

ABCT CLINICAL PRACTICE SERIES

Exposure Therapy *for*
Child *and* Adolescent
Anxiety *and* OCD

Stephen P.H. Whiteside
Thomas H. Ollendick
Bridget K. Biggs

Exposure Therapy for Child and Adolescent Anxiety and OCD

ABCT Clinical Practice Series

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Exposure Therapy for Child
and Adolescent Anxiety
and OCD

**STEPHEN P. H. WHITESIDE,
THOMAS H. OLLENDICK,
AND BRIDGET K. BIGGS**

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SERIES FOREWORD

Mental health clinicians desperately want to help their clients and recognize the importance of implementing evidence-based treatments toward achieving this goal. In the past several years, the field of mental health care has seen tremendous advances in our understanding of pathology and its underlying mechanisms, as well as proliferation and refinement of scientifically informed treatment approaches. Coinciding with these advances is a heightened focus on accountability in clinical practice. Clinicians are expected to apply evidence-based approaches and to do so effectively, efficiently, and in a patient-centered, individualized way. This is no small order. For a multitude of reasons, including but not limited to client diversity, complex psychopathology (e.g., comorbidity), and barriers to care that are not under the clinician's control (e.g., adverse life circumstances that limit the client's ability to participate), delivery of evidence-based approaches can be challenging.

This series, which represents a collaborative effort between the Association for Behavioral and Cognitive Therapies (ABCT) and the Oxford University Press, is intended to serve as an easy-to-use, highly practical collection of resources for clinicians and trainees. The ABCT Clinical Practice Series is designed to help clinicians effectively master and implement evidence-based treatment approaches. In practical terms, the series represents the “brass tacks” of implementation, including basic how-to guidance and advice on troubleshooting common issues in clinical practice and application. As such, the series is best viewed as a complement to other series on evidence-based protocols, such as the Treatments That Work series and the Programs That Work series. These represent seminal bridges between research and practice and have been instrumental in the dissemination of empirically supported intervention protocols and programs. The ABCT Clinical Practice Series, rather than focusing on specific diagnoses and their treatment, targets the practical application of therapeutic and assessment approaches. In other words, the emphasis is on the *how-to* aspects of mental health delivery.

It is my hope that clinicians and trainees find these books useful in refining their clinical skills, as enhanced comfort as well as competence in delivery of evidence-based approaches should ultimately lead to improved client outcomes. Given the

emphasis on application in this series, there is relatively less emphasis on review of the underlying research base. Readers who wish to delve more deeply into the theoretical or empirical basis supporting specific approaches are encouraged to go to the original source publications cited in each chapter. When relevant, suggestions for further reading are provided.

Even well-intending and highly trained clinicians may sometimes shy away from using exposure therapy to treat anxious children. This is a problem because exposure is a critical aspect of effective treatment within cognitive-behavioral treatment of anxiety disorders. *Why do clinicians do this?* They do so for a host of reasons, including discomfort with causing distress to the child, fear of doing it wrong, and unfamiliarity with the theoretical premise behind exposure.

This book details exposure “how to” and synthesizes the approach’s research support and theoretical basis. It is a strong accompaniment to CBT treatment manuals that employ exposure. It is likely to become a must-read resource for clinicians in training. Seasoned clinicians are also likely to find this a good “refresher” on the conduct of exposure for a range of presenting problems in anxious children.

Drs. Stephen Whiteside, Bridget Biggs, and Thomas Ollendick comprise a world-renowned team of clinical scientists with expertise on this topic. In this volume, they share wisdom gleaned from their years of research and clinical experience working with children with anxiety disorders. The concepts are conveyed in a straightforward writing style and exemplified with case material. For these reasons, I suspect this will be a well-read resource in training clinics internationally.

