



Beyond the Tag: A Parent Training Experience in the Healthcare Field

Vaccaro M^{1*}, Landollina E², Spadini S², Bollo M², Vaccaro P³, Sinigaglia C², Fruci GM⁴, Aiello N⁵, Monaci P¹ and Bonansea A¹

¹Local Health Authority of Collegno and Pinerolo TO3, Italy

²Department of Psychology, University of Turin, Italy

³Department of Medicine and Surgical Science, University of Magna Graecia, Italy

⁴Stellantis, Italy

⁵Provincial Health Authority of Catanzaro-prevention, food hygiene and nutrition service, Italy

Research Article

Volume 7 Issue 3

Received Date: March 20, 2023

Published Date: May 17, 2023

DOI: 10.23880/eoij-16000305

***Corresponding author:** Marianna Vaccaro, Department of psychology, Azienda Sanitaria Locale di Collegno e Pinerolo TO3, Italy, Email: marianna.vaccaro@aslto3.piemonte.it

Abstract

Behavioral difficulties related to internalizing neurodevelopmental disorders represent one of the main areas of work in clinical practice within pediatric services (Steiner & Remsing, 2007). From 2013 to 2023, there has been an increase in triage visits for behavioral difficulties in the ASL TO3, from 6 to 40 cases per year. Data from the company database show increasing diagnosis of Oppositional Defiant Disorder-ODD, Attention Deficit Hyperactivity Disorder-ADHD, and Conduct Disorder-CD in recent years. Therefore, the Pediatric Psychology SSC Service of TO3 decided to work indirectly on the management of dysfunctional behaviors and emotional self-regulation of children aged 3 to 11 years, by activating Parent Training groups oriented to ACT for parents of children who come to triage with symptoms that suggest the presence of ADHD, ODD, or CD, or having a diagnosis themselves. The goal of the intervention was to reduce parental stress, frustration and feeling of loneliness, hyperactivity and compositionality of the children involved, as well as internalizing difficulties and increasing caregiver awareness of possible appropriate educational strategies. The activation of the Parent Training pilot project within an outpatient pathway of the National Health Service has allowed a wide range of the population to be reached, optimizing resources and time to meet the parents' needs. The results obtained before and after the Parent Training intervention prove its effectiveness.

Keywords: Parent Training; ADHD; DOP; DC; Evidence Based; Parental Distress

Introduction

The studies conducted by Armstrong MB, et al. [1] show an increase in the diagnosis of Oppositional Defiant Disorder (ODD), Attention-Deficit/Hyperactivity Disorder (ADHD),

and Conduct Disorder (CD) in the developmental services of the National Health Service. Supporting this, research conducted by Steiner H, et al. [2] has shown an increase in requests for help related to the presence of externalizing disorders in childhood.

Even before a diagnosis, in the early years of life, parents have a considerable need to understand how to manage specific “problem behaviors” that hinder the child in their daily life, thus creating frustration and sense of powerlessness in the parent [3], affecting their parental self-efficacy [4,5] and generating anxiety, concern, and anger.

In the Italian context, externalizing disorders characterize approximately 8-12% of the community population [6]. Difficulties in managing aggressive emotional states can be predictors of school maladjustment in adolescence, delinquency, substance use, as well as mental health problems in adulthood [7,8] for these reasons, it is important to put in place specific strategies among those that are currently recognized as risk factors, through the activation of early interventions [9].

In Italy, official epidemiological data is published on the ADHD page of the National Institute of Health, but there are noteworthy active studies: in Florence and Perugia, a prevalence of 3.6% is evident (National Institute of Health, 2007); in Friuli Venezia Giulia, a prevalence of 0.43% [10], in Turin, a prevalence of 2.52% [11], in Rome, a prevalence of 0.91% [12]. The prevalence of ADHD and ODD diagnoses is 1% in the population aged between 6-17 years, but a recent study carrying out screening through a questionnaire and subsequent structured clinical evaluation measured a prevalence of 3% in a sample of over 6,000 children and adolescents in middle and lower schools [13]. Finally, other Italian studies show an estimate of 1% for severe disorder up to 3-6% of the pediatric population and a higher prevalence for males (6:1); [14] show a prevalence of 5% in subjects aged 6-11; [15] show a prevalence of 8.2% in subjects aged 7-10; Reffieuna and Bosco in 2006 identified a prevalence of 6.2% in subjects aged 6-10, as confirmed by Vio C, et al. [16].

ADHD symptoms arise in childhood, and most children with ADHD keep manifesting symptoms and disorders into adolescence and adulthood. According to a national survey in 2014, the median age of diagnosis is 7 years; about one-third of children received the diagnosis before age 6. More than half of these children received the first diagnosis from a pediatrician [17]. When individuals with ADHD enter adolescence, their hyperactive and impulsive symptoms tend to decrease, whereas inattentive symptoms tend to persist [18,19]. Learning and language problems are common conditions comorbid with ADHD [20].

The national survey conducted by Danielson ML, et al. [21] among parents shows that 6 out of 10 children with ADHD have at least one other mental, emotional, or behavioral disorder; about 5 out of 10 children with ADHD have behavioral or conduct problems; about 3 out of 10 children with ADHD suffer from anxiety and depression.

Prevalence estimates of ADHD vary depending on differences in research methodologies, various age groups described, and changes in diagnostic criteria over time [22].

Among the different etiopathogenetic aspects identified in the onset and management of the “problem behaviors” present in ADHD, CD, and ODD, behavioral and hereditary aspects [23], family aspects (such as adopted educational practices) [24], and psychosocial aspects (such as the family’s socioeconomic status and perceived levels of stress) [25,26] can be found.

ADHD is a neuropsychiatric disorder with onset in childhood, which is characterized, from a symptomatic point of view, by inattention, impulsivity, and motor hyperactivity. The etiology of ADHD is multifactorial and includes interacting genetic and environmental factors underlying the disorder. According to APA criteria (American Psychiatric Association), the diagnosis requires the presence of at least six symptoms of inattention and/or six symptoms of hyperactivity that must persist for at least 6 months, involving different areas of life and daily activities. These symptoms include various pathological behaviors, for instance inability to pay attention to details, difficulty organizing and completing tasks and activities, as well as motor restlessness and inability to sit still. ADHD arises more easily in school age, where inattention is more debilitating, but onset is early (generally before 3-4 years). The disorder significantly compromises the personal, social, and relational functioning of the child [27].

Most kids with ADHD also meet diagnostic criteria for another mental disorder, and boys are more likely to exhibit externalizing conditions such as oppositional defiant disorder or conduct disorder [28-30]. Recent research has found that girls with ADHD are more likely than boys to have an internalizing condition comorbid such as anxiety or depression [31]. In childhood, ADHD often overlaps with disorders such as Oppositional Defiant Disorder (ODD) and Conduct Disorder (CD). About 30-40% of subjects with ADHD also have specific learning disorders [32].

ODD falls into the category of Disruptive Behavior Disorders, Impulse Control, and Conduct, characterized by conditions that involve problems with self-control of emotions and behaviors. These disorders are characterized by behaviors that violate the rights of others, such as aggression, destruction of property, or that put the person in sharp contrast to social norms or authority figures. In the disorder, emotions such as anger and irritation are experienced, along with polemical and challenging behaviors [27]. It typically has an onset around 8-9 years of age and is more prevalent among prepubescent males. A history of ODD is often present in children who are subsequently diagnosed with Conduct Disorder (CD). ODD usually emerges earlier

(usually around age 6) than CD (onset around age 9). Anyway, many children are diagnosed with ODD in pre-school and adolescence [33]. The first signs of this disorder can appear before the age of 8 and can be already identified at around 4-6 years old [32].

People working in Child Neuropsychiatry and Developmental Psychology services observe that in recent decades externalizing disorders are increasingly present and have increasingly significant consequences [34]. In fact, in the Asl To3 area, from 2013 to 2022, there has been an increase of more than 85% in diagnoses of ADHD, ODD, and CD, going from 6 to 40 cases per year, with an average prevalence of around 13.2% of the total. Specifically, there is an average of about 4% of accesses in triage by children aged between 0 and 7 years with a diagnosis of Conduct and Behavior Disorders, which corresponds to more than 30% of the total cases (in the age range of 0-18 years). A male prevalence (about 70%) compared to females is confirmed, as previously reported by other studies [16].

