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The Results of a Targeted Open Trial of the Fun FRIENDS Combined with a Concurrent Parent-Based Intervention

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Abstract

The purpose of this study was to assess an open trial of the Fun FRIENDS program, as an early intervention for referred young children with internalizing symptoms, combined with the simultaneous administration of an adult resilience building program with parents. More specifically, 178 children, ranging in age from 5 to 7, and their parents participated in concurrent intervention programs, as children participated in the Fun FRIENDS program parents participated in the Strong Not Tough: Adult Resilience Program. Based on assessment from pre to post-intervention, significant improvements were found in both child and parent functioning, including reductions in internalizing symptoms and increases in levels of resilience. Also, for mothers, reduction in parent-related stress from pre to post-intervention predicted levels of child anxiety at post-intervention. Overall, the results of this study provide support for the positive impact of Fun FRIENDS enhanced with an adult resilience building program for parents.

Keywords: anxiety; child; preschool; parent; early intervention; internalizing symptoms; Fun FRIENDS

Based on large-scale epidemiological studies, psychiatric disorders are a common occurrence in preschool-aged populations, with prevalence rates typically exceeding 10% (Egger & Angold, 2006; Gudmundsson, Magnusson, Saemundsen, Lauth, Baldursson, Skarphedinsson, & Fombonne, 2013), and contrary to the premise that young children will typically outgrow their symptoms, psychiatric symptoms in preschool-aged children have been found to be relatively stable over time (Bufferd, Dougherty, Carlson, Rose, & Klien, 2012; Goodwin, Sourander, Duarte, Niemela, & Multimaki, 2009; Luby, 2012; Porche, Fortuna, Lin, & Algeria, 2011). It is noteworthy that internalizing symptoms, especially anxiety symptoms, exhibit an unusually high prevalence rate in preschool-aged children (e.g., Egger & Angold, 2006). Consequently, evidence-based interventions focused on the reduction of symptoms and enhancement of resilience may be needed (Li-Grining & Durlak, 2014).

In response to the above mentioned needs, the Fun FRIENDS program was developed as an approach to reduce psychological distress, with a particular emphasis on internalizing symptoms, and improved resilience in preschool-aged children (Barrett, 2007a and 2007b). Utilizing a play-based, cognitive-behavioral approach, the program targets the five key socio-emotional areas in order to decrease internalizing symptoms: (1) Self-Awareness (2) Self-Management (3) Social Awareness (4) Relationship Skills and (5) Responsible Decision-Making in a developmentally appropriate manner (Collaborative for Academic, Social, and Emotional Learning, 2005). The program teaches skills such as progressive muscle relaxation, mindfulness, cognitive restructuring, and coping step plans in order with the goal of decreasing anxiety and depressive symptoms. Standard delivery of the Fun FRIENDS program also includes two parent

sessions to provide psychoeducation about anxiety and depression, as well as resilience and parenting skills training.

The Fun FRIENDS program has been found to be effective as a universal prevention and as a treatment protocol for internalizing disorders (Anticich, Barrett, Silverman, Lacharez, & Gillies, 2013; Barrett, Fisak, & Cooper, 2015; Pahl & Barrett, 2010). In particular, Pahl and Barrett (2010) conducted a universal school-based trial of the Fun FRIENDS program. Based on teacher report, children receiving the program showed improvements in socio-emotional competence/resilience and decreases in inhibited temperament from pre to post-intervention. Based on parent-report, socio-emotional competence improved pre to post-intervention and from pre-intervention to 12-month follow-up. Further, decreases in anxiety symptoms and shyness were also reported. However, no differences were found between the intervention group and a waitlist control group at immediate post-intervention, and differences between the control group and intervention group were not assessed at 12-month follow-up, as data were not available for the comparison group.

In a follow-up study, Anticich et al. (2013) conducted a second universal school-based trial. In addition to the intervention group, the study included an active comparison group (a second skills-based program more consistent with treatment as usual) and a waitlist control group. The active comparison group was a program called *You Can Do It* (Ashdown & Bernard, 2012). Schools were randomly allocated to one of the groups, and data were collected from both caregivers and teachers. Based on parent-report data at post-intervention, the Fun FRIENDS group and the active comparison group demonstrated significantly larger reductions in behavioral difficulties, behavioral inhibition, and greater improvements in socio-emotional competence relative to the waitlist control group. Further, the Fun FRIENDS group exhibited

greater improvements in socio-emotional competence, behavioral difficulties, and behavioral inhibition relative to the active comparison group at 12-month follow-up. Regarding teacher report, participants in the Fun FRIENDS group exhibited the greatest improvements in protective factors at post-intervention and follow-up.

