



Review article

Trauma-Focused Cognitive-Behavioral Therapy: The role of caregivers

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ABSTRACT

Background: Childhood trauma exposure is unfortunately common and is associated with the development of posttraumatic stress disorder (PTSD) as well as a number of other serious medical and mental and health disorders. After experiencing trauma, children depend on their non-offending parents to believe and support them, reframe the meaning of the trauma, and to keep them safe from future harm. Parents are often negatively impacted by their child's trauma which may contribute to the child's risk for developing PTSD and related problems. Including parents in treatment may enhance child outcomes.

Methods: Trauma-Focused Cognitive-Behavioral Therapy (TF-CBT) is an evidence-based child and adolescent trauma treatment model that integrally includes non-offending parents or caregivers throughout treatment (hereafter referred to as "caregivers"). This article describes TF-CBT's underlying concepts, principles and core components, as well as the role of caregiver inclusion in this model, and evaluates the extant evidence for caregiver factors in predicting TF-CBT outcomes.

Results: Several studies suggest that inclusion of non-offending caregivers is associated with TF-CBT outcomes, and that this may occur through enhancing caregiver support of the child and/or reducing caregivers' trauma-related maladaptive cognitions.

Limitations: Few studies have evaluated whether caregiver factors served as formal treatment mediators.

Conclusions: Including non-offending caregivers in TF-CBT can improve youth outcomes.

Trauma is defined by the (American Psychiatric Association, 2013) as exposure to threatened or actual death, serious injury, or sexual violence. According to national surveys, trauma affects more than 60% of children in the United States prior to age 18 (e.g., Finkelhor et al., 2015; McLaughlin et al., 2013). Posttraumatic stress disorder (PTSD) is a common trauma-related mental health problem. According to the Diagnostic and Statistical Manual of Mental Disorders, 5th edition (2013), PTSD is characterized by symptoms of intrusion (e.g., nightmares, flashbacks), avoidance (e.g., of thoughts, feelings, places, or people that act as reminders), negative changes in cognitions and mood (e.g., self-blame, negative affect, anhedonia), and changes in arousal and reactivity (e.g., exaggerated startle response, hypervigilance). Symptoms must last for at least one month and cause functional impairment. Following trauma exposure, approximately 50% of child victim-survivors have at least one symptom of PTSD and 20% meet full criteria for the disorder (e.g., Alisic et al., 2014; McLaughlin et al., 2013). Non-interpersonal traumas (e.g., natural disasters) are

associated with PTSD prevalence rates of approximately 10%, whereas interpersonal traumas (particularly sexual abuse and assault) are associated with prevalence rates of approximately 35%. In addition to PTSD, traumatized youth are twice as likely as non-traumatized youth to develop major depression disorder (LeMoult et al., 2019). Externalizing behavior problems and substance use disorders also are common (Carliner et al., 2017).

According to the World Mental Health Survey Consortium, 70% of adults in 24 countries have been exposed to one trauma and 30.5% have been exposed to at least four (Benjet et al., 2016). Many of these adults are parents or other caregivers of children. These caregivers may have been exposed to trauma prior to becoming parents, exposed to their own trauma while they were parents, exposed to trauma with their children, and/or affected by their children's exposure to trauma. In a recent study of caregivers with trauma histories, approximately one third viewed their child's trauma as their worst event, one third viewed their own trauma as their worst event, and one third viewed a shared

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trauma as their worst event (Tutus and Goldbeck, 2016). In any of these scenarios, the caregivers may be experiencing significant trauma-related mental health problems, including PTSD and/or depression. Even when caregivers share the trauma with their children, the caregiver's symptom severity is often much higher than that of their children (e.g., Brown et al., 2019).