As stated by Fonagy p, et al. [35], intervention within the family context is a fundamental protective factor both for treating and preventing psychopathological outcomes. For these reasons, in implementing this first pilot project, we chose to execute an intervention centrally aimed at supporting parenthood, as scientific evidence also shows effective results for this type of treatment [36]. Evidence-based interventions to support parenting have been shown to improve parent-child relationships [37], reduce maladaptive behaviors [38,39], perceived stress levels of caregivers [40], and allow them to acquire a more functional educational and parenting style [37,41].

In addition, the experience of a shared reflective space allows the individual parent to observe the critical but also unique aspects of their own child through a change of perspective. Evidence-based interventions formulated on multi-component models of cognitive-behavioral origin have good validity for treating problem behaviors [29,39]. The experience of Parent Training is one of the empirically supported psychosocial treatments for ADHD. Over many years and in many studies, it has been documented that it improves both the child's ADHD behavior and maladaptive parenting behavior, having benefits in further domains, such as parental stress [42].

Within Parent Training groups, it is essential to allow parents to acquire functional behavioral principles and procedures for emotional regulation so that they can model for minors with CD, ADHD, and ODD in learning how to manage reactions and situations, and modify dysfunctional behaviors. The goal is to put into practice the learned skills, also through homework, in order to make them more and

more automatic and applicable in different contexts of daily life.

In the USA, there is a tendency to prefer an integrated approach: clinical, scholastic, and pharmacological (methylphenidate); in Europe, in recent years, attention has been focused on the importance of making an early diagnosis [32]. Literature shows that combining a pharmacological intervention with a behavioral treatment is more effective [21]. The multimodal intervention seems to be the most functional. Specifically, an approach that integrates parental counseling and support with behavioral therapy for the child, parents, and teachers, providing them with practical tools that lay the foundation in behavioral principles and procedures such as the use of token economy and reinforcements, response cost, and the use and effect of punishments to reduce behavior [32,43].

Behavioral therapy is an effective treatment, especially in children under the age of 12 with ADHD, CD, and ODD, as it contributes to develop adaptive behaviors while reducing dysfunctional ones, while increasing child's self-control and self-esteem. Involving families is a key point for the success of the treatment itself.

Parents have the greatest influence on a child's behavior. For young children, it is advisable to focus therapy on parent training because minors are not mature enough to change their own behavior without the support of their parents.

Parent training programs aim to increase awareness and knowledge of ADHD, conduct disorder, or oppositional defiant disorder; developing management skills by parents and modifying dysfunctional behaviors in the relationship with their child. The primary focus of the intervention is on developing greater reflective capacities in parents to help them acquire greater coherence and stability in their educational strategies, in order to improve the parent-child relationship [44].

It is important to create opportunities for parents to discuss and share the difficulties encountered in managing their child's behavior and emotions, including anxiety, anger, frustration, helplessness, feelings of inadequacy and self-efficacy [5,37]. These emotional states indirectly fuel oppositional or conduct behaviors in children [37,45-49]. Children with ADHD, ODD, and CD put a strain on parents and require a very high level of energy expenditure, leading them to activate negative behaviors that amplify the symptoms. Therefore, the most effective interventions to promote family serenity and improve child's behavior are based on the acquisition and refinement of specific parenting skills in managing problem behaviors through Parent Training. Parenting style influences and is influenced by child's behavior [32].

It is essential, therefore, to provide parents with the elements to fully understand the disorder and the factors that favor its management. The objectives of the intervention with parents are the following:

- To develop more functional thoughts about themselves and their parenting abilities.
- To acquire awareness, recognize and interrupt vicious circles that maintain and strengthen problem behavior.
- To learn behavioral techniques aimed at creating an emotionally stable and consistent family environment.
- To focus their attention on their child's positive behaviors, in order to limit the occurrence of undesirable behaviors.

CPP and ACT Interventions Aimed at Parents

The Coping Power Program (CPP) is a cognitive-behavioral treatment developed to define intervention goals and prevent aggression, as well as emotional and behavioral escalation in children [49-51]. It involves separately, in a group experience, both children and parents, in order to improve different aspects of parenting that unconsciously influence the consequences of their children's problem behaviors [52].

Numerous studies show that positive parenting practices have an impact on their children's conduct disorders [53] and how characteristics related to the absence of affection in the parent are correlated with behavioral disorders [54]. The adult's ability to observe their children's needs and to be responsive is related to the interaction patterns internalized in their life journey [55]. Studies by Muratori P, et al. [56] prove that group interventions such as Coping Power Program (CPP) are more effective compared to individual treatments alone.

The intervention addressed to the parents includes different sessions that have different objectives, such as: improving the ability to focus on positive behaviors of their children by recognizing and rewarding them appropriately; strategically ignoring problem behaviors that occur in different contexts; establishing clear rules and expectations by providing effective instructions; improving communication dynamics within the family context by implementing appropriate educational practices; working on the negative consequences of behaviors, and finally, reducing stress levels [57].

The CPP treatment for parents is organized into 16 sessions lasting nine months, but following the study conducted by Lochman JE, et al. [34], in order to better understand how to improve the intensity of the program's effects and its feasibility, some adaptations have been made due to the clinical context and the target audience belonging

to the Child and Adolescent Psychology Service TO3. This study has adapted the CPP addressed to parents regarding the number of sessions and timing in a public service, condensing the validated treatment in the literature into eight sessions lasting two hours to be carried out within two months.

Acceptance and Commitment Therapy (ACT) is a third-generation cognitive-behavioral therapy capable of increasing awareness and acceptance of reality, allowing the individual to take committed actions to cope with adverse events in life. This approach is spreading as an applicative methodology in parenting support paths [58,59], although further research is needed to expand the available data, especially when conceived as group interventions. Recent studies show the effectiveness of using ACT with parents of children with externalizing problems [60,61].

Key aspects of ACT therapy are: promoting the acceptance process through an integrated view of their child's characteristics; improving parents' flexibility in using their resources in stressful situations; enhancing communicative aspects of the parent-child dyad; improving their ability to defuse and detach from non-functional situations and thoughts; developing their choice-making abilities through committed actions in relation to their parenting.

The group consisted of 6 to 9 pairs of parents who met in different outpatient clinics. The intervention was conducted with the presence of a Psychotherapist and two Psychotherapy Trainees with training in ACT and CPP.

Multimodal Approach Features: An Integration of CCP and ACT

The scientific community agrees that externalizing behavior disorders are caused by a combination of various factors that affect the bio-psycho-social development of the individual for this reason, it is important to implement multimodal treatment approaches [2].

The research conducted by Corti C, et al. [62] shows that Behavioral Parent Training has been recognized as one of the most effective treatments for reducing children's behavioral problems and improving family well-being [63-65]. Improves parents' communication and educational skills [66,67].

Traditional Behavioral Parent Training largely ignores parental psychological issues [68,69] and the emotional component. For example, parents governed by verbal rules, such as, "I can't ignore my child's tantrums because other people might judge me a bad parent", may behave ineffectively, paying attention to the child's negative behavior, reinforcing it. This could lead the parent to decrease one's motivation to

learn new behavioral strategies [58,70].

Furthermore, as cited in the article by Corti C, et al. [62], parental psychological difficulties are associated with maladaptive parenting behaviors [71-76] and parental stress involves negative behaviors such as rejection, low heat, control strategies, fight, reactivity, and flight [77,78] and find themselves repeating their own parental learning history. Therapists' empathic and positive behavior aimed at teaching skills can improve clinical outcomes [79].

Parent interventions based on Acceptance and Commitment Therapy [59] are characterized by non-judgmental, open, and loving therapeutic behaviors. Mindfulness strategies are proposed to help parents stay in tune with their emotions, rather than suppress them through avoidance strategies, and to engage in behaviors consistent with their personal values [59,80-85].

