus on the aspects of parenting that fathers are most involved in (e.g., recreation) may also increase acceptability for fathers (Frank, Keown, Ditman, & Sanders, 2014).

Additionally, future research should replicate the current study with a sample of parents who have children with clinically significant levels of behavior problems. It may be useful to conduct a study with a sample of parents who are on a waiting list for behavioral intervention services for their children. Parents of children with significant behavior problems may be more sensitive to the rationale presented for parent training. Future research could also examine whether the introduction of interpersonal variables, not present in a written script, such as tone of voice, facial expression, and body language influence acceptability of treatment rationales. It would be useful for future studies to have participants view video recordings of a therapist presenting the parent training rationales and then rate the acceptability of the two descriptions. It is possible that if participants are able to see and hear the therapist present the parent training rationales, differences in acceptability between the two descriptions may increase.

Ultimately, the results of the current study suggested that a parent's locus of control orientation matters when it comes to the acceptability of parent training interventions. It is also apparent that mothers find parenting interventions more acceptable than fathers. However, acceptability was not influenced by the way the parenting interventions were described. In the future, parenting interventions may consider parent variables such as locus of control and gender and place less emphasis on treatment rationales presented at the outset of treatment.

Conflict of Interest: The authors declare that they have no conflict of interest.

Ethical Approval: All procedures performed in studies involving human participants were in accordance with the ethical standards of the institutional and/or national research committee and with the 1964 Helsinki declaration and its later amendments or comparable ethical standards.

Informed consent: Informed consent was obtained from all individual participants included in the study.

References

- Addis, M. E., & Mahalik, J. R. (2003). Men, masculinity, and the contexts of help seeking. *American Psychologist*, *58*, 5-14. doi:10.1037/0003-066X.58.1.5
- Barkley, R. A. (1997). *Defiant children: A clinician's manual for assessment and parent training* (2nd ed.). New York, NY: The Guilford Press.
- Barkley, R.A., Edwards, G. H., & Robin, A.L. (1999). *Defiant teens: A clinician's manual for assessment and family intervention*. New York, NY: The Guilford Press.
- Bennett, E., English, M. W., Rennoldson, M., & Starza-Smith, A. (2013). Predicting parenting stress in caregivers of children with brain tumours. *Psycho-Oncology*, *22*, 629-636. doi:10.1002/pon.3047
- Bennett, D. S., Power, T. J., Rostain, A. L., & Carr, D. E. (1996). Parent acceptability and feasibility of ADHD interventions: Assessment, correlates, and predictive validity. *Journal of Pediatric Psychology*, *21*, 643-657. doi: 10.1093/jpepsy/ 21.5.643
- Boggs, S. R., Eyberg, S., & Reynolds, L. A. (1990). Concurrent validity of the Eyberg Child Behavior Inventory. *Journal of Clinical Child Psychology*, *19*, 75-78. doi: 10.1207/s15374424jccp1901_9
- Borrego, J., Ibanez, E. S., Spendlove, S. J., & Pemberton, J. R. (2007). Treatment acceptability among Mexican American parents. *Behavior Therapy*, *38*, 218-227. doi: 10.1016/j.beth.2006.08.007
- Brestan, E. V., Jacobs, J. R., Rayfield, A. D., & Eyberg, S. M. (1999). A consumer satisfaction measure for parent-child treatments and its relation to measures of child behavior change. *Behavior Therapy*, *30*, 17-30. doi: [http://dx.doi.org/ 10.1016/S0005-7894\(99\)80043-4](http://dx.doi.org/10.1016/S0005-7894(99)80043-4)
- Calvert, S. C., & McMahon, R. J. (1987). The treatment acceptability of a behavioral parent training program and its components. *Behavior Therapy*, *18*, 165-179. doi: 10.1016/S0005-7894(87)80040-0
- Campis, L. K., Lyman, R. D., & Prentice-Dunn, S. (1986). The Parental Locus of Control Scale: Development and validation. *Journal of Clinical Child Psychology*, *15*, 260-267.
- Carter, S. L. (2007). Review of recent treatment acceptability research. *Education & Training in Developmental Disabilities*, *42*, 301-316.
- Chacko, A., Wymbs, B. T., Chimiklis, A., Wymbs, F. A., & Pelham, W. E. (2012). Evaluating a comprehensive strategy to improve engagement to group-based behavioral parent training for high-risk families of children with ADHD. *Journal of Abnormal Child Psychology*, *40*, 1351-1362. doi: 10.1007/s10802-012-9666-z