Caregivers' trauma-related symptoms and their management of those symptoms may influence children's mental health (Reyes and Lieberman, 2012). Caregivers' PTSD intrusive symptoms may result in ongoing fear and/or a lack of being present as a parent, which can be expressed by being overprotective of their children and demonstrating a lack of awareness of their children's symptoms (Mannarino and Cohen, 2011). Caregivers' avoidance of trauma reminders may result in children using their own avoidance as a maladaptive coping strategy (Brown et al., 2019). Children may adopt caregivers' cognitive sets like self-blame and negative views of themselves and the world (Goldbeck, 2016). Depression in caregivers (regardless of trauma history) is associated with inconsistent, disengaged, and hostile parenting (National Research Council, 2009). Caregivers' hyper-arousal symptoms may result in intolerance and impulsivity. The severity of caregivers' trauma exposure and PTSD have been found to be associated with their tendency to perceive their children's affect and behavior negatively (Martin et al., 2018; Thakar et al., 2013), and more inconsistent and dangerous parenting behavior (Cross et al., 2018).

Emerging research suggests that caregiver functioning can be a risk or protective factor for children exposed to trauma in their development of PTSD and other trauma-related mental health problems. In children with histories of sexual abuse and other forms of trauma, post-disclosure maternal support has been found to be negatively associated with the severity of children's trauma-related symptoms, including PTSD and externalizing behavior problems (e.g., Hebert et al., 2009; Wamser-Nanney, 2017). In the absence of supportive caregivers, traumatized children have been found to develop cognitive, emotional, and behavioral self-regulation difficulties (Cross et al., 2017), experience additional impairments in interpersonal functioning (Miller et al., 2014) and academic functioning (Larson et al., 2017; McKelvey et al., 2018).

Caregivers' PTSD and depression may put their children at risk for the same mental health problems. Severity of caregivers' PTSD and depression have been found to be correlated with children's symptom severity following their exposure to trauma (Morris et al., 2016; Scheeringa et al., 2015). Interestingly, Morris et al. (2016) found that fathers' symptoms only were indirectly associated with children's symptoms through parenting practices.

Caregiver mental health may mediate the relations between children's trauma exposure and their symptom levels. In a study of young children exposed to various forms of trauma, Scheeringa et al. (2015) found that maternal PTSD and depression approximately 11 months after the trauma mediated the relation between children's PTSD at 11 months post-trauma and 2 years later. In a similar study, Khamis (2016) found that caregivers' mental health symptom severity mediated the relations between the level of children's trauma exposure and their emotional and behavioral symptoms. In a study of the long-term impact of PTSD, Gilhooly et al. (2018) found that family environment moderated the association between youth PTSD severity and their own substance abuse.

This research suggests that the development of trauma-related mental health problems in children is related to caregivers' trauma history, their attributions about the event, trauma-related psychopathology, and coping. Because the large majority of caregivers has been exposed to trauma and caregivers often are traumatized by their children's trauma experiences, there is a clear need to include caregivers in trauma-focused therapies. The following description of Trauma-Focused Cognitive-Behavioral Therapy highlights the rationale for and integral role of caregivers in treatment.

1. Trauma-Focused Cognitive-Behavioral Therapy: Conceptual model

Trauma-Focused Cognitive Behavioral Therapy (TF-CBT; Cohen et al., 2017; 2012; <https://tfcbt2.musc.edu>) is a trauma-focused psychotherapeutic model for children ages 3–18 years old and their non-offending (non-perpetrator) parents or other primary caregivers. The TF-CBT conceptual model is based on reversing purported pathways for the development of Posttraumatic Stress Disorder (PTSD) and related problems in children and adolescents including 1) overgeneralized fear and associated avoidance; 2) physiological dysregulation; 3) maladaptive trauma-related cognitions; and 4) caregiver factors.