ACT aims to activate responsive parenting to promote more constructive problem-solving and communication skills, and in parenting aware of the difficulties the child experiences in complex situations (McCurry & Hayes 2009). Parent training interventions involving the ACT approach teach parents to suppress and control their negative feelings towards the child, which could generate negative consequences [86].

Literature shows how parental psychological flexibility promoted by ACT activates higher levels of parental psychological reactivity and adaptation [87,88] and decreases stress and worry level [76]. They appear better able to respond to their child's emotions with validation and acceptance, resulting in a reduction in the intensity of children's problem behaviors [89]. Some ACT-based Parent Training courses or other mindfulness-based approaches have already been implemented for parents of children with psychiatric diagnoses and have shown promising results [58,83,90-94].

For this reason it was decided to integrate the validated Coping Power protocol [34] with the third generation cognitive-behavioral approach: Acceptance and Commitment Therapy (ACT) [95], creating a structured parenting group experience in 8 weekly sessions. The use of some of the principles of Coping Power could be relevant because this model provides practical guidance on how to make an intervention [96]. At the same time, integrating the processes on which ACT works can improve parents' perception of self-efficacy, allowing them to engage in actions in which they feel more capable in their role [61].

It is important to note that a supportive group intervention, mediated by trained service providers, allows

parents not to feel alone in facing feelings of powerlessness and the condition of strong stress often perceived in managing their children's behaviors, as well as in the communication of the diagnostic outcomes that these behaviors can generate [97,98]. Also for this reason, undergoing a path aimed at acceptance and understanding one's and one's children's functioning is a central element to go beyond the label, placing the family as a protective element not only against difficulties but also against the capabilities of their child, helping the parent to enhance them.

There are few Parent Training interventions focused on the ACT approach for parents of children with ADHD, DC, and DOP. We present the results of a pilot study on an ACT-oriented Parent Training with a specific focus on improving parents' psychological functioning, integrated with the principles and behavioral procedures described by Coping Power. The study's hypothesis is that through the activation of ACT-oriented Parent Training groups in the healthcare setting, parental stress and the two psychological processes correlated with emotional distress according to the ACT structure, namely cognitive fusion and experiential avoidance, can be reduced, and caregivers' awareness of the strategies used can be enhanced. In addition, the aim is also to decrease the hyperactivity and oppositionality of the involved minors, as well as internalizing difficulties. The variables under study were investigated before and after the intervention.

The analyses performed, namely one-way ANOVA and correlations, showed a reduction in general levels of parental stress ($p=0.002$) after participating to the Parent Training program described here. The age target of the sample was chosen based on data in literature, which highlights how important is to act preventively on parents whose children with ADHD, DOP, and DC are between 3 and 11 years old, to avoid negative outcomes in adulthood [99]. The activated Parent Training groups involved a total of 12 pairs of parents, whose children's ages ranged from 3 to 11 years old. As it was a pilot study, for the sake of consent and privacy, only pairs of non-separated parents were included in the group. The groups were held in designated classrooms provided by the Asl To3 institution, in Venaria and Pianezza sites.

Procedures

All the procedures of this research are compliant with the ethical standards of the National Research Committee and the ethical principles of the Declaration of Helsinki 1964. Both parents gave written informed consent to participate in this study. Confidentiality was assured in all phases of the study using a numerical code instead of participants' names. Parents have been subjected to an in-access clinical screening interview, as well as a global functioning

assessment, according to the Children Global Assessment Scale (C-GAS) [85]. To carry on this study, we have decided to use an online self-administered questionnaire, created thanks to the Google Forms functionality, composed by two different sections: the first one composed by the informed consent and by socio-demographic items; the second one composed by the different psychological scales with the aim to study the several psychological constructs. We decided to administer the same questionnaire, ones before the PT and ones after the PT. The data collection started in April 2021.

Materials and Methods

A self-administrated questionnaire was distributed to 23 Italian parents, in particular 11 mothers and 12 fathers. They were parents of children, aged 3 to 7 years, who presented to the service for behavior regulation management issues associated with ADHD and/or ODD diagnosis. Their ages ranged from 36 to 53 years ($M=42, 25$; $SD=4,975$). Participants were asked to provide some personal details such as gender, education, civil status, nationality, occupation and other information about the sons (such as date of birth). One parent (4,3%) had obtained elementary education, 4 parents (17,4%) had completed the middle school diploma, 3 parents (13%) finished high school and 4 parents (17,4%) had a graduation degree. 11 parents (52,2%) have omitted the answer. 12 parents (52,2%) were from Italy, while the remaining subjects (47,8%) of the sample did not respond to the answer. Regarding the occupation, 2 parents (8,6%) did not have a job, 10 parents (43,5%) held a job related to the tertiary sector, while the remaining subjects (47,8%) of the sample did not respond to the answer.

The Alabama Parenting Questionnaire (APQ), created by Frick, is a self-report questionnaire and was used, in the parent form, to investigate and to detect the dimensions of parenting most related to the maintenance of behavioral difficulties. The APQ is composed of 42 items, divided in 6 sub-scales:

- Involvement, these are behaviors that denote active participation of the parent in the child's activities such as play, schoolwork and sports.
- Positive parenting, this subscale includes parental behaviors of encouragement, reinforcement and positive physical interactions with the child.
- Poor monitoring/supervision, these are a series of behaviors to control and monitor of the activities carried out by the child outside the family context.
- Inconsistent discipline, this subscale describes a lack of consistency educational.
- Corporal punishment, this subscale indicates the use of

corporal punishment strategies to manage the child's inappropriate behaviors.

- Other practices, this residual scale includes 6 educational strategies of various kinds. 7 of 42 items measures other behaviors that do not fall under the previous subscales. This scale is structured based on a Likert scale with five points (1=never; 2=almost never; 3= sometimes; 4= often; 5= always).

The Antisocial Process Screening Device (APSD), created by Frick and Hare [100], is a psychological scale used to evaluate psychotic traits in children and adolescents. APSD is the only measure of psychopathic-like traits known for young children ranging from 6 to 13 years of age. There are three available versions: Parent report, Teacher report and Self-report. We used the Parent report version. The APSD is composed of 20 items structured based on Likert scale with three points (0=not at all true; 1=sometimes true; 2= definitely true). There are three subscales: 1) Callous-unemotional (CU) traits - that are considered the basis of the affective dimension of psychopathic personality and can lead to conduct disorder (CD) among young people with a severe persistent and pervasive form of antisocial behavior [101]; 2) Narcissism and 3) Impulsivity.

The Inventory of Callous Unemotional Traits (ICU) is developed by Frick [102] to assess callous-unemotional (CU) traits (e.g., lack of empathy and guilt, emotional expression's poverty). There are five formats available: Parent report, Teacher report, Self report, Parent-report in preschool-age, Teacher-report in preschool-age. We used the parent report version. It's composed of 24 items, 12 in the positive form and 12 negative ones. Every item is evaluated by a Likert scale with four points (0=not at all true; 1=sometimes true; 2=often true; 3=definitely true). There are no subscales.

The COM-BIA scale is a questionnaire included in the BIA (Batteria Italiana per l'ADHD), an Italian battery for the evaluation of ADHD and for the comprehension of specific issues presented by children characterized by impulsivity and inattention, with difficulties in the executive processes, in controlling the response and in memory. This battery was created by Marzocchi and colleagues [103]. The COM-BIA scale is an instrument used to assess the co-presence of two or more syndromes in the same child. It's composed of 30 items, divided in 6 areas, that investigate the most frequent syndromes associated with ADHD: 1) The presence of Tic; 2) Behavioral difficulties (DC); 3) Oppositional defiant behavior (DOP); 4) Communication difficulties, stereotypical and bizarre behavior (AUT); 5) Sadness, restlessness and fatigue (DEP); 6) anxiety and concern (ANS). There are two forms: the parent format and the teachers' format. Every

item is evaluated by a Likert scale with four points (0=never; 1=sometimes; 2=often; 3=always).