- Chavira, D. A., Stein, M. B., Bailey, K., & Stein, M. T. (2003). Parental Opinions Regarding Treatment for Social Anxiety Disorder in Youth. *Journal Of Developmental And Behavioral Pediatrics, 24*, 315-322. doi:10.1097/00004703-200310000-00002
- Chorpita, B. F. (2003). The frontier of evidence-based practice. In A. E. Kazdin & J. R. Weisz (Eds.), *Evidence-based psychotherapies for children and adolescents* (pp. 42-59). New York, NY: Guilford.
- Cowan, R. J., & Sheridan, S. M. (2003). Investigating the acceptability of behavioral interventions in applied conjoint behavioral consultation: Moving from analog conditions to naturalistic settings. *School Psychology Quarterly, 18*, 1-21. doi: 10.1521/scpq.18.1.1.20877
- Craig, L. (2006). Does fathers care mean fathers share?: A comparison of how mothers and fathers in intact families spend time with children. *Gender & Society, 20*, 259-281. doi: 10.1177/0891243205285212
- Eckert, T. L., & Hintze, J. M. (2000). Behavioral conceptions and applications of acceptability: Issues related to service delivery and research methodology. *School Psychology Quarterly, 15*, 123-148. doi: 10.1037/h0088782
- Eyberg, S. M., Nelson, M. M., & Boggs, S. R. (2008). Evidence-based psychosocial treatments for children and adolescents with disruptive behavior. *Journal Of Clinical Child And Adolescent Psychology, 37*, 215-237. doi:10.1080/15374410701820117
- Eyberg, S. M., & Pincus, D. (1999). *Eyberg Child Behavior Inventory and Sutter-Eyberg Student Behavior Inventory-Revised Professional Manual*. Lutz, FL: Par.
- Fabiano, G. A. (2007). Father participation in behavioral parent training for ADHD: Review and recommendations for increasing inclusion and engagement. *Journal of Family Psychology, 21*, 683-693. doi: 10.1037/0893-3200.21.4.683
- Fernandez, M. A., Butler, A. M., & Eyberg, S. M. (2011). Treatment outcome for low socioeconomic status African American families in parent-child interaction therapy: A pilot study. *Child & Family Behavior Therapy, 33*, 32-48. doi: 10.1080/07317107.2011.545011
- Fernandez, M. A., & Eyberg, S. M. (2009). Predicting treatment and follow-up attrition in parent-child interaction therapy. *Journal of Abnormal Child Psychology, 37*, 431-441. doi: 10.1007/s10802-008-9281-1
- Frank, T. J., Keown, L. J., Dittman, C. K., & Sanders, M. R. (2014). Using father preference data to increase father engagement in evidence-based parenting programs. *Journal of Child & Family Studies, 24*, 937-947.

doi:10.1007/s10826-014-9904-9

Freed, R. C., & Tompson, M. C. (2011). Predictors of parental locus of control in mothers of pre- and early adolescents. *Journal of Clinical Child & Adolescent Psychology, 40*, 100-110.

Friars, P. M., & Mellor, D. J. (2009). Drop-out from parenting training programmes: A retrospective study. *Journal of Child & Adolescent Mental Health, 2*, 29-38. doi: 10.2989/JCAMH.2009.21.1.5.807

Funderburk, B. W., Eyberg, S. M., Rich, B. A., & Behar, L. (2003). Further psychometric evaluation of the Eyberg and Behar rating scales for parents and teachers of preschoolers. *Early Education & Development, 14*, 67-81. doi: 10.1207/s15566935eed1401_5

Hagekull, B., Bohlin, G., & Hammarberg, A. (2001). The role of parental perceived control in child development: A longitudinal study. *International Journal of Behavioral Development, 25*, 429-437.

doi:10.1080/016502501316934851

Hassall, R., Rose, J., & McDonald, J. (2005). Parenting stress in mothers of children with an intellectual disability: The effects of parental cognitions in relation to child characteristics and family support. *Journal of Intellectual Disability Research, 49*, 405-418. doi:10.1111/j.1365-2788.2005.00673.x

Hoza, B., Owens, J. S., Pelham, W. J., Swanson, J. M., Conners, C. K., Hinshaw, S. P., ... Kraemer, H. C. (2000). Parent cognitions as predictors of child treatment response in attention-deficit/hyperactivity disorder. *Journal of Abnormal Child Psychology, 28*, 569-583. doi:10.1023/A:1005135232068

Johnston, C., Hommersen, P., & Seipp, C. (2008). Acceptability of behavioral and pharmacological treatments for attention-deficit/hyperactivity disorder: Relations to child and parent characteristics. *Behavior Therapy, 39*, 22-32. doi: 10.1016/j.beth.2007.04.002

Kazdin, A. E. (1980). Acceptability of alternative treatments for deviant child behavior. *Journal of Applied Behavior Analysis, 13*, 259-273. doi: 10.1901/jaba.1980.13-259

Kazdin, A. E. (1981). Acceptability of child treatment techniques: The influence of treatment efficacy and adverse side effects. *Behavior Therapy, 12*, 493-506. doi: 10.1016/S0005-7894(81)80087-1