Overgeneralized fear and associated avoidance: During traumatic experiences children naturally experience a sense of danger and associated fear. When they are subsequently exposed to reminders of the trauma (“trauma reminders”, e.g., seeing the perpetrator, being asked about the traumatic experience, etc.), they often re-experience the sense of danger and fear that they had at the time of the original trauma and attempt to avoid such reminders. For example, a child who was terrified when being sexually abused by her uncle felt very afraid upon seeing that uncle again at a family reunion and refused to attend future family holidays or other family gatherings. In some cases children may associate danger and fear to *inherently innocuous* aspects of the situation during which the trauma occurred, leading to fear overgeneralization. For example, the above child was sexually abused by her uncle in her bedroom (an inherently innocuous cue), but she associated her bedroom with the sexual abuse to the degree that she felt unsafe in her bedroom and refused to sleep there. If children continue to avoid feared trauma memories and situations, PTSD symptoms become further reinforced. In contrast, helping children to master fears leads to decreased PTSD symptoms.

Physiologic dysregulation: Childhood trauma is associated with a number of adverse neurobiological changes, including increased resting and reactive heart rate and blood pressure, dysregulation of the hypothalamic-pituitary-adrenal (HPA) axis, dysregulation of limbic system function and connectivity, and reduced frontal cortex activity and volume, among others (DeBellis and Zisk, 2014). The ongoing interplay between observable PTSD hyperarousal symptoms and physiological trauma impact is complex. The TF-CBT conceptual model posits that brain and body are integrally connected. As a result, including relaxation skills that target physiological impact is important, and reducing measurable PTSD symptoms may reverse negative physiological trauma impact. Recent preliminary studies lend empirical support to this view (e.g., Cisler et al., 2015; Garrett et al., 2019).

Maladaptive trauma-related cognitions: After traumatic experiences children often develop negative trauma-related beliefs about themselves, others, and/or the world. For example, children may blame themselves for the trauma (“I should have known he would abuse me, I should have stopped him”) or blame a non-offending caregiver (e.g., “My mother must have known her brother was abusing me—she should have stopped him!”). Children may develop accurate but unhelpful beliefs about others (e.g., “You can never tell when someone will commit a mass shooting at school”) or generally inaccurate and unhelpful beliefs about the world (e.g., “The world is such a dangerous place that you always need to look out for danger”). A new symptom cluster in the PTSD DSM-5 diagnostic criteria includes negative alterations in mood or cognitions (APA, 2013) to address the importance of maladaptive cognitions in this disorder. Cognitive processing of general and trauma-specific maladaptive cognitions is a central skill to help children resolve PTSD symptoms.

Caregiver factors: Although all too often violated, a basic right of childhood is for parents and other adults to protect children from danger and keep them safe. After experiencing trauma, children depend on their non-offending caregivers to 1) believe them when they disclose their traumatic experiences, 2) provide emotional and practical support

related to their traumatic reactions, 3) model resilient coping strategies such as positively reframing the meaning of the trauma, and 4) keep them safe from future harm. Caregivers often are negatively impacted by their child's trauma experiences, which may contribute to the child's risk for developing PTSD and related problems. The TF-CBT model posits that caregivers can positively influence traumatic impact through providing support, believing their children related to their traumatic experiences, modeling positive coping strategies, and providing effective parenting practices. Including non-offending caregivers throughout treatment can enhance these outcomes and thus positively impact children's outcomes.

2. TF-CBT core principles

Three core principles of TF-CBT include 1) including caregivers throughout treatment; 2) proportionately provide components-and phase-based treatment; and 3) using gradual exposure throughout treatment.

Including caregivers throughout treatment: TF-CBT is a brief, structured treatment provided over 12–20 sessions, most of which consist of parallel individual sessions for child and caregiver, respectively. There are also 2–3 conjoint child-caregiver sessions. The same therapist sees child and caregiver each session. During each session the therapist provides one of the TF-CBT components to the child and caregiver, respectively (the components are described in the section below; there is also a Parenting Skills component provided only to caregivers). The therapist spends about half of each session with the caregiver and half with the child, providing the same TF-CBT component to each. There are also several joint child-caregiver sessions. Thus caregivers are integrally included in TF-CBT throughout the model.

Proportionately provide components- and phase-based treatment: The TF-CBT core components are summarized by the acronym PRACTICE (Psychoeducation; Parenting Skills; Relaxation Skills; Affective Modulation Skills; Cognitive Coping Skills; Trauma Narration & Processing; In vivo Mastery; Conjoint Child-Caregiver Sessions; Enhancing Safety). These comprise three phases: Stabilization; Trauma Narration; and Integration Phases.