The SDAG-BIA scale is another questionnaire included in the BIA [103], used with parents, in fact is aimed at the parents and at the family context. The aim of this scale is to assess and identify symptomatic behaviors for ADHD. The questionnaire is composed of 18 items and two subscales both consist of 9 items: the first one (odd-numbers) refers to the inattention dimension and the second one (even numbers) refers to the impulsivity-hyperactivity dimension. Every item is evaluated by a Likert scale with four points (0=never; 1=sometimes; 2=quite often; 3=very often).

The Parenting Stress Index Fourth Edition Short Form (PSI-4 short form), developed by Abidin and collaborators [104], is a questionnaire that assesses the stress level in the parent-child system and that evaluates the parent-child dyad. The Short Form of the PSI-4 (PSI-4-SF) consists of 36 items, organized into three subscales: 1) Parental Distress (PD); 2) Parent-Child Dysfunctional Interaction (P-CDI); 3) Difficult Child (DC). All 36 items are taken integrally from the full version of the questionnaire. Every item is evaluated by a Likert scale with five points (SD= strongly disagree; D=disagree; U=unsure; A=agreed; SA=strongly agreed). For only three items the subject is asked to choose one of the alternatives that appear below the question.

Data Analysis and Results

Data were processed using SPSS version 20.0, released in 2009 (IBM Corp., Armonk, NY, USA). Descriptive and inferential statistics were performed. In particular, data were subjected to bivariate correlation and to ANOVA. The bivariate correlations were used to assess the presence of a linear relationship among the different scales used; instead, the ANOVA was used to evaluate the presence of differences between before and after Parent Training (PT). Differences

were considered statistically significant if $p < 0.05$.

Presence of bivariate correlation between APQ and APSD. Significant data were found between the subscale of the APQ poor monitoring/supervision and the total scale of APSD, with a negative Pearson correlation coefficient ($r = -.594$; $p=.005$), these results highlight how as activity monitoring decreases, psychopathic traits in children and adolescents increase, or vice versa. There were no significant statistical differences for the other subscales of the APQ. These data are reported in Table 1.

Presence of bivariate correlation between APQ and PSI. Significant data were found between the subscale of the APQ involvement and the subscale of the PSI Parental Distress (PD) ($r=-.486$; $p=.001$), the subscale Parent-Child Dysfunctional Interaction (P-CDI) ($r=-.510$; $p=.001$) and the total scale of the PSI ($r=-.444$; $p=.004$). These results show that as parental involvement increases, parental stress levels decrease; specifically, the parental distress decreases and the parent-child interaction improves. Indeed, there were significant and negative bivariate correlations between the subscale Positive parenting of the APQ scale and the PD ($r=-.424$; $p=.005$), P-CDI ($r=-.414$; $p=.006$) subscales and the total scale of the PSI ($r=-.380$; $p=.013$). These results show that as positive parenting increases, parental stress levels decrease; specifically, the parental distress decreases and the parent-child interaction improves. In addition, there were significant and positive bivariate correlations between the inconsistent discipline subscales and the PD ($r=.393$; $p=.011$), P-CDI ($r=.346$; $p=.027$) subscales and the total scale of the PSI ($r=.374$; $p=.016$). These results show that as inconsistent discipline increases, parental stress levels increase; specifically, the parental distress increases and the parent-child interaction gets worse. These data are reported in Table 1.

	APQ(Poor Monitoring)	APQ (Involvement)	APQ (Positive Parenting)	APQ (Inconsistent Discipline)
APSD	$r = -.594$ $p = .005$			
PSI PD		$r = -.486$ $p = .001$	$r = -.424$ $p = .005$	$r = .393$ $p = .011$
PSI P-CDI		$r = -.510$ $p = .001$	$r = -.414$ $p = .006$	$r = .346$ $p = .027$
PSI Total		$r = -.444$ $p = .004$	$r = -.380$ $p = .013$	$r = .374$ $p = .016$

Table 1: Bivariate correlation between APQ and APSD and PSI. Notes: r = Pearson Correlation Coefficient. p = p -value.

Finally, there were significant and negative bivariate correlations between other practice subscales of the APQ and the PD subscale of the PSI ($r=-.351$; $p=.021$). These results show that as other practice increases, parental stress

levels decrease; specifically, the parental distress decreases and the parent-child interaction improves. These data are reported in Table 2.

	APQ (Other Practices)	ICU	COM AUT	COM DEP
PSI PD	$r = -.351$ $p = .021$		$r = .433$ $p = .004$	$r = .428$ $p = .004$
PSI P-CDI		$r = .320$ $p = .037$		$r = .320$ $p = .037$
PSI DC				$r = .377$ $p = .013$
PSI Total				$r = .404$ $p = .007$

Table 2: Bivariate correlation between APQ and APSD and PSI. Notes: r = Pearson Correlation Coefficient. p = p -value.

Presence of bivariate correlation between ICU, COM-BIA and PSI. Significant data were found between the ICU scale and the subscale of the PSI Parent-Child Dysfunctional Interaction (P-CDI) ($r = .320$; $p = .037$); specifically, a significant positive correlation emerges between the ICU scale with the dysfunctional parent-child interaction subscale. As callous-unemotional personality traits increase, levels of dysfunctional parent-child interaction increase. Referring to the COM-BIA scale, statistically significant differences emerged for the following three subscales: 1) Communication difficulties, stereotypical and bizarre behavior (AUT); 2) Sadness, restlessness and fatigue (DEP); 3) anxiety and concern (ANS). In particular, a significant positive correlation has emerged between the COM AUT subscale and the subscale of the PSI Parental Distress (PD) ($r = .433$; $p = .004$). So as traits related to the autism spectrum increase, levels of parental distress increase. Indeed, positive correlations have emerged between the COM DEP and the subscale Parental Distress (PD) ($r = .428$; $p = .004$), between the subscale Parent-Child Dysfunctional Interaction (P-CDI) ($r = .320$; $p = .037$), between the subscale Difficult Child (DC) ($r = .377$; $p = .013$) and the total scale of the PSI ($r = .404$; $p = .007$). So, as depressive traits increase, levels of parental distress increase. In addition, a significant positive correlation has emerged between the subscale COM ANS and the subscale Difficult Child (DC) ($r = .336$; $p = .028$). Thus, as anxious traits increase, the difficulty of managing the child increases. Finally, significant data were found between the total COM scale and the subscale Difficult Child (DC) ($r = .385$; $p = .011$). So, in situations of co-presence of symptoms, the difficulty of managing the child increases. These data are reported in Table 2 and in Table 3.

	COM ANS	COM Total
PSI DC	$r = .336$ $p = .028$	$r = .385$ $p = .011$

Table 3: Bivariate correlation between COM ANS, COM Total and PSI. Notes: r = Pearson Correlation Coefficient. p = p -value.

Data were subjected to an ANOVA, to analyze the impact of the Parent Training (PT) on the parental distress levels. In particular, statistically significant differences were found for all the subscales of the PSI. In fact, the mean of the parental

distress levels was higher before the PT than after the PT. These data are reported in Table 4.

	Time	N	M	SD	F	p
PSI PD	Pre - PT	20	35.05	13.83	10.65	
	Post - PT	23	24.04	7.83		0.002
PSI PCDI	Pre - PT	20	35.75	13.39	10.16	
	Post - PT	23	25.65	6.72		0.003
PSI DC	Pre - PT	20	39.9	7.45	5.75	
	Post - PT	23	32.91	11		0.021
PSI Total	Pre - PT	20	110.7	33.11	10.53	
	Post - PT	23	82.61	23.37		0.002

Table 4: Parental distress levels: comparison between before PT and after PT (one-way ANOVA). Notes: M = mean; SD = standard deviation; F = Fisher's ratio.

Discussion

The aim of this study was to investigate the impact of evidence based projects, formulated on multi componential cognitive-behavioral models, on the treatment of that category of problem behavior that literature considered efficient [29,39]. As suggested by literature [42] and as suggested by prior experience of Parent Training [105], our study highlights how parent training (PT) interventions could decrease the levels of parental distress. Indeed, the means of all the subscales of the PSI (Parental Distress, Parent-Child Dysfunctional Interaction, and Difficult Child) and the mean of the total scale of the PSI were higher before the PT than after the intervention.