Kazdin, A. E. (1996). Dropping out of child psychotherapy: Issues for research and implications for practice. *Clinical Child Psychology and Psychiatry, 1*, 133-156. doi: 10.1177/1359104596011012

- Kazdin, A. E., Holland, L., & Crowley, M. (1997). Family experience of barriers to treatment and premature termination from child therapy. *Journal of Consulting and Clinical Psychology, 65*, 453-463. doi:10.1037/0022-006X.65.3.453
- Kelley, M. L., Heffer, R. W., Gresham, F. M., & Elliott, S. N. (1989). Development of a modified Treatment Evaluation Inventory. *Journal of Psychopathology & Behavioral Assessment, 11*, 235-247. doi: 10.1007/BF00960495
- Lanfranchi, S., & Vianello, R. (2012). Stress, locus of control, and family cohesion and adaptability in parents of children with Down, Williams, Fragile X, and Prader-Willi Syndromes. *American Journal of Intellectual & Developmental Disabilities, 117*, 207-224. doi: 10.1352/1944-7558-117.3.207
- Lamb, M. E. (2010). *The role of the father in child development* (5th ed.). Hoboken, NJ: Wiley.
- Lee, C. M., Horvath, C., & Hunsley, J. (2013). Does it work in the real world? The effectiveness of treatments for psychological problems in children and adolescents. *Professional Psychology: Research And Practice, 44*, 81-88. doi:10.1037/a0031133
- Lundahl, B. W., Tollefson, D., Risser, H., & Lovejoy, M. C. (2008). A meta-analysis of father involvement in parent training. *Research on Social Work Practice, 18*, 97-106. doi: 10.1177/1049731507309828
- MacKenzie, E. P., Fite, P. J., & Bates, J. E. (2004). Predicting outcome in behavioral parent training: Expected and unexpected results. *Child & Family Behavior Therapy, 26*, 37-53. doi: 10.1300/J019v26n02_03
- Mah, J. W. T., & Johnston, C. (2008). Parental social cognitions: Considerations in the acceptability of and engagement in behavioral parent training. *Clinical Child Family Psychology Review, 11*, 218-236. DOI 10.1007/s10567-008-0038-8
- McNeil, C. B., & Hembree-Kigin, T. L. (2010). *Parent-child interaction therapy issues in clinical child psychology* [ebook]. Retrieved from <http://dx.doi.org/10.1007/978-0-387-88639-8>
- Miller, D. L., & Kelley, M. L. (1992). Treatment acceptability: The effects of parent gender, marital adjustment, and child behavior. *Child & Family Behavior Therapy, 14*, 11-23. doi: 10.1300/J019v14n01_02
- Miller, G. E., & Prinz, R. J. (2003). Engagement of families in treatment for childhood conduct problems. *Behavior Therapy, 34*, 517-534. doi:10.1016/S0005-7894(03)80033-3
- Morrissey-Kane, E., & Prinz, R. J. (1999). Engagement in child and adolescent treatment: The role of parental cognitions and attributions. *Clinical Child & Family Psychology Review, 2*, 183-198.

doi:10.1023/A:1021807106455

- Nock, M. K., & Kazdin, A. E. (2005). Randomized controlled trial of a brief intervention for increasing participation in parent management training. *Journal of Consulting & Clinical Psychology, 73*, 872-879. doi: 10.1037/0022-006X.73.5.872
- Peters, S., Calam, R., & Harrington, R. (2005). Maternal attributions and expressed emotion as predictors of attendance at parent management training. *Journal of Child Psychology & Psychiatry, 46*, 436-448. doi: 10.1111/j.1469-7610.2004.00365.x
- Ramchandani, P., & Iles, J. (2014). Commentary: Getting fathers into parenting programmes—A reflection on Panter-Brick et al. (2014). *Journal of Child Psychology & Psychiatry, 55*, 1213-1214. doi:10.1111/jcpp.12321
- Reimers, T. M., Wacker, D. P., Cooper, L. J., & de Raad, A. O. (1992). Acceptability of behavioral treatments for children: Analog and naturalistic evaluations by parents. *School Psychology Review, 21*, 628-643.
- Reimers, T. M., Wacker, D. P., & Koepl, G. (1987). Acceptability of behavioral interventions: A review of the literature. *School Psychology Review, 16*, 212-227.
- Rotter, J. B. (1966). Generalized expectancies for internal vs. external control of reinforcement. *Psychological Monographs, 80*, 1-28.
- Rubinstein, G. (2004). Locus of control and helplessness: Gender differences among bereaved parents. *Death Studies, 28*, 211-223. doi:10.1080/07481180490276553
- Silverman, W. K., Ortiz, C. D., Viswesvaran, C., Burns, B. J., Kolko, D. J., Putnam, F. W., & Amaya-Jackson, L. (2008). Evidence-based psychosocial treatments for children and adolescents exposed to traumatic events. *Journal of Clinical Child & Adolescent Psychology, 37*, 156-183. doi: 10.1080/15374410701818293
- Stewart, L. S., & Carlson, J. S. (2010). Investigating parental acceptability of the incredible years self-administered parent training program for children presenting externalizing behavior problems. *Journal of Applied School Psychology, 26*, 162-175. doi: 10.1080/15377901003709369
- Thomas, R., & Zimmer-Gembeck, M. J. (2007). Behavioral outcomes of parent-child interaction therapy and Triple P-Positive Parenting Program: A review and meta-analysis. *Journal of Abnormal Child Psychology, 35*, 475-495. doi: 10.1007/s10802-007-9104-9
- Tiano, J. D. (2008). *Comparing mothers and fathers on acceptability of parent-training approaches, knowledge of*