The three phases are generally provided proportionally, that is, an equal number of sessions is used for each phase. Specifically, about four sessions would be used for each phase if the entire treatment was provided in 12 sessions; about six sessions per phase if the entire treatment were provided in 18 sessions. There is some leeway in this regard (e.g., there may be seven sessions for the Stabilization phase, six for Trauma Narration, and five for Integration for a total of 18 sessions), but generally the phases should be provided proportionally. For youth with chronic trauma and complicated trauma responses (“complex PTSD”) the stabilization phase may be somewhat longer than the other two as described elsewhere (Cohen et al., 2012).

Use Gradual Exposure throughout treatment: “Gradual Exposure” (GE) refers to progressively helping the child and caregiver gain increasing mastery over trauma memories and reminders by incrementally exposing them to more direct discussion about the trauma during treatment. During the Stabilization phase, this consists of encouraging children and caregivers to use the skills in relation to trauma reminders or memories; during the Trauma Narration phase children develop and process increasingly more detailed descriptions of their personal trauma experiences; and during the Integration phase children directly share these with caregivers, and develop plans for future safety and mastery. Gradual exposure is included in every session for child and caregiver and increases incrementally throughout treatment to lead to trauma mastery by the end of treatment.

3. Trauma-focused CBT core components

The TF-CBT core components include the following (more detailed descriptions are available at Cohen et al. 2017, 2012 and at <https://tfcbt2.musc.edu>).

tfcbt2.musc.edu).

Psychoeducation: The therapist provides information to the child and caregiver, respectively, about the child's type of trauma(s), the impact of trauma (focusing on the child's specific trauma responses such as affective, behavioral, physical, cognitive, school, social, interpersonal, etc.), connecting the child's trauma to trauma reminders and trauma responses; provides information about how treatment will address these problems, and hope for recovery. In psychoeducation, GE includes using the name of the child's trauma (e.g., “sexual abuse”, “domestic violence”, “death”) while maintaining normal voice tone and volume and open body posture, and helping child to identify trauma reminders related to the traumatic experiences.

Parenting skills: The therapist provides the caregiver with information about traumatic behavioral responses and as appropriate, connects these to the child's behavioral problems and helps the caregiver recognize potential antecedents (trauma reminders) to these behaviors as well as consequences (e.g., ways the caregiver may inadvertently be reinforcing the negative behaviors by giving negative attention). The therapist provides education about effective parenting skills; and demonstrates, role plays, and practices these skills as appropriate with the caregiver, and as appropriate includes the child and caregiver to develop a behavioral plan that is individually appropriate for the child. GE includes connecting the child's negative behaviors to trauma reminders (as appropriate) (e.g., the child had something bad happen rather than being a bad child).

Relaxation skills: The therapist introduces, demonstrates, role plays, and practices individually tailored relaxation strategies with the child (e.g., focused breathing, progressive muscle relaxation, guided visualization, music, crafts, sports, etc.) to decrease the child's physiological hyperarousal. The therapist introduces self-monitoring skills (rating 1–10) and encourages the child to rate hyperarousal daily before and after practicing the skill(s) for at least 20 min and with trauma reminders. The therapist provides, demonstrates, role plays and practices these skills with the caregiver, trains in self-monitoring and encourages the caregiver to support the child in using the skill(s) daily and with trauma reminders. GE includes using the skills with trauma memories and reminders.

Affective modulation skills: The therapist introduces and practices feeling identification strategies, then introduces, demonstrates, role plays and practices individually tailored affective modulation strategies with the child (e.g., positive activities, self-soothing, distraction, seeking social support, etc.), encourages the child to self-monitor negative affective states and rate the use of strategies before and after practicing the skill(s) for at least 20 min daily and with trauma reminders. The therapist provides, demonstrates, role plays and practices these skills with the caregiver and encourages the caregiver to use the skill(s) daily and with trauma reminders. GE includes using the skills with trauma reminders and memories.