Susan W. White, PhD, ABPP
Series Editor

ABOUT THE AUTHORS

Stephen P. H. Whiteside, PhD, ABPP, is a board certified Licensed Clinical Psychologist, Professor of Psychology in the Mayo Clinic College of Medicine and Science, and Director of the Pediatric Anxiety Disorders Program at Mayo Clinic in Rochester, Minnesota. His research focuses on improving access to evidence-based care for pediatric anxiety disorders and obsessive-compulsive disorder through the development of effective and efficient treatments facilitated by technology. He received a BA in Psychology from Northwestern University and a PhD in Clinical Psychology from the University of Kentucky. He completed a pre-doctoral internship in Pediatric Psychology at the Geisinger Medical Center and a post-doctoral fellowship in Child and Family Medical Psychology at Mayo Clinic. He has received research funding from the National Institutes of Health, the Agency for Healthcare Research and Quality, the International OCD Foundation, and the Mayo Clinic Center for Innovation. He has published more than 70 scientific articles, co-authored *Exposure Therapy for Anxiety: Principles and Practice* (second edition), and is the co-developer of *Mayo Clinic Anxiety Coach*, an iOS application.

Thomas H. Ollendick, PhD, is University Distinguished Professor in Clinical Psychology and Director of the Child Study Center at Virginia Polytechnic Institute and State University, Blacksburg, Virginia. He is the author or co-author of more than 350 research publications, more than 100 book chapters, and more than 35 books. He is the past editor of the *Journal of Clinical Child and Adolescent Psychology and Behavior Therapy*, as well as founding and current co-editor of *Clinical Child and Family Psychology Review*. He is also past president of the Association for the Advancement of Behavior Therapy (1995), the Society of Clinical Psychology (1999), the Society of Clinical Child and Adolescent Psychology (2007), and the Society for the Science of Clinical Psychology (2010). He received an Honorary Doctorate from Stockholm University in 2011 and holds Honorary Adjunct Professor positions at Roehampton University in London; Griffith University in Brisbane, Australia; and Sydney Institute of Technology in Sydney, Australia. He was awarded the Distinguished Research Contributions to the Field of Clinical Child Psychology in 2007 (American Psychiatric Association).

[APA]), the Career/Lifetime Achievement Award from the Association for Behavioral and Cognitive Therapies in 2013, the Lifetime Achievement Award for Scientific Contributions from the Society of Clinical Psychology (APA) in 2017, and most recently recognized as a Pioneer of Behavior and Cognitive Therapy (ABCT) in 2019.

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Exposure Therapy for Child and Adolescent Anxiety and OCD

SECTION 1

Overview and Background

Introduction and History

WHAT IS EXPOSURE?

The therapeutic value of confronting, rather than avoiding, difficult emotions and issues is integral to many approaches to psychotherapy (Foa & Kozak, 1986). Exposure therapy accomplishes this goal in the simplest, most straightforward manner. Although the principles of exposure are relevant to many emotional symptoms (Carey, 2011), this book focuses on its application to anxiety and obsessive–compulsive symptoms in children and adolescents. In this context, exposure embodies the colloquialism “face your fears.” The goal of exposure therapy is to provide youth with an emotional learning experience to correct previous maladaptive beliefs, expectations, emotional responses, or behavioral patterns. For example, if a child is overly shy and fears others will respond negatively to her, she needs to practice talking to peers until she learns that conversations generally go well enough. If a child is anxious about having intrusive blasphemous thoughts, he needs to repeat those thoughts until anxiety is reduced and he learns thoughts are just thoughts and they cannot hurt him. Similarly, if a teen’s life is disrupted by fear of panic attacks, she needs to purposely bring on physiological symptoms of anxiety through hyperventilation and other means until she learns that although feelings of panic are uncomfortable, they are not dangerous.

The opening chapters of this book (Section 1) provide an introduction to exposure, its applications and history, as well as a review of the theoretical models of how exposure therapy leads to symptom improvement. Section 2 covers the empirical support for exposure therapy. Section 3 details the application of exposure and constitutes the heart of the book. With the aim of this book being to guide the implementation of exposure, the techniques introduced in Section 3 are illustrated through case examples in Section 4. The book closes with a discussion of how to respond to common obstacles and where to find additional resources in Section 5.

WHY USE EXPOSURE?