Thus, after the PT levels of parental distress decrease, the parent-child interaction and the management of the child improve. Other studies have already highlighted how the Coping Power Program can produce lower rates of covert delinquent behavior in adolescents and also how these programs can improve teacher-rated behavior in school during the follow-up year [106]. Indeed, our study highlights how different parenting styles and parenting dimensions could have an impact on parental distress.

Prior research has shown that, for parents of children with externalizing behavior problems such as ADHD, higher stress is related to more controlling parenting practices [107]. These data are in contrast with another study [108] that found that parenting style was not related to the stress level of parents of children with autism spectrum disorder (ASD).

Furthermore, we found that as involvement, positive parenting increases, levels of distress decrease in parents; while, as inconsistent practices increase, parental distress increases. As a previous study found, this study shows that there is an association between callous-unemotional (CU) traits and parental distress; in particular, as callous-unemotional traits increase, levels of parental distress increase. In fact, [109] found in their research that parents showed increasing parenting distress in response to conduct-problems (CP) behaviors, particularly when they were accompanied by high CU traits. Regarding the COM BIA and the comorbidity with other disorders, it turned out that in situations of co-presence of symptoms, the difficulty of managing the child and the parental stress increase; so, there is an association between these variables.

Limitations and Conclusion

There were, of course, some limitations to this study. First of all, this study was conducted on the field, not in the laboratory; therefore, the results may have been influenced by the presence of subjective variables and by the context in which the Parent Training groups were involved. Moreover, the sample size was very small.

Moreover, we used an online questionnaire sent through a link; the length of the online questionnaire may have been a limitation, as many different scales were included. In addition, as a group intervention, we had little time compared to the time required and needed for individual parental needs and adherence and participation by parents was not consistent but fragmented.

Finally, in our research we investigated a lot of different variables, this could be also a limitation for the study. Despite these limitations, the parent group has proved to be a safe space for discussion and sharing, helpful in moving forward with normalization of symptoms as shown in the literature [37-40,110].

It allowed the family's cooperation, and its improvement, to the proposals of the Developmental Psychology Service ("Servizio S.S.C. di Psicologia dell'Età Evolutiva TO"). It also provided flexibility for parents to alternate their attendance at meetings and ensure their continuous presence and training. Finally, the group has proved to be helpful in creating

a good therapeutic alliance and a climate of trust, as well as sharing and monitoring with the school context that allowed parents to feel emotionally contained and operationally oriented. Despite these limitations, the work presented here offers interesting insights and suggests implications for clinicals [111-125]. Regarding future implications, it would be interesting to carry out two different groups, simultaneously, one with Parent Training (PT) Act and one with the classical Coping Power (CP) in order to discriminate their effectiveness.

Moreover, it would be interesting to extend this study to separate parents as well and to structure ACT-oriented groups on minors, concurrently with parenting treatment. In addition, it could be interesting to extend this study also to parents of children who have received the diagnosis of Specific [126-134] Learning Disorders, to extend this study in other regions of Italy and in other European health care contexts. Other future implications could be creating follow-up groups and increasing the age of intake in triage. Finally, it would be interesting to investigate the experiential avoidance [135-144] and the parental awareness. All these implications could help clinicians and researchers to bridge the gap, existing in literature, regarding this issue.

References

1. Armstrong MB, Nettleton SK (2004) Attention deficit hyperactivity disorder and preschool children. *Semin Speech Lang* 25(3): 225-232.
2. Steiner H, Remsing L (2007) Practice parameter for the assessment and treatment of children and adolescents with oppositional defiant disorder. *J Am Acad Child Adolesc Psychiatry* 46(1): 126-141.
3. Seipp CM, Johnston C (2005) Mother-son interactions in families of boys with attention-deficit/hyperactivity disorder with and without oppositional behavior. *J Abnorm Child Psychol* 33(1): 87-98.
4. Pezzica S, Bigozzi L (2010) Parent Training for parents of children with Attention Deficit Hyperactivity Disorder ADHD: insights into qualitative analysis. *Cognitive Psychotherapy Papers* 15(2): 8-29.
5. Deault LC (2010) A systematic review of parenting in relation to the development of comorbidities and functional impairments in children with attention deficit/hyperactivity disorder (ADHD). *Child Psychiatry and Human Development* 41(2): 168-92.
6. Frigerio A, Vanzin L, Pastore V, Nobile M, Giorda R, et al. (2006) The Italian pre adolescent mental health project (PrISMA): Rationale and methods. *International Journal*

- of Methods in Psychiatric Research 15(1): 22-35.
7. Masi G, Milone A, Manfredi A, Brovedani P, Pisano S, et al. (2016) Combined pharmacotherapy-multimodal psychotherapy in children with disruptive behavior disorders. *Psychiatry Research* 238: 8-13.
 8. Odgers CL, Moffitt TE, Broadbent JM, Dickson N, Hancox RJ, et al. (2008) Female and male antisocial trajectories: From childhood origins to adult outcomes. *Dev Psychopathol* 20(2): 673-716.
 9. Connor DF (2002) Aggression and antisocial behavior in children and adolescents: research and treatment. The Guilford Press Connor DF, Glat, New York.
 10. Besoli G, Venier D (2003) Attention deficit hyperactivity disorder: survey among family paediatricians in Friuli-Venezia Giulia. *Quaderni acp* 10(3): 8-9.
 11. Cena L (2007) Attention deficit hyperactivity disorder: environmental variables.
 12. Corbo S, Marolla F, Sarno V, Torrioli MG, Vernacotola S (2003) Prevalence of ADHD in children followed by the family pediatrician. *Doctor and Child* 22(1): 22-32.
 13. Frigerio A, Montali L (2018) ADHD in the Italian Context. *Global Perspectives on ADHD: Social Dimensions of Diagnosis and Treatment in Sixteen Countries* 208.
 14. Calzolari S, Dell'Anna ME (2000) Attention deficit disorder with hyperactivity in an Italian elementary school sample. *Journal of Developmental Neuropsychiatry* 20(1).
 15. Marzocchi GM, Cornoldi C (2000) An easy-to-use scale for detecting problematic behaviors in children with Attention Deficit and Hyperactivity. *Clinical developmental psychology* 4(1): 43-64.
 16. Vio C, Lo Presti G (2014) Diagnosis of developmental disorders. Models, diagnostic criteria and clinical cases. Erickson, Trento.
 17. Visser SN, Zablotsky B, Holbrook JR, Danielson ML, Bitsko RH (2015) Diagnostic experiences of children with attention-deficit/hyperactivity disorder. *Natl Health Stat Rep* 81: 1-7.
 18. Molina BSG, Hinshaw SP, Swanson JM, Arnold LE, Vitiello B, et al (2009) MTA Cooperative Group. The MTA at 8 years: prospective follow-up of children treated for combined-type ADHD in a multisite study. *J Am Acad Child Adolesc Psychiatry* 48(5): 484-500.
 19. Holbrook JR, Cuffe SP, Cai B, Visser SN, Forthofer MS, et al. (2016) Persistence of parent-reported ADHD symptoms from childhood through adolescence in a community sample. *J Atten Disord* 20(1): 11-20.
 20. Mueller KL, Tomblin JB (2012) Examining the comorbidity of language disorders and ADHD. *Top Lang Disord* 32(3): 228-246.
 21. Danielson ML, Bitsko RH, Ghandour RM, Holbrook JR, Kogan MD, et al. (2018) Prevalence of parent-reported ADHD diagnosis and associated treatment among U.S. children and adolescents, 2016. *Journal of Clinical Child and Adolescent Psychology* 47(2): 199-212.
 22. Holbrook JR, Bitsko RH, Danielson ML, Visser SN (2017) Interpreting the prevalence of mental disorders in children: tribulation and triangulation. *Health Promot Pract* 18(1): 5-7.
 23. Barkley RA (1997) Provocative children. Clinical handbook for assessment and parent-training. Guilford Press, New York.
 24. Patterson GR (1982) Coercitive family process. Eugene, OR: Castalia.
 25. Dodge KA, Pettit GS, Bates JE (1994) Socialization mediators of the relation between socioeconomic status and child conduct problems. *Child development* 65(2): 649-665.
 26. McLoyd VC (1998) Socioeconomic disadvantage and child development. *American Psychology* 53(2): 185-204.
 27. American Psychiatric Association (2014) Diagnostic and Statistical Manual of Mental Disorders. In: Biondi M (Ed.), 5th (Edn.), Raffaello Cortina Publisher, Milan.
 28. Elia J, Ambrosini P, Berrettini W (2008) ADHD characteristics: I. Concurrent co-morbidity patterns in children & adolescents. *Child Adolesc Psychiatry Ment Health* 2(1): 15.
 29. Battagliese G, Caccetta M, Luppino OI, Baglioni C, Cardi V, et al. (2015) Cognitive-behavioral therapy for externalizing disorders: A meta-analysis of treatment effectiveness. *Behav Res Ther* 75: 60-71.
 30. Gaub M, Carlson CL (1997) Gender differences in ADHD: a meta-analysis and critical review. *J Am Acad Child Adolesc Psychiatry* 36(8): 1036-1045.
 31. Tung I, Li JJ, Meza JI, Jezior KL, Kianmahd JS, et al. (2016) Patterns of comorbidity among girls with ADHD: a meta-analysis. *Pediatrics* 138(4): e20160430.