Cognitive coping skills: The therapist introduces the cognitive triangle (connections among thoughts, feelings and behaviors) and encourages the child to identify negative thoughts related to recent everyday events (e.g., not invited to party: “No one likes me”), then to generate a triangle identifying associated feelings and behaviors (e.g., F: sad; B: isolate myself). The therapist then helps the child to explore alternative ways of thinking about the situation and coming up with alternative thoughts that may be more accurate and/or helpful (e.g., “Maybe she was only allowed to invite 5 people, I'm not one of her closest friends”). The therapist encourages the child to make an alternative triangle focusing on that thought (F: Less sad, okay; B: call one of my friends and invite them to sleep over the night of the party). The therapist continues to encourage the child to use cognitive coping strategies in other everyday situations until the child gains some mild ability to use this. The therapist introduces the parallel strategy to the caregiver and encourages the caregiver to use these strategies also. GE in this component is only used for the caregiver; the child is not encouraged to apply this strategy to traumatic memories until the next component. The caregiver

may start to use cognitive processing related to his or her personal thoughts about the child's trauma during this component.

Trauma narration and processing: During this component the therapist gradually assists the child in developing and processing their personal trauma experience(s). This often starts with developing a life timeline, identifying the duration of different traumas, placements, etc., in order to organize and structure the child's narrative. The narrative most typically takes the form of a book with discrete chapters but can be developed into other formats as described elsewhere (Cohen et al., 2017). This process is interactive, with the therapist encouraging the child to gradually describe increasing details about the trauma experiences, and including more thoughts, feelings, body sensations, etc. into the narrative. After the child has described details of various traumas, the therapist helps the child to identify and process maladaptive cognitions and to make new meaning of the traumatic experiences. As the child is developing the narrative during individual sessions, the therapist meets individually with the caregiver to share the narrative and prepare the caregiver for coming conjoint sessions. During this component GE occurs as the child gradually and repeatedly describes more details of their traumatic experiences with gradually decreasing distress over time; and as the caregiver hears these details from the therapist during the individual caregiver sessions.

In vivo mastery: This is the only optional TF-CBT component. For children who have overgeneralized avoidance of innocuous cues that is impairing the child's functioning, the therapist implements an in vivo mastery plan. This consists of collaborating with the child and caregiver to establish a "ladder" or hierarchy of the innocuous situations the child fears and avoids, developing and following a plan for the child to face their fear and master their avoidance of each progressive step up the ladder until they have mastered the final step of the ladder. For example, the child described earlier who could not sleep in her room might include steps of changing into her nightgown in her room (step 3 on the ladder); lying in bed with mother in the room for 30 min (step 5 on the ladder); and sleeping all night in her bed (step 10, final step on the ladder). The therapist works with the caregiver to provide psychoeducation about the value of the child mastering overgeneralized fears, encourage the child to use relaxation and other TF-CBT skills to modulate fears during this component, and address the caregiver's own fears about the in vivo mastery plan as needed. GE is an inherent part of this component as the child has ongoing exposure to overgeneralized trauma reminders throughout in vivo mastery.

Conjoint child-caregiver sessions: The therapist may include brief joint child-caregiver sessions at any time during TF-CBT (e.g., to develop a behavioral or in vivo mastery plan; to have the child demonstrate relaxation skills to the caregiver, etc.). However, after completing the Trauma Narration and Processing component, the therapist typically convenes several conjoint child-caregiver sessions. During the sessions the therapist facilitates the child's directly sharing the trauma narrative with the caregiver, encourages joint positive communication between the child and caregiver about the trauma narrative; and guides the child and caregiver to engage in family safety planning and treatment termination discussions. GE includes helping the child and caregiver to discuss and process details about the child's personal trauma experiences, share new cognitions (meanings) about these experiences that the child and caregiver, respectively, have developed through the therapy process, and communicate positively with each other about their respective experiences in going through this process.