Finally, regarding the effectiveness of the Fun FRIENDS program as a treatment protocol, Barrett et al. (2015) conducted an open trial (i.e., pre to post-intervention assessment in the absence of a comparison group) of Fun FRIENDS in a sample of referred preschool-aged children diagnosed with at least one anxiety disorder. Significant improvements on measures of child resilience/socio-emotional competence, anxiety, and shyness were observed at the completion of the intervention, and these gains were maintained at 12-month follow-up. Further, after the completion of the program, a mean reduction in the number of anxiety diagnoses was found from pre to post-intervention.

The above mentioned studies provide initial evidence for the effectiveness of the Fun FRIENDS program. However, parent contact in the above trials was limited to two sessions, and much of this content was focused on psychoeducation about anxiety and depression, parenting strategies and the enhancement of child resilience. For a number of reasons, it is likely that a more intensive intervention, with an increased emphasis on the building of resilience in parents, may enhance the effectiveness of Fun FRIENDS and related early intervention programs. In particular, there is substantial evidence to suggest that level of parent functioning and adjustment has an impact on child functioning. For example, consistent support has been found for the idea that both internalizing and externalizing symptoms in children are associated with parent psychopathology and with less adaptive parenting behaviours (Connell & Goodman, 2002; Essau & Sasagawa, 2008; Hemphill, 1996; van Santvoort, Hosman, van Doesum, & Janssens, 2014;

Yap, Pilkington, Ryan, & Jorm, 2014). Other studies have found higher levels of parent stress to be associated with adjustment difficulties in children (e.g., Pahl, Barrett, & Gullo, 2012). Further, parental distress and psychopathology have been found to be negatively associated with outcome in child intervention programs (Bodden et al., 2008; Creswell, Willetts, Murray, Singhal, & Cooper, 2008).

Collectively, the above findings imply an association between parent functioning, including the level of stress, and child adjustment. Consequently, interventions designed to enhance parent functioning and resilience may have an indirect, positive impact on child functioning, and as a result, the addition of parent-based interventions designed to improve adult functioning and resilience may provide added benefit child-based intervention programs. For example, improved parent resilience may lead to improvement in the quality of parent-child interactions through better emotion regulation and the modeling of positive coping strategies. Essentially, simultaneous resilience building interventions for children showing internalizing symptoms and their parents may create two mechanisms or pathways to enhance child resilience and to prevent the onset and progression of psychiatric symptoms. More specifically, parent resilience building may have an added benefit to children beyond the direct benefits of participating in Fun FRIENDS and related programs. Although this seems to be a promising line of research, the most parent-based interventions seem to emphasize the management of child symptoms, and the minimal emphasis seems to be placed on parent functioning and resilience building.

Overall, the purpose of the current study was to evaluate an open trial of the Fun FRIENDS program, as an early intervention for referred young children with internalizing symptoms, combined with a concurrent parent-focused resilience building intervention, named as

the Strong Not Tough: Adult Resilience Program (Barrett, 2012a; Barrett, 2012b). First, it was hypothesized that children would exhibit improvements in measures of psychological functioning following the completion of the Fun FRIENDS program. In particular, the authors anticipated significant decreases in anxiety symptoms, decreases in depression symptoms, decreases in general psychological symptoms, and improvement in psychosocial strengths. Second, it was hypothesized that parents would exhibit improvements in measures psychological functioning following the completion of the adult resilience program. More specifically, the authors predicted that parents would exhibit decreases in anxiety, depression, and decreases in parent stress, especially in relation to parent-child interactions. Finally, it was hypothesized that decreases in parent-related stress from pre to post-intervention would be associated with lower child anxiety scores at post-intervention. If supported, this finding would suggest that improvement in parent functioning is associated with improvement in child functioning.