behavioral principles, and parenting behaviors. Unpublished manuscript. Retrieved from

<http://search.ebscohost.com/login.aspx?direct=true&db= psych&AN=2008-99040-108&site=ehost-live>

Available from EBSCOhost psych database

Tiano, J. D., Grate, R. M., & McNeil, C. B. (2013). Comparison of mothers' and fathers' opinions of parent-child interaction therapy. *Child & Family Behavior Therapy, 35*, 110-131. doi:10.1080/07317107.2013.789358

Tone, E. B., Goodfellow, S., & Nowicki, S. J. (2012). Father locus of control and child emotional and behavioral outcomes: A prospective study. *The Journal of Genetic Psychology: Research & Theory On Human Development, 173*, 3-22. doi:10.1080/00221325.2011.571307

U.S. Bureau of Labor Statistics. (2014). *American time use survey-2013 results*. Retrieved from

<http://www.bls.gov/news.release/atus.nr0.htm>

Wickstrom, K. F., Jones, K. M., LaFleur, L. H., & Witt, J. C. (1998). An analysis of treatment integrity in school-based behavioral consultation. *School Psychology Quarterly, 13*, 141-154.

Wong, J. J., Roubinov, D. S., Gonzales, N. A., Dumka, L. E., & Millsap, R. E. (2013). Father enrollment and participation in a parenting intervention: Personal and contextual predictors. *Family Process, 52*, 440-454. doi:10.1111/famp.12024

Table 1 *Family Characteristics*

Variable	Mean	SD	%	<i>n</i>
Number of children per family	3.00	1.26		
Marital status				
Married			87.2	34
Divorced/remarried			12.8	5
Income				
< \$15,000			10.3	4
\$15,000 - \$30,000			23.1	9
\$30,000 - \$45,000			12.8	5
\$45,000 - \$60,000			10.3	4
\$60,000 - \$75,000			20.5	8
> \$75,000			20.5	8

Table 2 *Mother and Father Characteristics*

Variable	Mothers				Fathers			
	Mean	<i>SD</i>	%	<i>n</i>	Mean	<i>SD</i>	%	<i>n</i>
Age	31.92	6.32			34.90	8.30		
Education								
High school graduate (GED)			12.8	5			12.8	5
Some collage/trade school/associate degree			59.0	23			43.6	17
College graduate/bachelor's degree			25.6	10			23.1	9
Graduate or professional degree			2.6	1			20.5	8
Received mental health services for self			48.7	19			23.1	9
Attended parenting classes			48.7	19			30.8	12

Table 3

Descriptive Statistics for TEI-SF, ECBI, and PLOC

Variables	Mothers			Fathers			Total		
	<i>M</i>	<i>SD</i>	Range	<i>M</i>	<i>SD</i>	Range	<i>M</i>	<i>SD</i>	Range
TEI-SF scores for Deficit description	36.00	4.51	26 - 43	33.25	3.95	26 - 42	34.63	4.41	26-43
TEI-SF Scores for Empowerment description	35.05	4.53	27 - 43	34.00	3.97	26 - 41	34.53	4.24	26-43
ECBI total raw score	108.21	26.85	60 - 179	118.54	29.68	61 - 180	113.37	28.60	60-180
ECBI total <i>t</i> score	53.31	7.61	40 - 73	56.15	8.40	40 - 74	54.73	8.09	40-74
PLOC score	110.23	15.89	82 - 150	107.59	16.70	71 - 134	108.91	16.25	71-150

Table 4

Linear Regression Analysis of TEI-SF Scores for Fathers and Mothers

Variable	<i>B</i>	<i>SE B</i>	β	<i>t</i>	<i>p</i>
Father PLOC	-.14	.03	-.59	-4.20	< .001
Father ECBI	.01	.02	.11	.77	.447
Mother PLOC	-.17	.05	-.60	-3.26	.002
Mother ECBI	.06	.03	.34	1.84	.074