32. Pietro MD, Bassi E (2013) The cognitive behavioral intervention for the developmental age, Erickson, Trento.
33. Isola L, Mancini F (2007) Cognitive psychotherapy of childhood and adolescence. 2nd (Edn.), Franco Angeli, Milan.
34. Lochman JE, Powell N, Boxmeyer C, Andrade B, Stromeyer SL, et al. (2012) Adaptations to the coping power program's structure, delivery settings, and clinician training. *Psychotherapy* 49(2): 135-142.
35. Fonagy P, Gergely G, Jurist EL, Target M (2005) Affect regulation, mentalization and self-development. Raffaello Cortina Publisher, Milan.
36. Kazdin AE (2005) for Parent Management Training: Treatment Oppositional, Aggressive, and Antisocial Behavior in Children and Adolescents.
37. Pezzica S, Bigozzi L (2015) A cognitive behavioral and mentalizing Parent Training for children with ADHD. *Clinical Developmental Psychology* 19(2): 271-296.
38. Johnston C, Mash EJ (2001) Families of children with attention-deficit/hyperactivity disorder: Review and recommendations for future research. *Clinical child and family psychology review* 4(3): 183-207.
39. Eyberg SM, Nelson MM, Boggs SR (2008) Evidence-based psychosocial treatments for children and adolescents with disruptive behavior. *Journal of clinical child & Adolescent psychology* 37(1): 215-237.
40. Rogers MA, Wiener J, Marton I, Tannock R (2009) Supportive and controlling parental involvement as predictors of children's academic achievement: Relations to children's ADHD symptoms and parenting stress. *School Mental Health* 1(2): 89-102.
41. Sanders MR, Woolley ML (2005) The relationship between maternal self-efficacy and parenting practices: Implications for parent training. *Child: care, health and development* 31(1): 65-73.
42. Chronis AM, Chacko A, Fabiano GA, Wymbs BT, Pelham WE (2004) Enhancements to the behavioral parent training paradigm for families of children with ADHD: Review and future directions. *Clin Child Fam Psychol Rev* 7(1): 1-27.
43. Molina BS, Hinshaw SP, Swanson JM, Arnold LE (2009) MTA Cooperative Group. The MTA at 8. *Journal of the American Academy of Child & Adolescent Psychiatry* 48(11): 1123-1124.
44. Vio C, Marzocchi GM, Offredi F (1999) The child with attention deficit hyperactivity disorder. Psychological diagnosis and parental training, Trento, Edizioni, pp: 170.
45. Scaramella LV, Leve LD (2004) Clarifying parent-child reciprocities during early childhood: The early childhood coercion model. *Clin Child Fam Psychol Rev* 7(2): 89-107.
46. Pennington BF (2006) From single to multiple deficit models of developmental disorders. *Cognition* 101(2): 385-413.
47. Johnston C, Jassy JS (2007) Attention-deficit/hyperactivity disorder and oppositional/conduct problems: links to parent-child interactions. *Journal of Canadian Academy Child Adolescent Psychiatry* 16(2): 74-79.
48. Lambruschi F, Muratori P (2013) Between temperament and relationship: A multifactorial and - complex perspective in the understanding of conduct disorders. In: Lambruschi F, et al. (Eds.), *Psychopathology and psychotherapy of conduct disorders*, Rome, Carocci.
49. Benedetto L, Ingrassia M (2015) The Alabama Parenting Questionnaire for the Preschool Range (APQ-Pr). Contribute to the Italian adaptation.
50. Patterson GR., Dishion T, Reid J (1992) *Antisocial boys*. Eugene, OR: Castalia, pp: 10-14.
51. Lochman JE, Wells KC (2002) Contextual social-cognitive mediators and child outcome: A test of the theoretical model in the Coping Power program. *Dev Psychopathol* 14(4): 945-967.
52. Lochman JE, Boxmeyer C, Powell N, Qu L, Wells K, et al. (2009) Dissemination of the Coping Power program: importance of intensity of counselor training. *Journal of Consulting and Clinical Psychology* 77(3): 397-409.
53. Larsson B, Fossum S, Clifford G, Drugli MB, Handegard BH, et al. (2009) Treatment of oppositional defiant and conduct problems in young Norwegian children. *European Child and Adolescent Psychiatry* 18(1): 42-45.
54. Pasalich DS, Dadds MR, Hawes DJ, Brennan J (2012) Do callous-unemotional traits moderate the relative importance of parental coercion versus warmth in child conduct problems? An observational study. *J Child Psychol Psychiatry* 52(12): 1308-1315.
55. Bowlby J (1988) *A secure base*. London: Tavistock Routledge.
56. Muratori P, Giuli C, Bertacchi I, Orsolini L, Ruglioni L, et al. (2017) *Coping power for preschool-aged children: a*

