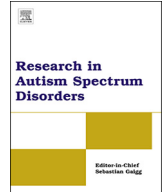


Contents lists available at [ScienceDirect](https://www.sciencedirect.com)

Research in Autism Spectrum Disorders

journal homepage: www.elsevier.com/locate/rasd

Cognitive behavior therapy to treat anxiety among children with autism spectrum disorders: A systematic review



Karen R. Kester, Joseph M. Lucyshyn*

Department of Educational and Counseling Psychology and Special Education, Faculty of Education, University of British Columbia, 2125 Main Mall, Vancouver, BC, V6T1Z4, Canada

ARTICLE INFO

Keywords:

Autism spectrum disorders
Anxiety
Cognitive behavior therapy
Empirically supported treatment
Evidence based practice
Systematic review

ABSTRACT

Background: Children with an autism spectrum disorder (ASD) are at risk for developing comorbid mental health disorders, with anxiety being the most common. Anxiety symptoms significantly interfere with a child's ability to participate in school and community settings. Over the past 17 years, there has been an increase in empirical evidence of Cognitive Behavioral Therapy (CBT) as a treatment for anxiety in children with ASD. The purpose of this systematic review was to evaluate this body of research to determine whether CBT could be classified as an empirically supported treatment (EST) for this population. A secondary purpose was to identify the extent to which schools have been involved in this line of research.

Method: A systematic review of group comparison and single case research was conducted. Each study was evaluated using quality indicators recommended by the Council for Exceptional Children (CEC), including an evaluation of study effects. Information regarding school involvement was also extracted.

Results: A total of 30 studies were included in the analysis. Results indicated that modified CBT interventions for children with ASD met CEC criteria for an EST. Among the studies evaluated, only two (6%) involved a school setting in which educators participated in the intervention.

Conclusion: The results of this review offer empirically support for modified CBT for children with autism as an EST. Findings also indicate that little research has included the school context when implementing CBT treatments for children with autism and anxiety. Implications for dissemination and future research are presented.

1. Introduction

Autism spectrum disorder (ASD) is an umbrella term used to define a continuum of developmental disorders characterized by deficits in social communication and interaction as well as repetitive and restricted behaviours (APA, 2013). Since its conception, anxiety has been an ancillary symptom in ASD. Current prevalence rates of comorbidity of anxiety disorders and ASD average between 40% and 50% for children with higher intellectual functioning and have been reported as high as 80% (van Steensel, Bögels, & Perrin, 2011). Although the root of such high prevalence rates remains unclear, the impact of anxiety symptoms on this population and the development of efficacious treatment programs is gaining recognition among researchers and practitioners alike (Reaven, Blakeley-Smith & Hepburn, 2014). Informed by evidence demonstrating the efficacy of cognitive behavioural therapy (CBT) in the treatment of anxiety among typically developing children (James, James, Cowdrey, Soler, & Choke, 2015), CBT has been proposed as a prospective anxiety intervention for children with ASD. Over the past 16 years, several studies have examined the efficacy of CBT as

* Corresponding author.

E-mail address: joe.lucyshyn@ubc.ca (J.M. Lucyshyn).

an intervention approach for anxiety among children with ASD (e.g., Reaven, Blakeley-Smith, Culhane-Shelburne, & Hepburn, 2012; Storch et al., 2013). The primary aim of this review is to evaluate CBT as an empirically-supported treatment (EST) for the treatment of anxiety among children with ASD.

Relevant to this review is distinguishing empirically-supported treatments (ESTs) from evidence-based practice (EBP). An in-depth discussion regarding the distinction of these two related, yet distinct terms, is beyond the scope of the present review. Due to the focus of this review, however, it is worthy to provide a brief definition that discriminates the two terms. The term empirically-supported treatment refers to interventions that met a set of evidentiary standards. This involves evaluating the collective efficacy of the intervention (Detrich & Lewis, 2012). In other words, based on extensive quality research, how well an intervention is known to bring about change in a target behaviour when the intervention is implemented with fidelity. Evidence-based practice is commonly understood to be the integration of (a) the best available research evidence with (b) clinical expertise and (c) relevant stakeholder perspectives (Chorpita et al., 2011). The term EBP, then, describes a decision-making process based on the interdependence of these three elements. One can see that the incorporation of EST is just one facet of EBP but is essential to the development of evidence-based practice. Detrich and Lewis (2012) proposed that identifying effective interventions is the first phase of EBP, typically accomplished through a systematic evaluation process. In light of these definitions, this review focused on evaluating the empirical evidence to determine if CBT can be considered an EST in the treatment of anxiety among children with ASD.