One of the most common questions from patients, parents, and therapists is, “Why should I do exposure therapy?” This is a very reasonable question given

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that exposure is often uncomfortable for everyone involved (youth, parents, and even therapists; Whiteside, Deacon, Benito, & Stewart, 2016). Youth or their parents may also wonder how exposure differs from the day-to-day struggles and challenges faced by someone with an anxiety disorder. The first answer, primarily for families, is that therapeutic exposure differs from unplanned daily life exposure in multiple important ways. Perhaps most important, exposure conducted in the context of therapy is designed to reduce or prevent escape and avoidance from the situation or thought, allowing the child to experience corrective learning. The child must remain in the situation long enough to evaluate the outcome without the cognitive distortions inherent during an anxious state. For example, a teen with social anxiety disorder may state that she confronts her anxiety every day when she attends school. However, if she avoids speaking to the peers who cause the most anxiety or tries to escape unavoidable conversations before she says the wrong thing, she will never have the chance to disprove her anxiety-causing beliefs. Therapeutic exposures are also conducted in a controlled, predictable, safe, and supportive manner that facilitates learning that anxiety in itself is not something to be feared and is manageable—conditions that are typically not present when feared situations are encountered in daily life.

The second major reason to engage in exposure therapy, primarily for clinicians, is that it enjoys the most empirical support of any treatment for childhood anxiety disorders and obsessive-compulsive disorder (OCD). In Section 2, we thoroughly review the literature supporting the use of exposure therapy. No other intervention, therapy, or medication has been evaluated as thoroughly as exposure-based treatments (Higa-McMillan, Kotte, Jackson, & Daleiden, 2017). This fact has three separate but related implications. First, there is sufficient evidence to encourage therapists to learn and implement exposure therapy as opposed to other traditional interventions, such as play therapy, relaxation, or general supportive therapy. Second, clinicians should be cautious about adopting the latest new trends in psychotherapy. Although innovations in therapy will undoubtedly lead to alternatives to exposure that may be as or more effective, initially promising approaches often fail to pan out. Until a new approach has been extensively supported by research, it should be viewed as a second-line approach to be used if exposure proves to be unsuccessful with a patient (Ollendick, Öst, & Farrell, 2018). Finally, in an age of increasing medicalization of mental health problems and emphasis on pharmaceutical interventions (Deacon, 2013), it may come as a surprise that exposure therapy rests upon a more substantial research base than medication for treating childhood anxiety disorders (Wang et al., 2017).

WHEN TO USE EXPOSURE?

Exposure therapy is most often associated with the treatment of excessive anxiety, fear, and worry. These symptoms occur within the disorders historically and/or currently categorized in the American Psychiatric Association's (APA) *Diagnostic and Statistical Manual of Mental Disorders* (DSM-IV [APA, 2000]

and DSM-5 [APA, 2013]) as anxiety disorders: social anxiety disorder, selective mutism, separation anxiety disorder, generalized anxiety disorder, panic disorder, agoraphobia, specific phobias, OCD, and post-traumatic stress disorder (PTSD). Despite difficulties addressing the developmental context in which anxiety disorders occur (Whiteside & Ollendick, 2009), the DSM-5 diagnoses provide a convenient framework for summarizing a cluster of symptoms that are associated with specific treatment recommendations. Accordingly, throughout this book, we link our discussion of exposure to corresponding DSM diagnoses for anxiety and OCD (with more limited reference to PTSD). However, for a variety of reasons described next, this book is organized around the symptom target (i.e., external stimuli, thoughts, and bodily sensations) of the exposure rather than the diagnosis per se. Table 1.1 illustrates the connection between common exposure targets and DSM-5 anxiety-related diagnoses.

Categorization by symptom target promotes efficiency by emphasizing how a single technique can be applied across disorders (i.e., transdiagnostically). Rather than learning separate treatment protocols for approximately 10 different disorders, the underlying principles of exposure can be applied to all of them. In addition, the disorders treated with exposure are highly comorbid (Beesdo, Knappe, & Pine, 2009). Youth diagnosed with any one of the previously mentioned disorders typically also meet the criteria for some of the other anxiety disorders as well as additional non-anxiety disorders. Moreover, which anxiety diagnosis is primary and which diagnosis is secondary seems not to be important in the treatment of the disorders (Ollendick, Jarrett, White, White, & Grills, 2016). If therapy protocols were diagnosis specific, real-world practice would more often than not require therapists to integrate two or more protocols in the care of a single patient. A focus on symptom target, rather than diagnosis, is also compatible with the continuous nature of anxiety symptoms. For instance, fears and worries may warrant treatment even if they do not meet the criteria for one of the previously mentioned disorders or if they occur within the context of another disorder.

