AN EXAMINATION OF ACTIVE LEARNING AS AN INGREDIENT OF CONSULTATION FOLLOWING TRAINING IN COGNITIVE-BEHAVIORAL THERAPY FOR YOUTH ANXIETY

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ABSTRACT

The training literature suggests that ongoing support (e.g., consultation) following initial training enhances training outcomes, yet little is known about the critical components of ongoing support and the lasting effects of ongoing support. The present study examined components of consultation calls that were provided to 99 community clinicians following training in the delivery of cognitive-behavioral therapy (CBT) for youth anxiety. The 104 recorded consultation calls were coded for content and consultative methods present. A subset of the training sample (N = 50) completed a 2-year follow-up interview during which they reported on their implementation rates of CBT since ending consultation. They also completed measures assessing CBT knowledge and attitudes toward evidence-based practices (EBPs). It was hypothesized that active learning (i.e., role-plays) would predict therapist adherence, skill, self-efficacy, and satisfaction at post-consultation, but regression analyses found no significant relation. However, level of clinician involvement during consultation calls significantly positively moderated the relation between active learning and clinician skill. Analyses of the follow-up data indicated (a) high implementation rates of CBT and (b) maintenance of overall attitudes toward EBPs, willingness to implement EBPs if mandated, views regarding the appeal of EBPs, and beliefs regarding the clinical utility of EBPs. A significant decline in CBT knowledge and openness toward EBPs was observed. Consultation call attendance positively predicted therapist CBT knowledge, overall attitudes toward EBPs, and attitudes regarding the appeal and clinical utility of EBPs at the 2-year follow-up. Implications, strengths and limitations, and future directions are discussed.

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This study is dedicated to my lifelong consultants—my husband, my parents, and my siblings.

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CHAPTER 1

MANUSCRIPT IN ARTICLE FORM

An Examination of Active Learning as an Ingredient of Consultation Following Training in Cognitive-Behavioral Therapy for Youth Anxiety

Despite the development of evidence-based practices (EBPs), defined as "the integration of the best available research with clinical expertise in the context of patient characteristics, culture, and preferences" (American Psychological Association, 2005, p. 1), a gap exists between optimal care and the care typically received by individuals with mental health problems (President's New Freedom Commission on Mental Health, 2003). In an effort to translate EBPs into community settings, implementation science has emerged (Fixsen, Naoom, Blasé, Friedman, & Wallace, 2005) to examine how best to disseminate (i.e., purposefully relay important information to treatment providers), implement (i.e., adopt specific practices based on disseminated information), and sustain (i.e., continue implementation over time) EBPs in community settings (Lomas, 1993; Stirman et al., 2012). Given that one common reason cited for the research-practice gap is the lack of community clinicians trained in EBPs (e.g., McHugh & Barlow, 2010; Williams & Martinez, 2008), the call has been made for dissemination and implementation researchers to examine effective training practices (e.g., Beidas & Kendall, 2010).

A trans-disciplinary review of the training literature provides preliminary answers regarding optimal training practices, specifically suggesting that ongoing support following initial training yields beneficial outcomes. Within the medical field, the Cochrane Effective Practice and Organization of Care (EPOC) Group concluded that educational meetings alone provide generally small effects on physician performance and health care outcomes (Forsetlund et al., 2009). The most effective continuing medical

education workshops (as judged by measures of physician performance and client health care outcomes) have been found to be those that employ interactive techniques or a mix of interactive and didactic techniques, those that involve multiple or longitudinal sessions, and those that incorporate enabling methods, such as providing patient educational materials (Davis et al., 1999). Similar conclusions have been drawn regarding mental health service training. Multi-component trainings and those that incorporate workshop supplements, such as ongoing consultation and supervisor feedback, have been shown to enhance clinician skill, adherence, knowledge, and rates of implementation, as well as client outcomes (Herschell, Kolko, Baumman, & Davis, 2010).