Cognitive-behavioural therapy has become the primary psychotherapeutic intervention in treating mood and anxiety disorders among typically developing children (James et al., 2015). Based on a combination of basic behavioural and cognitive principles, CBT emphasizes the interconnection of thoughts, feelings and behaviour. The basic premise is that a change in one dimension leads to a change in the other dimensions. For instance, changing an individual's thoughts or cognitive patterns leads to a change in his or her emotional state and behaviour. In the treatment of anxiety, a CBT model commonly consists of four main areas of intervention: psychoeducation, cognitive restructuring, relaxation techniques and graded exposure. Of these four, it has been suggested that graded exposure is the most important component in reducing anxiety symptoms among children. Graded exposure requires a child to re-approach their feared situation in structured, incremental steps, in a safe setting using new thought patterns and calm breathing (Silverman, Pina, & Viswesvaran, 2008). This element of treatment may be even more crucial for children with ASD due to their difficulty in accurately communicating the emotions or feelings they experience (Attwood & Scarpa, 2013). Successful employment of CBT techniques in treating anxiety among children without ASD has prompted the application of modified versions of this evidence-based approach for use with children with ASD.

In the past decade, a small but growing body of research has documented the use of CBT interventions with children with ASD to ameliorate a broad span of anxiety symptoms. While retaining the core components of CBT for anxiety, modifications have been incorporated to improve the accessibility of CBT to this population. Modifications used in the delivery of CBT with children with ASD often include the use of visual supports and concrete examples, inclusion of primary caregivers in the treatment process, adapting information to match a child's cognitive abilities, incorporating specific interests, and individualized reinforcement strategies (Moree & Davis, 2010).

Researchers have responded to this growth in the application of CBT for children with ASD with a small influx of both narrative (Moree & Davis, 2010; Rotheram-Fuller & MacMullen, 2011; Scattone & Mong, 2013; White, Oswald, Ollendick, & Scahill, 2009) and systematic and/or meta-analytic reviews. At least nine previous systematic reviews have examined the evidence base for treatment of anxiety among children and youth with ASD using CBT as the primary treatment approach (Danial & Wood, 2013; Kreslins, Robertson, & Melville, 2015; Lang, Regester, Lauderdale, Kristen, & Haring, 2010; Sukhodolsky, Bloch, Panza, & Reichow, 2013; Ung, Selles, Small, & Storch, 2015; Vasa et al., 2014; Walters, Loades, & Russell, 2016; Weston, Hodgekins, & Langdon, 2016; Wood, Klebanoff, Renno, Fujii & Danial, 2017). Collectively, conclusions from these reviews favour CBT as an effective intervention in reducing anxiety symptoms for children and youth with ASD when modifications are incorporated to address the specific needs of this population.

Despite the growing evidence of the application of CBT based intervention in the treatment of anxiety among children with ASD, the status of CBT as an empirically-supported treatment (EST) with the ASD population remains unclear. Among the existing reviews, two have previously used an evaluative classification method to examine the quality of extant studies. Danial and Wood (2013) used the American Psychological Association (APA) Division 12 criteria to evaluate CBT protocols used with children with ASD. At the time of their review, only one specific CBT protocol (Behavioral Interventions for Anxiety in Children with Autism; BIACA: Wood & Drahotka, 2005) was classified as an "efficacious" treatment protocol. Since the publication of their review, the number of studies in this area has more than doubled. This expansion of the research body warrants an updated evaluation of the EST status of CBT in the treatment of anxiety for children with ASD. More recently, Wood et al. (2017) evaluated individual CBT for children with ASD using Southam-Gerow and Prinstein's (2014) classification system. The results of their evaluation provided support to classify individual CBT as a "probably efficacious" treatment for anxiety. Although these results offer insight into empirical support for individual CBT, the evidence-base of group CBT was not evaluated. Considering group CBT constitutes a major treatment modality for children with ASD (Weston et al., 2016), inclusion of group CBT in the evaluation process is important.

Also, none of the aforementioned reviews have considered the school environment as the treatment setting. In all likelihood this oversight is due to the dearth of research examining intervention for anxiety in students with ASD in school settings. A plausible explanation is that CBT is typically delivered by psychologists trained in this method of treatment, and they work largely in clinic settings, such as community-based health centres, hospitals and private clinics, rather than in school settings.

The importance of identifying ESTs for individuals with ASD has been identified as a priority in the field of special education (West, McCollow, Kidwell, Umbarger, & Cote, 2013). With several policies in place to enhance outcomes for students with disabilities (e.g., No Child Left Behind, IDEA), adherence to evidence-based practice is increasingly important to policy makers in educational

Download English Version:

<https://daneshyari.com/en/article/6847896>

Download Persian Version:

<https://daneshyari.com/article/6847896>

[Daneshyari.com](https://daneshyari.com)