Method

Procedure

The programs were offered as standard intervention for preschool-aged children referred to an outpatient, community clinic located in an urban area of Brisbane, Australia. Referrals included a variety of presenting problems, but the sample consisted predominantly of children with emerging internalizing symptoms, including anxiety and/or depression symptoms. As an early intervention program, at the indicated level, a psychiatric disorder was not required to participate. Children were required to be between the ages of 4 and 7, and exclusion criteria included intellectual disability and autism spectrum disorder. The majority of families were referred to the clinic by their GP's with the remainder referred from school counselors or pediatricians. The study was conducted within the context of typical patient flow through the

clinic. Families were invited to participate, but clinical services were provided regardless of the decision to participate. Parents were fully informed regarding research procedures as well as the risks and benefits of involvement in the study. Furthermore, parents were also informed that participation in the research was completely voluntary and that they would be able to withdraw at any time without impact on the clinical services that were provided. Informed consent was obtained from all participants included in the study. Parents who consented to participate were asked to complete an online survey packets, focused on the child's functioning and the parent's functioning, at pre and post-intervention. The same parent that completed the measures at pre-intervention also completed the measures at post-intervention. Ethics approval was received for this research from both the University of Queensland and Australian National University.

Participants

At pre-intervention, participation was approximately 90%, and data assessing parent-report of child functioning collected at pre-intervention. Although attrition from the program was rare, 178 participants completed pre-intervention survey packets. However, only 111 participants completed post-intervention packets. Participating children were between the ages of 5-7 years (M = 5.27, SD = 0.93), and 41.5% of the children were female. The approximate ethnic distribution was as follows: 50% Anglo Saxon, 20% Mediterranean, 30% Middle Eastern. In this study, 90% of the families were entact. Finally, program completion rate was approxinatly 95%.

Participating parents were also asked to complete self-report measures about to their own functioning. One hundred mothers provide complete data from pre to post-intervention, and 59 fathers provide complete data from pre to post-intervention. Among the parents who completed packets through post-intervention, participation was as follows: 41 mothers only, 55 both parents, and four father only.

Measures

A battery of self-report questionnaires was completed by parents at two different time points, at pre-intervention and at immediate post intervention (1-2 weeks). Description of the measures is presented below.

Measures assessing child functioning.

The Preschool Anxiety Scale (PAS). The PAS is a 34-item parent-rating scale designed to assess childhood anxiety symptoms (Spence, Rapee, McDonald, & Ingram, 2001). The PAS was developed from the Spence Children's Anxiety Scale (Spence, 1997) and is normed for use with young children ages 4 to 6 years-old. It consists of 28 items, as well as six non-scored items regarding trauma and post-traumatic stress symptomology. A total score is calculated based on five subscales including separation anxiety, physical injury fears, social anxiety, obsessive-compulsive disorder and generalized anxiety. The measure possesses good psychometric properties, including an established factor structure and strong correlations with other measures of internalizing problems (Spence et al., 2001). In the current study, Cronbach's alpha was .90. In the current sample, the measure was administered to the parents of children who were five years-of-age and younger.

The Spence Children´s Anxiety Scale (SCAS). The parent-report version of the SCAS is a 44-item scale assessing anxiety symptoms in children ages 6 to 18 years old (Nauta, Scholing, Rapee, Abbott, Spence, & Waters, 2004). Six subscales, corresponding to anxiety disorders are developed from the anxiety items: obsessive-compulsive disorder, separation anxiety, social anxiety, panic/agoraphobia, generalized anxiety and physical injury fears, and a total score is obtained by adding all the subscales (Nauta et al., 2004). Parents rated each symptom on a 4-point scale corresponding to the frequency with which they experience each symptom; higher

scores reflecting higher symptomatology. The SCAS has demonstrated good psychometric properties including adequate internal consistency and good convergent and divergent validity (Nauta et al., 2004). In the current study, Cronbach's alpha was .92. In the current sample, the SCAS was administered to the parents of children who were older than 5.

Strengths and Difficulties Questionnaire (SDQ). The SDQ is a brief, parent-report measure designed to assess behavioral difficulties and competencies in children aged 3 – 16 years-of-age (Goodman, 1997). The instrument is comprised of 25 items that evaluate attributes across several domains of functioning. The Prosocial Behaviors and Total Difficulties subscales of the SDQ were used in the current study. Regarding psychometric properties, the SDQ has been shown to possess good specificity and moderate sensitivity in identifying psychiatric diagnoses for both community and clinical populations (Goodman, Ford, Simmons, Gatward, & Meltzer 2000; Goodman, Renfrew & Mullick, 2000). In the current sample, Cronbach's alpha was .75 (Prosocial= .70, Total Difficulties= .82).