Enhancing safety and future development: The therapist continues to discuss safety issues and how the child can feel safe, trust others, and move forward in a healthy developmental trajectory after therapy ends. (Note: for youth with acute safety risks, the therapist begins TF-CBT with this component and it continues throughout TF-CBT.) The therapist meets with the caregiver to share the youth's safety strategies and to enhance the caregiver's ability to assure the youth's (and other family members') safety. Other developmental issues including referrals to other mental health providers are addressed as appropriate. Assessment

instrument(s) are repeated at the end of treatment to assess progress. Treatment ends with a graduation ceremony GE includes addressing how the child will cope with ongoing trauma reminders after the end of therapy.

Empirical research support: TF-CBT currently has the strongest evidence among the empirically based youth trauma treatments, with 22 completed randomized clinical trials supporting its efficacy relative to comparison or control conditions (reviewed in Cohen et al., 2017, pp 74–78).

4. Rationale for including non-offending caregivers

Given the rate of trauma in caregivers, associated mental health problems, and ways in which those mental health problems may impede the success of TF-CBT, there is a clear rationale for including non-offending caregivers in treatment. Using psychoeducation, relaxation, and exposure with caregivers maximizes their physiological regulation and minimizes both their own avoidance and promotion of their children's avoidance. Ameliorating caregivers' intrusive symptoms and arousal helps them be more present which results in more intentional and successful parenting. Teaching caregivers cognitive restructuring not only reduces their maladaptive thinking but helps them challenge their children's self-blame and perceptions that the world is a dangerous place. Caregivers learn all TF-CBT skills both to address their own symptoms and be a coach for their children as they practice the skills. As described above, caregivers are integrally included throughout TF-CBT and receive every TF-CBT component either in parallel individual sessions or in conjoint sessions with the child. This is based on the strong conviction, as well as growing evidence described below, that parental factors can contribute in critical ways to children's positive adaptation.

5. Data supporting parental inclusion: mediators and moderators

Many of the randomized trials conducted on TF-CBT (reviewed in Cohen et al., 2017; Martin et al., 2019) have shown significantly greater improvements in distress, support, and depression for caregivers receiving TF-CBT compared to those receiving supportive therapy. This is critical because children's psychosocial treatment in general is less effective when caregivers are experiencing mental health problems (Maliken and Katz, 2013). Below is a discussion of the emerging research on the impact of caregiver relationship to the treated child, caregiver's perceptions of children's mental health, and improvement in caregiver's symptoms on children's response to and completion of TF-CBT.

Importance of caregiver involvement. Since the TF-CBT model so strongly integrates caregivers into treatment, TF-CBT clinical research has from the beginning attempted to delineate the impact of parental inclusion on children's outcomes. The first two TF-CBT randomized controlled trials each documented significant ways that caregiver participation in treatment significantly impacted children's improvement. Specifically, in their first TF-CBT randomized controlled trial, Deblinger et al. (1996) randomized families to one of four conditions: 1) TF-CBT provided to children only, 2) TF-CBT provided to caregivers only, 3) TF-CBT provided to children and caregivers, or 4) routine community care. They found that decreases in children's externalizing behavior problems and depression were significantly higher in the caregiver conditions, whereas decreases in children's PTSD were significantly higher in the child conditions. This study is consistent with caregiver training literature (e.g., Webster-Stratton and Hammond, 1997) suggesting that caregiver involvement is more important than child involvement in interventions designed to reduce externalizing behavior problems.

Pre-treatment parent factors as predictors of children's treatment outcomes. In their randomized controlled trial of preschoolers, Cohen and Mannarino (1996) found that caregivers' more severe pre-treatment

trauma-related emotional reactions were predictive of caregiver report on children's total, internalizing and externalizing behavior problems at post-treatment. In a randomized controlled trial of 7–14 year old children comparing TF-CBT to nondirective supportive therapy, [Cohen and Mannarino \(2000\)](#) found that caregivers' support for the child assessed at pre-treatment was predictive of child-reported anxiety and depression at post-treatment assessment.