External Stimuli

The most commonly recognized application of exposure is in vivo exposure, in which patients confront external stimuli that provoke anxiety, specifically objects, situations, and activities. Example objects include animals for specific phobia and contaminated doorknobs for OCD. Example situations include riding elevators for specific phobia or going to crowded shopping malls for agoraphobia. Activities could include talking to peers for social anxiety disorder, stepping on cracks in the “incorrect” way for OCD, making small errors on homework for generalized anxiety disorder, or eating certain foods for a specific phobia of choking. These types of exposure are typically designed to approach the fear, ride out the anxiety without escape, and challenge the beliefs that something bad will likely happen (e.g., dogs will bite, germs on public surfaces lead to illness, people will react with annoyance, or imperfections on homework will lead to failure). Furthermore,

Table 1.1 EXPOSURE TARGETS AND DSM-5 DIAGNOSES

Target	Examples	DSM-5 Diagnoses
EXTERNAL		
Objects	Animals, sources of contamination, reminders of trauma	Specific phobia, OCD, PTSD
Situations	Elevators, attending school, site of traumatic experience	Specific phobia, agoraphobia, PTSD
Activities	Eating, talking to peers, stepping in the “wrong” place while walking	Specific phobia, social phobia, OCD
THOUGHTS		
Future worries	“I will fail the class”	GAD
Memories	Trauma narratives	PTSD
Intrusive thoughts	Blasphemous thoughts	OCD
BODILY SENSATIONS		
Panic	Hyperventilation, shortness of breath	Panic disorder
Being unwell	Upset stomach	Illness anxiety disorder, specific phobia

GAD, generalized anxiety disorder; OCD, obsessive–compulsive disorder; PTSD, post-traumatic stress disorder.

these exposures may also be designed to teach patients that they can handle the distress associated with reminders of a trauma, feeling panicky in public, feeling embarrassed during awkward pauses in conversations, or the sense that a pattern of walking is “just not right.”

Thoughts

Thought exposure, also called imaginal exposure, involves confronting disturbing thoughts, memories, worries, or urges. Thought exposures should be used when the stimuli that produce anxiety are the thoughts themselves. This type of exposure is most often used with OCD, in which intrusive thoughts lead to ritualizing or other efforts to neutralize the thoughts, and with PTSD, in which traumatic memories are avoided because of the overwhelming emotions associated with them. For example, patients with fears of offending God may be prescribed to repeat the thought “I don’t care about God” while refraining from ritualistic prayers (common escape behaviors that incidentally reinforce anxiety). Thought

exposures for OCD frequently have the goal of demonstrating to patients that thoughts do not cause negative events, such as damnation or engaging in immoral behavior, even in the absence of rituals designed to undo the thought. Patients with PTSD may be assisted to recount the traumatic event without dissociating or suppressing emotions. When used with PTSD, narrative exposures commonly serve to demonstrate that although the traumatic memories will likely always be unpleasant, they do not have to be overwhelming and haunting and the patient does not need to avoid these thoughts to be safe. Based on success with OCD and PTSD, thought exposures can also be applied to future-oriented worries with the goal of demonstrating that thinking about a feared event does not cause it to come true and that the associated anxiety can indeed be tolerated and typically decreases with repeated exposure.

Bodily Sensations

Exposures to bodily sensations, or interoceptive exposures, are designed to elicit the physiological experience that triggers intense anxiety. These techniques were developed initially to address panic disorder and include exercises such as hyperventilation, breathing through a small straw, spinning in a chair, and running up and down stairs. The goal is to disconnect the typical bodily sensation (e.g., shortness of breath, dizziness, and heart racing) from the experience of anxiety, thereby teaching the patient that the physical sensations associated with anxiety and even intense panic may be uncomfortable but not dangerous. In addition to panic disorder, interoceptive exposures can be applied to other presentations in which the patient is afraid of the acute effect of the anxiety reaction. For example, hyperventilation could be applied to test anxiety if the child becomes anxious at the beginning of the test and then fears he will not be able to continue. Exposure to bodily sensations can also be used to address illness anxiety disorder, in which patients fear that physical symptoms such as dizziness or racing heart indicate the presence of an illness that might have long-term negative consequences.