Children's Depression Inventory (CDI). The parent-report version of the CDI is a measure designed to assess depressive symptomology (Kovacs, 1992). More specifically, items assess depressive symptoms such as sadness, self-blame, loss of appetite, interpersonal relationships, and school adjustment. For each item, participants choose a statement from three alternatives, with each alternative increasing symptom severity. High internal reliability and consistency were reported within a community sample of children and youth (Cole, Hoffman, Tram & Maxwell, 2000). It is noteworthy that limited normative data is available for CDI for preschool-aged children. However, the measure was selected because it is a benchmark measure of depression in child populations, and it has been used with children as young as 5-years-of-age in previous research (e.g., Richey et al., 2009). In the current sample Cronbach's alpha was .87.

Measures of parent functioning.

Depression Anxiety and Stress Scales– Short form (DASS-21). The DASS-21 is a 21-item self-report questionnaire widely used in clinical and community settings to provide maximum discrimination between core symptoms of depression, anxiety, and stress, to identify the locus of emotional disturbance (Lovibond & Lovibond, 1995a). Evidence of good convergent and discriminant validity has also been found when comparing the DASS-21 with other validated measures of anxiety and depression (Henry & Crawford, 2005). In the current sample, Cronbach's alpha was .92.

Parenting Stress Index-Short Form (PSI-SF). The PSI-SF is a 36-item self-report measure used to assess levels of stress within the parent-child relationship (Abidin, 1995). In addition to a total scale, the measure consists of the three subscales that assess parental distress, parent-child dysfunctional interaction, and parent perceptions of child difficulty. The PSI-SF has demonstrated strong internal consistency, as well as construct validity with other measures related to parental stress (Reitman, Currier, & Stickle, 2002). In the current sample, Cronbach's alpha was .93.

Devereux Adult Resilience Survey (DARS). The DARS is a 23-item self-report measure assessing perceptions of one's own personal strengths. More specifically this measure assesses the following domains: relationships, internal beliefs, self-control and initiative to enable better coping with adversity and daily life stressors. Adequate psychometric properties have been found for the DARS, including adequate internal consistency and adequate convergent validity (Ball & Mackrain, 2009). In the current sample, Cronbach's alpha was .88.

Intervention

The Fun FRIENDS program (Barrett, 2007a and 2007b) was conducted with the intervention group over 10 sessions. Utilizing play-based activities, skills were delivered via developmentally appropriate methods over the one and a half hour sessions. In the final 20 minutes of each session, clinicians met separately with parents to discuss skills introduced during the session, appropriate reinforcement at home, as well as to answer any questions. Each group was led by one facilitator and sessions were conducted as outlined in the Fun FRIENDS Group Leader Manual (Barrett, 2007a). Facilitators must be accredited and have completed an 8-hour training course. Supervision was available on an as needed basis. Furthermore, parents were encouraged to attend two information sessions outlining the program, psychoeducation about internalizing symptoms and providing skills to enhance positive development and reinforce skills taught at home. Each family was provided with the Family Learning Adventure workbook (Barrett, 2007b) containing session-by-session activities.

The Strong Not Tough: Adult Resilience Program (Barrett, 2012a; Barrett, 2012b) was recently developed as an extension of the FRIENDS evidence-based program for individuals aged 16 and older. The intervention was conducted over eight one-hour sessions with parents in a group format. Each group was led by one facilitator, and the sessions were conducted as outlined in the Strong Not Tough: Adult Resilience Program: Guidelines for Facilitators (Barrett, 2012b). Strategies taught in the program include: mindfulness, emotion recognition skills, relaxation skills training, attention training, cognitive restructuring, problem-solving strategies, conflict resolution, and assertiveness training.

Data Analysis Plan

SPSS statistical package version 24 was used for data analysis. A series of repeated-measures t-tests were planned to assess changes in both child and parent functioning from pre to

post-intervention. Further, a series of hierarchical regression analyses were planned to examine the degree to which changes in parent-stress, as measured by the PSI, predicted child anxiety scores at post-intervention. Hierarchical regression was selected in order to control for pre-intervention levels of anxiety and isolate the amount of variance in post-intervention child anxiety scores attributable to changes in levels of parent stress. We excluded missing values case wise.