Caregiver factors as moderators of treatment process and outcomes. Emerging research is exploring caregiver characteristics as potential mediators and moderators of children's response to TF-CBT. In a series of moderator analyses conducted with families from Zambia who participated in a randomized trial of TF-CBT, [Kane et al. \(2016\)](#) found children whose mothers were primary caregivers showed greater reductions in PTSD, whereas children whose fathers were primary caregivers showed greater reductions in functional impairment. Children who had either two biological parents or their mother alive showed greater reductions in functional impairment than those with no parents alive (i.e., primary caregiver was not a biological parent). There was no significant moderator effect for caregiver participation in treatment.

Caregiver behavior during TF-CBT as a predictor of children's outcomes. In addition to the moderator studies, investigators have explored the predictive influence of caregiver and youth process variables during the various phases of TF-CBT. [Yasinski et al. \(2016, 2018\)](#) used an observational coding system to rate caregiver support, blame of child, cognitive-emotional processing of the child's trauma, and avoidance. They found that caregiver avoidance behavior during the psychoeducation and skill-building phase was predictive of children's externalizing behavior problems at post-treatment assessment. Caregivers' cognitive-emotional processing of their own and their children's trauma reactions (i.e., attempts to understand and make meaning) during trauma narration predicted decreases in youth internalizing symptoms and externalizing behavior problems at post-treatment. Caregivers' avoidance and blame of the child during narration predicted worsening of children's internalizing symptoms and externalizing behavior problems at follow-up. None of the caregiver variables predicted change in PTSD at post-treatment or follow-up assessment.

In an attempt to understand the mechanism of action through which caregiver characteristics influenced children's response to TF-CBT, [Yasinski et al. \(2016\)](#) looked at the stepwise progression of caregiver avoidance and blame, children's maladaptive cognitions, and treatment outcomes. They found that caregiver's blame during narration was negatively associated with children's healthy accommodation (defined as a balanced view of self, others, and the world in the context of the trauma) which, in turn, was negatively associated with internalizing symptoms at post-treatment. Caregiver's avoidance and blame during narration were associated with children's overgeneralization (defined as generalization of trauma characteristics to other situations) which, in turn, predicted externalizing behavior problems at follow-up.

Two recent studies continued the focus on the mechanisms of change by exploring the mediating role of improving caregivers' maladaptive post-trauma cognitions in children's response to TF-CBT. [Tutus et al. \(2019\)](#) found that reductions in caregivers' maladaptive post-trauma cognitions mediated the relation between treatment condition (TF-CBT versus waiting list) and caregiver report of children's PTSD symptom severity at post-treatment assessment. Specifically, in TF-CBT, reductions in caregivers' dysfunctional cognitions was associated with caregiver-reported reductions in PTSD. Interestingly, change in caregivers' post-trauma cognitions did not mediate the relation between treatment condition and child self-report of their PTSD. [Holt et al. \(2014\)](#) examined caregiver emotional reactions to the abuse and depression as potential mediators between treatment condition (TF-CBT versus treatment-as-usual) and children's psychopathology at post-treatment. They found that caregiver changes did not mediate children's PTSD symptom severity, but improvement in caregivers' depression predicted improvement in children's depression at post-treatment.

Caregiver effects on engagement, attendance, and completion. Lastly, treatment completion of trauma-specific, psychosocial interventions has been found to be associated with larger rates of symptom reduction and improvements in functional impairment than non-completion ([Steinberg et al., 2019](#)). Completion in TF-CBT has been reported to be approximately 60% in an outpatient community setting and child advocacy center ([Sharma-Patel and Brown, 2016](#); [Wamser-Nanney and Steinzor, 2017](#)). In a study comparing caregiver self-reported symptoms, caregiver report of children's symptoms, and child self-reported symptoms as predictors of attrition from TF-CBT ([Tebbett et al., 2018](#)), the investigators found that only caregiver reports of children's internalizing symptoms and externalizing behavior problems were associated with attrition. In a similar effectiveness study of TF-CBT, [Yasinski et al. \(2018\)](#) found that high levels of child and caregiver avoidance during early sessions predicted dropout. They also found that children in foster care were more likely to complete TF-CBT than those living with biological parents and other relatives. [Salloum et al. \(2015\)](#) examined feedback from children and their caregivers who participated in TF-CBT and found that 82% of caregivers rated parent-child meetings as the most liked/helpful element of treatment. These studies highlight the importance of caregiver perceptions and avoidance in ensuring that children attend and complete TF-CBT.