- pilot randomized control trial study. *Early intervention in psychiatry* 11(6): 532-538.
57. Muratori P, Milone A, Manfredi A, Polidori L, Ruglioni L, et al. (2017) Evaluation of improvement in externalizing behaviors and callous-unemotional traits in children with disruptive behavior disorder: A 1-year follow up clinic-based study. *Adm Policy Ment Health* 44(4): 452-462.
 58. Hayes SC, Luoma JB, Bond FW, Masuda A, Lillis J (2006) Acceptance and Commitment Therapy: Model, processes and outcomes. *Behavior Research and Therapy* 44(1): 1-25.
 59. Hayes SC, Strosahl KD, Wilson KG (2011) *Acceptance and Commitment Therapy. The Process and Practice of Mindful Change*. 2nd (Edn.), Guilford Press, New York.
 60. Azimifar S, Jazayeri RS, Fatehizade MS, Abedi A (2018) The comparing the effects of parent management training and acceptance and commitment based parenting training on mother-child relationship among mothers who have children with externalizing behavior problems. *Family Counseling and Psychotherapy* 7(2): 99-122.
 61. Amini NS, Najarpourian S, Samavi SA (2020) Comparing the effectiveness of the triple p-positive parenting program and parenting program of acceptance and commitment therapy on parent-child relationship and self-efficacy of mothers with oppositional defiant disorder children. *J Research Health* 10(2): 111-122.
 62. Corti C, Pergolizzi F, Vanzin L, Cargasacchi G, Villa L, et al. (2018) Acceptance and commitment therapy-oriented parent-training for parents of children with autism. *Journal of Child and Family Studies* 27: 2887-2900.
 63. Beaudoin AJ, Sebire G, Couture M (2014) Parent training interventions for toddlers with autism spectrum disorder. *Autism research and treatment*.
 64. McConachie H, Diggle T (2007) Parent implemented early intervention for young children with autism spectrum disorder: A systematic review. *Journal of Evaluation in Clinical Practice* 13(1): 120-129.
 65. Thomas R, Zimmer GMJ (2007) Behavioral outcomes of parent-child interaction therapy and Triple P-Positive Parenting Program: A review and meta-analysis. *J Abnorm Child Psychol* 35(3): 475-495.
 66. Webster SCH (1996) Early intervention with videotape modeling: Programs for families of children with oppositional defiant disorder or conduct disorder, pp: 435-474.
 67. Foote R, Eyberg S, Schuhmann E (1998) Parent-child interaction approaches to the treatment of child behavior problems. *Advances in Clinical Child Psychology* (20): 125-151.
 68. Coyne LW, Wilson KG (2004) The ole of cognitive fusion in impaired parenting: an RFT analysis. *International Journal of Psychology and Psychological Therapy* 4(3): 469-486.
 69. Sanders MR, Pidgeon AM, Gravestock F, Connors MD, Brown S, et al. (2004) Does parental attributional retraining and anger management enhance the effects of the Triple P-Positive Parenting Program with parents at risk of child maltreatment? *Behavior Therapy* 35(3): 513-535.
 70. Dumas, JE (2005) Mindfulness-based parent training: Strategies to lessen the grip of automaticity in families with disruptive children. *Journal of clinical child and adolescent psychology* 34(4): 779-791.
 71. Lovejoy MC, Graczyk PA, Hare EO, Neuman G (2000) Maternal depression and parenting behavior: A meta-analytic review. *Clinical psychology review* 20(5): 561-592.
 72. Osofsky JD, Thompson MD (2000) Adaptive and maladaptive parenting: Perspectives on risk and protective factors, pp: 54-75.
 73. Goodman SH, Gotlib IH (2002) Children of depressed parents: Mechanisms of risk and implications for treatment. USA, pp: 351.
 74. Crnic KA, Gaze C, Hoffman C (2005) Cumulative parenting stress across the preschool period: Relations to maternal parenting and child behaviour at age 5. *Infant and Child Development: An International Journal of Research and Practice* 14(2): 117-132.
 75. Vostanis P, Graves A, Meltzer H, Goodman R, Jenkins R, et al. (2006) Relationship between parental psychopathology, parenting strategies and child mental health: findings from the GB national study. *Soc Psychiatry Psychiatr Epidemiol* 41(7): 509-514.
 76. Bogels SM, Lehtonen A, Restifo K (2010) Mindful Parenting in Mental Health Care. *Mindfulness (N Y)* 1(2): 107-120.
 77. Belsky J (1984) The determinants of parenting: A process model. *Child Dev* 55(1): 83-96.
 78. Webster SC (1990) Stress: A potential disruptor of

- parent perceptions and family interactions. *Journal of clinical child psychology* 19(4): 302-312.
79. Alexander JF, Barton C, Schiaro RS, Parsons BV (1976) Systems-behavioral intervention with families of delinquents: therapist characteristics, family behavior, and outcome. *J Consult Clin Psychol* 44(4): 656-664.
 80. Hayes SC, Wilson KG, Gifford EV, Follette VM, Strosahl K (1996) Experiential avoidance and behavioral disorders: A functional dimensional approach to diagnosis and treatment. *Journal of consulting and clinical psychology* 64(6): 1152-1168.
 81. Kabat ZJ, Kabat ZM (1997) *Everyday Blessings: The Inner Work of Mind-ful Parenting*.
 82. Greco LA, Eifert GH (2004) Treating parent-adolescent conflict: Is acceptance the missing link for an integrative family therapy? *Cognitive and Behavioral Practice* 11(3): 305-314.
 83. Singh NN, Lancioni GE, Winton AS, Fisher BC, Wahler RG, et al. (2006) Mindful parenting decreases aggression, noncompliance, and self-injury in children with autism. *Journal of Emotional and Behavioral Disorders* 14(3): 169-177.
 84. Hayes SC, Strosahl KD, Wilson KG (2009) *Acceptance and commitment therapy*. Washington, D.C: American Psychological Association.
 85. Shaffer D, Gould MS, Brasic J, Ambrosini P, Fisher P, et al. (1983) A children's global assessment scale (CGAS). *Arch Gen Psychiatry* 40(11): 1228-1231.
 86. Biglan A, Hayes SC, Pistorello J (2008) Acceptance and commitment: Implications for prevention science. *Prev Sci* 9(3): 139-152.
 87. Evans T, Whittingham K, Boyd R, (2012) What helps the mother of a preterm infant become securely attached, responsive and well-adjusted? *Infant Behavior and Development* 35(1): 1-11.
 88. Whittingham K, Wee D, Sanders MR, Boyd R (2013) Sorrow, coping and resiliency: parents of children with cerebral palsy share their experiences. *Disability and rehabilitation* 35(17): 1447-1452.
 89. Katz LF, Wilson B, Gottman JM (1998) Meta-emotion philosophy and family adjustment: Making an emotional connection. In *Conflict and cohesion in families*.
 90. Blackledge JT, Hayes SC (2006). Using acceptance and commitment training in the support of parents of children diagnosed with autism. *Child & Family Behavior Therapy* 28(1): 1-18.
 91. Murrell AR, Schmalz J, Mitchell PR, LaBorde CT (2009) *Parent action: Acceptance and commitment training for parents*. University of North Texas, USA.
 92. Singh NN, Lancioni GE, Winton AS, Singh J, Curtis WJ, et al. (2007) Mindful parenting decreases aggression and increases social behavior in children with developmental disabilities. *Behav modif* 31(6): 749-771.
 93. Singh NN, Singh AN, Lancioni GE, Singh J, Winton AS, et al. (2010) Mindfulness training for parents and their children with ADHD increases the children's compliance. *Journal of child and family studies* 19(2): 157-166.
 94. Singh NN, Lancioni GE, Winton AS, Karazsia BT, Myers RE, et al. (2014) Mindfulness-based positive behavior support (MBPBS) for mothers of adolescents with autism spectrum disorder: Effects on adolescents' behavior and parental stress. *Mindfulness* 5(6): 646-657.
 95. Harris R (2016) *Acceptance and Commitment Therapy. The keys to overcoming pitfalls and problems in ACT practice*. Franco Angeli, Australia.
 96. Muratori P, Milone A, Manfredi A, Polidori L, Ruglioni L, et al. (2017) Evaluation of improvement in externalizing behaviors and callous-unemotional traits in children with disruptive behavior disorder: A 1-year follow up clinic-based study. *Adm Policy Ment Health* 44(4): 452-462.
 97. Zanobini M, Viterbori P, Saraceno F (2012) Phonology and language development in Italian children: An analysis of production and accuracy. *J Speech Lang Hear Res* 55(1): 16-31.
 98. Theule J, Wiener J, Rogers MA, Marton I (2011) Predicting parenting stress in families of children with ADHD: Parent and contextual factors. *Journal of Child and Family studies* 20(5): 640-647.
 99. Loeber R, Burke JD, Lahey BB (2002) What are adolescent antecedents to antisocial personality disorder?. *Criminal Behaviour and Mental Health* 12(1): 24-36.
 100. Frick PJ, Hare RD (2001) Antisocial process screening device. *European Journal of Psychological Assessment*.
 101. Milone A, Cerniglia L, Cristofani C, Inguaggiato E, Levantini V, et al. (2019) Empathy in youths with conduct disorder and callous-unemotional traits. *Neural plasticity*.
 102. Frick PJ (2004) Inventory of callous-unemotional traits. *PsycTests*.