Results

Child Functioning

A series of t-tests were conducted to assess for potential changes in child anxiety, depression, and resilience from pre to post-intervention. Changes in child depression, anxiety, and resilience from pre to post-intervention were assessed. In regards to younger children, who completed the PAS, significant decreases were found on the PAS, which was completed by the parents of younger children, $t(58)= 4.52$, $p< .001$, and significant changes were found on the SCAS, which was completed by the parents of older children, $t(44)= 7.85$, $p< .001$. Regarding depression, a significant decrease in depression symptoms, as measured by the CDI, $t(109)= 4.12$, $p< .001$, was observed. Regarding the SDQ, significant improvement was found for scores on the Total Difficulties subscale from pre to post-Intervention, $t(110)= 4.99$, $p< .001$; however, the Prosocial Subscale did not change from pre to post-intervention, $t(110)= -0.43$, $p= .67$. Means and standard deviations for all measures assessing child functioning are provided in Table 1.

Parent Resilience and Psychological Functioning

A series of t-tests were conducted to assess for potential changes in parent resilience, anxiety, depression, and parent-related stress from pre to post-intervention. Depression and

anxiety were assessed with the DASS-21, resilience was assessed with the DARS, and parent stress was measured with the PSI-SF. From pre to post-intervention, mothers exhibited significant decreases in levels of anxiety and depression, $t(102)= 3.91$, $p< .001$, significant decreases in parent-related stress, $t(98)= 8.07$, $p< .001$, and significant increases in level of resilience, $t(89)= -4.51$, $p< .001$. From pre to post-intervention, fathers also exhibited significant decreases in levels of anxiety and depression, $t(58)= 3.42$, $p< .01$, significant decreases in parent-related stress, $t(55)= 2.38$, $p< .05$, and significant increases in level of resilience, $t(51)= -3.26$, $p< .01$. Means and standard deviations for all measures assessing parent resilience and psychological functioning are provided in Table 2.

Changes in Parent Functioning and Child Anxiety

A series of hierarchical regression analyses were conducted to determine if changes in maternal stress from pre to post-intervention predicted levels of child anxiety at post-intervention after controlling for levels of child anxiety at pre-intervention. In the first regression, the PAS at post-intervention was the designated criterion variable, and PAS scores at pre-intervention were entered into the first step of the regression equation. Parenting Stress Index (PSI-SF) change was entered into the second step of the regression equation. The addition of the PSI-SF change scores to the second step of the regression equation led to significant improvement in the model, $\Delta R^2= .09$, $F(1,47)= 20.41$, $p< .001$. In a follow-up regression equation, the SCAS at post-intervention was the designated criterion variable, and SCAS scores at pre-intervention were entered into the first step of the regression equation, and change in PSI-SF scores for mothers was entered into the second step of the regression equation. The addition of the PSI-SF change scores to the second step of the regression equation led to significant improvement in the model, $\Delta R^2= .19$, $F(1,29)= 14.20$, $p< .01$.

The hierarchical regression analyses were repeated with father PSI-SF scores entered into the regression equation. Regarding PAS scores, the addition of the father PSI change scores to the second step of the regression did not lead to significant improvement in the model, ΔR^2= .005, $F(1,27)$= 0.51, p= .48. Regarding SCAS scores, the addition of father PSI-SF change scores did not lead to significant improvement in the model, ΔR^2= 0.06, $F(1,16)$= 3.32, p= .09. Collectively the results of these regression equations indicate that reductions in maternal, but not paternal, parent-child stress during the course of treatment were associated with lower child anxiety scores at post-intervention.

Discussion

The purpose of this study was to assess the effectiveness of an open trial of the Fun FRIENDS program, as an early intervention for referred young children with internalizing symptoms, combined with the simultaneous administration of an adult resilience building program with parents. More specifically, as clinic-referred children participated in the Fun FRIENDS program, their parents completed the Strong not Tough: Adult Resilience Program. Changes were assessed from pre to post-intervention, and several hypotheses were tested. First, it was hypothesized that children would exhibit improvements in measures of anxiety, depression, and general psychological functioning following the completion of the program. Second, it was hypothesized that parents would exhibit improvements in measures of anxiety, depression, stress, and resilience following the completion of the adult resilience program. Finally, it was hypothesized that decreases in parenting-related stress from pre to post-intervention would be associated with lower child anxiety scores at post-intervention after controlling for levels of child anxiety at pre-intervention.