6. Future directions and gaps in the field

The research presented on caregiver involvement in TF-CBT suggests that both support and psychopathology at baseline, and improvement in caregivers' support, post-trauma cognitions, and psychopathology are risk/protective factors for children's treatment outcomes. Many of these studies are randomized trials, with reasonable sample sizes and diverse samples, psychometrically-robust measures, and procedures that ensure fidelity to TF-CBT. Conclusions are limited by the lack of inclusion of measurement of a number of constructs of interest, lack of examination of treatment dropouts, comparison of TF-CBT to other treatments designed to address caregiver functioning, and more complex models to test mechanisms of action.

Future research studies should include a more thorough assessment of caregiver characteristics that might moderate children's response to and dropout from TF-CBT. [Martin et al. \(2019\)](#) found that less than half of studies examining caregivers in the context of TF-CBT included measures of demographic variables, such as caregiver age, gender, race/ethnicity, education, socioeconomic status, and relationship status. Other important moderators for future TF-CBT studies include: caregiver trauma history (including trauma type), trauma-related psychopathology, and previous experience with therapy.

Our second recommendation is a more detailed analysis of treatment dropouts given that they are a significant subset of TF-CBT study participants ([Sharma-Patel and Brown, 2016](#)). Qualitative methods (e.g., individual interviews, focus groups) may be helpful in understanding how caregiver perceptions and reactions influence the lack of treatment response and dropout. In a comparison of two treatment cases who received a modification of TF-CBT for teenagers, [Grefe et al. \(2020\)](#) found that caregivers' relationship to the perpetrator, lack of resolution of their own trauma, and passive parenting style were associated with treatment failure.

To better understand the mechanism of action through which caregiver characteristics and improvement influence child improvement in TF-CBT, we recommend a more thorough cross-lag analysis of the relation between caregiver and child change. Similar to [Yasinski et al. \(2018\)](#), these studies should examine process variables that may mediate outcomes, such as caregivers' degree of their own coping skill use during and outside of sessions, and coaching their children to practice coping skills. In addition, they should measure outcome variables that reflect the caregiver role in TF-CBT, such as family environment (e.g., conflict, cohesion) and attachment, after each phase of treatment and up to one year of follow-up. Lastly, we

recommend that TF-CBT be compared to dyadic and family therapy approaches that purport of change caregivers and caregiver-child relationships to examine the differential impact on caregiver and child PTSD.

These recommendations need to be considered in the context of the burden of additional assessment measures and time points on participating children and caregivers. In fact, at the trauma clinic run by the first author (E.B.), a higher percentage of families drop out during the pre-treatment assessment phase than during TF-CBT. What makes this harder is that funding for psychotherapy is limited and compensation for families is minimal. There is a clear need for intervention studies, but a dearth of resources to conduct them. Perhaps embedding evaluation in usual care settings in which clinicians are using TF-CBT in an open trial research design is a feasible method for studying mediators and moderators of outcome.

Declaration of Competing Interest

All authors confirm that there are no actual or potential conflicts of interest including any financial, personal or other relationships with other people or organizations within three (3) years of beginning the work submitted that could inappropriately influence, or be perceived to influence, their work.

Data statement

This paper included no analysis of data and therefore, none will be made public.

Supplementary materials

Supplementary material associated with this article can be found, in the online version, at [doi:10.1016/j.jad.2020.07.123](https://doi.org/10.1016/j.jad.2020.07.123).

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