Combining Exposure Techniques

Many anxiety presentations require the use of multiple exposure modalities. For example, a child with social phobia will need to do in vivo exposures that involve talking to peers but might also complete thought exposures to subsequent worries about the peers judging her. Moreover, multiple modalities can, and should, be combined together into a single exposure. Thought exposures can often be used to augment in vivo or interoceptive exposures. For instance, a boy with contamination-related OCD might repeat his feared thought, "I am going to get sick," while touching a hand railing in a public place. Moreover, to re-create the experience of panic attacks as closely as possible, a patient may hyperventilate

while walking through a crowded hallway and repeating “I am going to pass out,” thus combining all three exposure modalities.

Appropriate Emotion Targets

So far, we have focused primarily on using exposures to address anxiety, fear, and worry. However, exposure has also been successfully applied to other unpleasant emotions that can be impairing, such as disgust. Much of this research stems from work with OCD, a heterogeneous disorder that responds very well to exposure therapy. For example, exposure has been found to be successful for treating OCD symptoms stemming from disgust and the “just right” sensation (Abramowitz, Franklin, Schwartz, & Furr, 2003; Smits, Telch, & Randall, 2002). Whereas some children with contamination OCD fear that germs will lead to illness, others do not believe anything bad will happen, other than germs are disgusting and they will feel dirty until they wash themselves clean. Similarly, some children with OCD experience a sense that things are “not just right” if they tap a desk with one hand but not the other, chew their food an odd number of times, or write an imperfectly formed “e.” For some children, the sense that something is “not just right” is linked to a fear that something bad will happen (e.g., a car accident), but many children simply fear that this uncomfortable feeling of incompleteness will never subside unless the item is “fixed” with a compulsion. Although disgust may not decrease as quickly as fear when doing exposures (McKay, 2006), both disgust and “not just right” sensations can be successfully treated with exposure. This finding also has implications beyond OCD as many specific phobias of animals have an element of disgust (Matchett & Davey, 1991).

As mentioned previously, exposure shares common components with many psychotherapeutic traditions—more generally the idea of confronting rather than avoiding unpleasant emotions. However, exposure differs from other approaches in the degree to which the negative emotions are purposely elicited and exaggerated. For example, a clinician treating an adolescent with social phobia would not merely have her talk about times she felt embarrassed and weigh the accuracy of those beliefs but, rather, would help her design exposures to purposely embarrass herself, experience the ebb and flow of anxiety, and learn that it was not as bad as she thought. As such, exposure tests the belief “something bad will happen” that is at the heart of fear and anxiety. Accordingly, this book is focused on the use of exposure to address anxiety (fear and worry), as well as some related experiences (disgust and “not just right”). Other emotions, including sadness and anger, require different therapeutic approaches. Certainly, some of the underlying treatment principles are similar, especially tolerating an emotion until it subsides. However, there is not a research literature demonstrating that purposely provoking heightened anger or sadness is an appropriate or effective treatment. For example, the behavioral treatment of depression primarily involves behavioral activation, which is designed to evoke enjoyment to decrease depression rather

than to evoke sadness to demonstrate that it is tolerable. As such, first-line primary treatment of depression, disruptive behavior, eating disorders, autism spectrum disorders, psychosis, substance abuse, and other non-anxiety disorders is not addressed in this book.

Anxiety Disorders Versus Environmental Stress

Perhaps most important when determining whether to use exposure therapy with a patient is distinguishing between an anxiety disorder and environmental stress. Anxiety disorders are characterized by distorted overestimations of threat. For example, a socially anxious teen believes she is more likely than others to commit a social mishap and that it will be devastating if she does so, a child with separation anxiety believes he cannot handle being away from his mother for even a moment, a boy with a specific phobia of thunderstorms believes a tornado will occur whenever it gets cloudy outside and it will destroy his home and harm his family, a girl with generalized anxiety disorder worries about her grades even though she is on the A honor roll, and an adolescent with PTSD has nightmares about a car accident that occurred more than 1 year ago. In each case, the youth experiences intense anxiety and the need to avoid a situation that is generally safe and successfully navigated by other youth every day.