103. Marzocchi GM, Re AM, Cornoldi C (2010) BIA Italian battery for ADHD for the evaluation of children with attention-deficit hyperactivity. With DVD and CD-ROM. Erickson Editions.
104. Abidin R, Flens JR, Austin WG (2006) The parenting stress index. Lawrence Erlbaum Associates Publishers, pp: 297-328.
105. Marzocchi GM, Sgariboldi V, Conte S, Renzetti V, Fornaro EV, et al. (2019) The Lombard experience of parent training with parents of children with ADHD.
106. Lochman JE, Wells KC (2004) The coping power program for preadolescent aggressive boys and their parents: outcome effects at the 1-year follow-up. *Journal of consulting and clinical psychology* 72(4): 571-578.
107. Clauser P, Ding Y, Chen EC, Cho SJ, Wang C, et al. (2021) Parenting styles, parenting stress, and behavioral outcomes in children with autism. *School Psychology International* 42(1): 33-56.
108. Fanti KA, Centifanti LCM (2014) Childhood callous-unemotional traits moderate the relation between parenting distress and conduct problems over time. *Child Psychiatry & Human Development* 45(2): 173-184.
109. Barlow FK, Paolini S, Pedersen A, Hornsey MJ, Radke HRM et al. (2012) The contact caveat: Negative contact predicts increased prejudice more than positive contact predicts reduced prejudice. *Personality and social Psychology bulletin* 38(12): 1629-1643.
110. Naghani SA, Najarpourian S, Samavi SA (2020) Comparing the effectiveness of the triple p-positive parenting program and parenting program of acceptance and commitment therapy on parent-child relationship and self-efficacy of mothers with oppositional defiant disorder children. *J Research Health* 10(2): 111-122.
111. Barkley RA, Anastopoulos AD, Guevremont DG, Fletcher KF (1992) Adolescents with attention deficit hyperactivity disorder: Mother-adolescent interactions, family beliefs and conflicts, and maternal psychopathology. *J Abnorm Child Psychol* 20: 263-288.
112. Anne AB, Elyse R, Justin P, Jennifer NR, Karen F, et al. (2016) Parent's psychological flexibility: Associations with parenting and child psychosocial well-being. *Journal of Contextual Behavioral Science* 5(2): 111-120.
113. Burke JD, Loeber R, Birmaher B (2002) Oppositional defiant and conduct disorder: a review of the past 10 years, part II. *J Am Acad Child Adolesc Psychiatry* 41(11): 1275-1293.
114. Burke RH, Morrill R (2002) Anti-Social Behavior Orders: An Infringement of the Human Rights Act 1998. *Nottingham LJ* 2(2): 1-16.
115. Centers for Disease Control and Prevention (CDC) (2005) Mental health in the United States. Prevalence of diagnosis and medication treatment for attention-deficit/hyperactivity disorder--United States, 2003. *MMWR Morb Mortal Wkly Rep* 54(34): 842-847.
116. Corbo S, Marolla F, Sarno V, Torrioli MG, Vernacotola S (2003) Prevalence of ADHD in children followed by the family pediatrician. *Doctor and Child* 22(1): 22-32.
117. Coyne LW, Wilson KG (2004) The role of cognitive fusion in impaired parenting: an RFT analysis. *International Journal of Psychology and Psychological Therapy* 4(3): 469-486.
118. Crosby RD, Wonderlich SA, Engel SG, Simonich H, Smyth J, et al. (2009) Daily mood patterns and bulimic behaviors in the natural environment. *Behaviour research and therapy* 47(3): 181-188.
119. Cuffe SP, Visser SN, Holbrook JR, Geryk LL, Danielson ML, et al. (2020) ADHD and psychiatric comorbidity: functional outcomes in a school-based sample of children. *J Atten Disord* 24(9): 1345-1354.
120. Frick PJ, White SF (2008) Research review: The importance of callous-unemotional traits for developmental models of aggressive and antisocial behavior. *Journal of child psychology and psychiatry* 49(4): 359-375.
121. Gould ER, Tarbox J, Coyne L, (2018) Evaluating the effects of acceptance and commitment training on the overt behavior of parents of children with autism. *Journal of contextual behavioral science* (7): 81-88.
122. Istituto SDS (2007) Diagnostic and therapeutic protocol of DIE syndrome & Attention D.
123. Lambruschi F, Muratori P (2013) Between temperament and relationship: A multifactorial and -complex perspective in the understanding of conduct disorders. In: Lambruschi F, et al. (Eds.), *Psychopathology and psychotherapy of conduct disorders*, Rome, Carocci.
124. Lochman JE, Wells K, Lenhart LA (2012) Coping Power. Program for the control of anger and aggression in children and adolescents, Erickson, Trento.
125. Lochman JE, Boxmeyer CL, Powell NP, Qu L, Wells K, et al. (2012) Coping Power dissemination study: Intervention and special education effects on academic outcomes. *Behavioral Disorders* 37(3): 192-205.

126. Marzocchi GM, Cornoldi C (2000) An easy-to-use scale for detecting problematic behaviors in children with Attention Deficit and Hyperactivity. *Clinical developmental psychology* 4(1): 43-64.
127. McCurry C (2009) *Parenting your anxious child with mindfulness and acceptance: A powerful new approach to overcoming fear, panic, and worry using acceptance and commitment therapy*. New Harbinger Publications.
128. McMahon RJ, Witkiewitz K, Kotler JS (2010) Predictive validity of callous-unemotional traits measured in early adolescence with respect to multiple antisocial outcomes. *Journal of abnormal psychology* 119(4): 752-763.
129. Minor HG, Carlson LE, Mackenzie MJ, Zernicke K, Jones L (2006) Evaluation of a mindfulness-based stress reduction (MBSR) program for caregivers of children with chronic conditions. *Soc Work Health Care* 43(1): 91-109.
130. Mueller KL, Tomblin JB (2012) Examining the comorbidity of language disorders and ADHD. *Top Lang Disord* 32(3): 228-246.
131. Muratori P, Polidori L, Chiodo S, Dovigo V, Mascarucci M, et al. (2017) A pilot study implementing Coping Power in Italian community hospitals: Effect of therapist attachment style on outcomes in children. *Journal of child and family studies* 26(11): 3093-3101.
132. Patterson GR, Forgatch MS (2001) Therapist behavior as a determinant for client noncompliance: a paradox for the behavior modifier. *American Psychological Association*, pp: 271-283.
133. Patterson GR., Dishion T, Reid J (1992) *Antisocial boys*. Eugene, OR: Castalia, pp: 10-14.
134. Pezzica S, Bigozzi L (2010) Parent Training for parents of children with Attention Deficit Hyperactivity Disorder ADHD: insights into qualitative analysis. *Cognitive Psychotherapy Papers* 15(2): 8-29.
135. Raffieuna A, Bosco L (2006) Strategic screening of ADHD syndrome in the school setting: A pilot study. *Clinical developmental psychology* 10(3): 445-472.
136. Schoenwald SK, Hoagwood K (2001) Effectiveness, transportability, and dissemination of interventions: What matters when? *Psychiatr Serv* 52(9): 1190-1197.
137. Seipp CM, Johnston C (2005) Mother-son interactions in families of boys with attention-deficit/hyperactivity disorder with and without oppositional behavior. *J Abnorm Child Psychol* 33(1): 87-98.
138. Siegel DJ, Hartzell M (2013) *Parenting from the inside out: How a deeper self-understanding can help you raise children who thrive*. Penguin, pp: 272.
139. Singh NN, Lancioni GE, Karazsia BT, Winton AS, Singh J, et al. (2014) Shenpa and compassionate abiding: mindfulness-based practices for anger and aggression by individuals with schizophrenia. *International Journal of Mental Health and Addiction* 12(2): 138-152.
140. Steiner H, Remsing L (2007) Practice parameter for the assessment and treatment of children and adolescents with oppositional defiant disorder. *J Am Acad Child Adolesc Psychiatry* 46(1): 126-141.
141. Vio C, Marzocchi GM, e Offredi F (1999) *The child with attention deficit hyperactivity disorder. Psychological diagnosis and parental training*, Trento, Edizioni, pp: 170.
142. Wilson KG (2009) *Mindfulness for two: An acceptance and commitment therapy approach to mindfulness in psychotherapy*. New Harbinger Publications.
143. Wells K (2012) *Coping power. Anger and aggression control program for children and adolescents*. Erickson Editions.
144. Zisser A, Eyberg SM (2010) Parent-child interaction therapy and the treatment of disruptive behavior disorders. In: Weisz JR, et al. (Eds.), *Evidence-based Psychotherapies for Children and Adolescents*. The Guilford Press, New York.