Based on most of the measures of child functioning, the first hypothesis was supported, as children exhibited significant decreases in anxiety symptoms, depression symptoms, and general psychological difficulties from pre to post-intervention. This finding provides additional support for the Fun FRIENDS as an effective early intervention to reduce psychopathology, especially anxiety and depression, and improve general psychological functioning in younger children. Further, the findings are consistent with the only other open trial that evaluated the program in a sample of children with elevated symptomology, as Barrett et al. (2015) found similar improvements in a sample of clinically anxious children. In addition, this study adds to a relatively small body literature focused on the effectiveness of play-based, cognitive-behavioral intervention designed to be administered to preschool-aged children with internalizing symptoms.

Regarding the second hypothesis, it is noteworthy that one measure of child functioning, the SDQ- Prosocial Behaviors subscale, did not improve significantly from pre to post-intervention. This finding indicated that parents did not see noticeable changes in child prosocial behaviors from pre to post-intervention. Although it is possible that the program did not have an impact prosocial behaviors, a number of considerations are worthy of discussion. In particular, changes in prosocial behaviors may be less noticeable than the emotional symptoms measured by the Emotional Symptoms subscale of the SDQ. The Emotional Symptoms subscale of the SQD measures externalizing behaviors, which are often particularly noticeable to parents and disruptive to family routines. It is also possible that the impact of the program on prosocial behaviors accumulates over time, and as a result, change is not observable immediately following intervention. Follow-up studies are recommended to assess the longer term impact of Fun FRIENDS on prosocial behaviors.

The second hypothesis was supported, as both mothers and fathers reported significant decreases in levels of anxiety and depression, decreased parent-related stress, and improved resilience from pre to post-intervention. These findings provide evidence imply that effects of parent participation in the Strong Not Tough: Adult Resilience Program, and add to the literature regarding the effectiveness of adult-resilience building programs. Further, based on the current approach to early intervention, support for the third hypothesis is contingent upon support for the second hypothesis.

Interestingly, the third hypothesis was supported for mothers but not fathers. In particular, decreases in parenting-related stress from pre to post-intervention, as reported by mothers, was associated with lower child anxiety scores at post-intervention. In contrast, changes in parent-child stress, as reported by fathers, was not significantly associated with lower child anxiety scores at post-intervention. There are a number of possible explanations for these disparate findings. In general, fathers had lower baseline scores at pre-intervention, and although scores decreased significantly from pre to post-intervention, the change in father scores was smaller in magnitude relative to mothers. With lower baseline scores and less change, it is less likely that change scores would predict child functioning at post-intervention. Another possible explanation for the null findings is that the father sample was smaller than the mother sample leading to reduced statistical power. Finally, although not directly assessed, it is possible that, on average, mothers had more direct contact with their children relative to fathers.

Although the findings of the current study should be considered preliminary, the current findings have relevant implications for early intervention. In particular, it appears that parent resilience building may enhance the effectiveness of child-based interventions. More specifically, improvement in parent functioning may have an indirect, positive impact on child

functioning. Although specific mechanisms of change should be considered speculative at this time, it is possible that improved parent resilience may result in increased parental modeling of positive coping skills, decreased modeling of negative coping skills, and more positive parent-child interactions. These changes may, in turn, lead to improvements in child psychological functioning. Further, the current findings fit logically with the idea that parent psychopathology, stress, and less adaptive parenting behaviours have been found to be associated with child psychological functioning and with poorer treatment prognosis in child intervention studies (Barrett, Cooper, & Teoh, 2014; Cobham, Dadds, Spence, 1998; Connell & Goodman, 2002; Essau & Sasagawa, 2008; Yap et al., 2014). Overall, it is possible that improvement in parent functioning leads to improvement in child functioning.

The above findings contribute a research literature of mixed findings in terms of the added benefit of parent-based interventions, including for the treatment of anxiety (see Wei & Kendall, 2014). In the context of these mixed findings, a number of unique features may have led to the potential added benefit of parent intervention in the current study. The first has to do with the developmental level of the children involved in the study. More specifically, parent involvement may be particularly beneficial, and possibly necessary, when implementing interventions with younger children. The second explanation may have to do with the nature of the parent-based intervention. Rather than focusing exclusively on the reduction of child symptomology, the current approach focused on building parent resilience.