In contrast, environmental stress involves an anxiety reaction that is appropriate to the situation and similar to the response that would be expected by other youth in the same circumstance. Examples of environmental stress include a girl afraid to go to school because she is being bullied, an overly clingy child whose parents provide inadequate supervision due to substance abuse, a girl who worries about her failing grades related to poor reading skills, and an adolescent who fears his father's verbal and physical aggression. As can be seen from these examples, the difference between anxiety disorders and environmental stress is the degree of actual versus perceived threat.

Accurately evaluating whether a child's anxiety reflects an anxiety disorder versus environmental stress determines the course of treatment. As indicated previously, treatment of the former involves designing exposures to elicit anxiety and test the child's misperception. In contrast, treatment of environmental stress involves decreasing the child's anxiety through a variety of interventions, at times including avoiding the situation. Ideally, intervention for environmental stress results in fixing the problem, such as disciplining peers responsible for bullying, treating a reading disability, or providing family services. If the stressor cannot be removed, interventions may involve teaching coping skills, such as relaxation and problem-solving, and increasing the child's ability to manage stress, such as challenges related to experiencing a medical condition or family stressor. Although exposure is not the appropriate treatment for environmental stress, patient presentations in real life may not be so clear-cut. For example, at some point a child's reaction to a significant medical event could transition from expected stress indicating coping support to intrusive illness-related worries that are appropriate for exposure.

WHO USES EXPOSURE?

Exposure therapy has a long history of use with child anxiety. Mary Cover Jones, who worked with John B. Watson, recorded one of the first systematic examinations of various methods for eliminating fears in young children (Jones, 1924). Jones found that pure exposure, referred to as negative adaptation without additional re-educative measures, led to a reduction in fear and that pairing exposure with a positive activity—eating—engendered a positive response to the feared object. Although social imitation was also found to be successful, attempts to reduce the fear through discussion, ignoring, distraction, or social rebuke were unsuccessful. Because this study was a case series without the methodological rigor we have come to expect, its value is more of historical interest than probative (Ollendick, Sherman, Muris, & King, 2012). Nonetheless, the themes Jones examined remain relevant to modern treatment of childhood anxiety disorders. The interventions she found to be effective are precursors of using reinforcement and modeling to engage children in exposure therapy. In contrast, viewing clinical levels of anxiety as a phase that children simply outgrow is unlikely to be sufficient. The study also provides an inauspicious beginning for interventions that focus on discussing fears or distracting children from their fears rather than helping them face their fears (Ollendick & Muris, 2015).

Early on, exposure took the form of watching a model approach a feared object (i.e., vicarious learning; see Bandura, Grusec, & Menlove, 1967) and pairing anxiety with an incompatible physical state, typically relaxation (systematic desensitization; Wolpe, 1958). Research in the late 1960s and early 1970s witnessed the first randomized controlled trials (RCTs) of exposure therapy in children. Based on previous studies demonstrating the effectiveness of vicarious learning in the treatment of childhood phobias, Ritter (1968) compared group-based vicarious learning with and without contact desensitization (i.e., exposure) to a no treatment control. The children receiving exposure improved significantly more than did those without. This early study is of particular importance because it not only demonstrated that exposure was better than no treatment but also improved upon a treatment that had been previously found to be effective (Bandura et al., 1967). A second early RCT examined the effect of exposure apart from other aspects of systematic desensitization (Obler & Terwilliger, 1970). In order to treat specific phobias in children with neurological impairment, Obler and Terwilliger examined whether exposure could be successful without relaxation or awareness of the treatment procedures. The success of direct confrontation with feared stimuli encouraged through reinforcement in children regardless of intellectual ability suggested that exposure could be an effective stand-alone treatment. The effectiveness of exposure on its own as a superior treatment to vicarious learning was upheld two decades later in a seminal study conducted by Menzies and Clarke (1993).

The 1990s witnessed a surge in research into the treatment of child anxiety disorders, including three major advances. First, the application of exposure-based