In addition to the unique contributions of this study to the research literature, the high completion rate, 95%, is also a strength of this study. A number of features of this study may have led to a high retention rate. Although speculative, this includes the quality of program content, the use of a group format, and the high level of parent involvement. Despite the

strengths this study, a number of limitations and directions for future research are noteworthy. Perhaps the most salient limitation relates to study design, in which a comparison group was not available. The decision to not include a control group was largely due to ethical concerns, as the sample included symptomatic children presenting in a community-based clinic, and limitations related to patient flow through the clinic. The absence of a comparison group makes it difficult to completely rule out certain threats to internal validity, such as maturation or statistical regression (Shadish, Cook, & Campbell, 2002). Although these threats cannot be completely ruled out, research on the trajectory of anxiety symptoms may provide support for the idea that current findings are not simply explained by threats to internal validity. For example, Broeren, Muris, Diamantopoulou, and Baker (2013) explored the trajectory of anxiety symptoms over time using the SCAS and the PAS. The authors found that the groups with low and medium symptomatology showed a stable trajectory over time, and the group with higher levels of symptomatology showed increased levels symptomatology over time for some anxiety disorders and a stable trajectory for others.

Other limitations and directions for future research are noteworthy. In particular, the current study only included outcome data at post-intervention, and as a result, additional studies are needed to assess the effectiveness of the current intervention approach over time. Also, it is recommended follow-up studies utilize other informants, including teacher-report and child self-report of functioning (e.g., Lagattuta, Sayfan, & Bamford, 2012; Luby, Belden, Sullivan, & Spitznagel, 2007). Further, it is recommended that other potentially relevant outcome variables are considered, including measures related to academic outcomes, bullying, and attitudes and motivation towards learning within the school environment and the evaluation of treatment adherence and social validity. More research is also needed on the potential moderators of

treatment outcome, including demographic variables, including structure, parents' relationship status, time spent with the child, and parent diagnostic status. Related to this point, it may be important to examine the relative impact of parent functioning on child functioning based on the gender and age of the child.

Overall, the current study adds to the research supporting the Fun FRIENDS program as an early intervention approach for children presenting with psychiatric symptoms. Further, the study is unique in that it includes simultaneous resilience building interventions for both young children and their parents. Although this is a promising direction, more research is needed to assess the degree to which parent resilience building enhances positive outcomes in young children.

Conflicts of Interest: Paula Barrett is the developer of the Fun FRIENDS and Adults Reslience Programs.

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Table 1 *Descriptive Statistics for Measures of Child Functioning from Pre to Post-Intervention*

	Pre-intervention		Post-intervention			
Measure	Mean	SD	Mean	SD	N	Cohen's d
SDQ- TD	13.14	6.60	11.36	6.20	111	.47
SDQ- PS	6.95	2.36	7.03	2.55	111	.04
CDI	13.93	6.72	11.00	6.03	110	.46
Anxiety						
PAS	29.64	16.12	23.25	14.97	59	.41
SCAS	27.79	15.77	18.58	23.24	45	.47

Notes. SDQ-ES= Strengths and Difficulties Questionnaire- Total Difficulties Subscale, SDQ-PS= Strengths and Difficulties Questionnaire- Prosocial Subscale, PAS= Preschool Anxiety Scale, SCAS= Spence Children´s Anxiety Scale, CDI= Children's Depression Inventory. N represents the number of matched pairs from pre to post-intervention. Ns are lower for the PAS and SCAS, as these measures were administered by age-group. The PAS was administered to the parents of younger children and the SCAS was administered to the parents of older children.

Table 2 *Descriptive Statistics for Measures of Parent Functioning from Pre to Post-Intervention*

	Pre-intervention		Post-intervention			
Measure	Mean	SD	Mean	SD	N	Cohen's d
DASS						
Mothers	9.14	6.90	7.04	6.30	100	.32
Fathers	8.83	8.67	5.78	6.54	59	.40
PSI-SF						
Mothers	85.16	20.33	76.36	18.87	99	.45
Fathers	78.43	21.14	73.11	17.06	56	.28
DARS						
Mothers	36.09	6.59	38.02	6.16	90	-.30
Fathers	35.44	7.05	37.40	5.84	52	-.30

Notes: DASS= Depression Anxiety and Stress Scales- 21, PSI-SF= Parenting Stress Index- Short From, DARS= Devereux Adult Resilience Survey. N represents the number of matched pairs from pre to post-intervention