A common finding across the training literature is the importance of providing ongoing support following initial training workshops in order to further improve outcomes, however, it remains unclear what constitutes the optimal length, content, and structure of ongoing support efforts (Edmunds, Beidas, & Kendall, 2012). The lack of detailed descriptions of training procedures in the training literature (Rakovshik & McManus, 2010) and the dearth of empirical investigations on ongoing support contribute to limited knowledge regarding optimal approaches as well as the lasting effects of these training practices on therapist and client outcomes. Following is an illustrative list of various forms and techniques of ongoing support that have been found across the training literature: supervision on specific cases (e.g., Morgenstern, Morgan, McCrady, Keller, & Carroll, 2001), group supervision (e.g., Lau, Dubord, & Parikh, 2004), session tape review (e.g., Grey, Salkovskis, Quigley, Clark, & Ehlers, 2008), role-plays (e.g., Beidas, Edmunds, Marcus, & Kendall, 2012), instructor and/or peer feedback (e.g., Lau et al., 2004; Harchik, Sherman, Sheldon, & Strouse, 1992), skill-building

supervision (e.g., Mannix et al., 2006), on-site observation (e.g., Parsons & Reid, 1995), phone consultation (e.g., Miller et al., 2004), consultation with experts in addition to case supervision with supervisors (e.g., Hawkins & Sinha, 1998), relapse prevention supervision (e.g., Luoma et al., 2007), supervision structure that parallels cognitive-behavioral therapy (CBT; Bradshaw, Butterworth, & Mairs, 2007), technical assistance on the adoption process (e.g., Dixon et al., 1999), peer supervision networks (e.g., Sanders, Turner, & Markie-Dadds, 2002), and question and answer e-mail forums (Sanders et al., 2002). Although it remains unclear which types of support are critical and which combinations are most potent, this list provides targets for future empirical work.

The specific type of ongoing support focused on in the present study is *consultation*, defined as "a process of interaction between two professionals–the consultant, who is a specialist, and the consultee, who invokes the consultant's help in a current work problem that he believes is within the consultant's area of specialized competence" (Caplan & Caplan, 1993, p. 11). A recent randomized controlled training trial demonstrated the beneficial effects of consultation (Beidas et al., 2012). In the study, 115 clinicians were randomly assigned to one of three conditions: (1) a one-day workshop that covered a specific manual (i.e., *Coping Cat*; Kendall & Hedtke, 2006) and procedures of CBT for youth anxiety, (2) computer training on CBT for youth anxiety accomplished through a commercially-developed interactive DVD, or (3) a one-day workshop that included a focus on principles of CBT and interactive learning. Following one day of training, participants completed three months of weekly consultation via telephone or internet. Main outcomes of interest included CBT knowledge, skill (i.e., competence in delivering treatment according to the CBT model), and adherence (i.e., the

presence of core CBT components) during independently-rated, audiotaped role-plays. Clinicians in all conditions demonstrated moderate improvements in knowledge, skill, and adherence from pre- to post-training and further improvements in skill and adherence from post-training to post-consultation. Clinicians who attended more consultation calls evidenced greater improvements in skill and adherence compared to clinicians who attended less calls. The question remains regarding what specific characteristics of consultation accounted for these findings as well as the long-term effects of consultation on therapist and client outcomes.

One theory that may guide examinations of effective consultation practices is Kolb's (1984) theory of experiential learning, which posits the critical role of active learning techniques for knowledge and skill acquisition. According to this theory, learning is a cyclical process that involves the transformation of experience. Specifically, this theory posits that learning occurs in four stages: experiencing, reflecting, conceptualizing, and experimenting. The first stage involves concrete experience during which the learner engages in an activity. In the second stage, the learner reflects on the experience. In the third stage, the learner conceptualizes a theory or model based on what he/she observed about the concrete experience. In the fourth stage, the learner tests out the theory through active experimentation (i.e., he/she plans for and engages in further activity). This theory asserts that optimal learning is achieved when the learner proceeds through all four stages. Thus, the effects of training and ongoing consultation will be maximized when they provide opportunities for the trainee to engage in active learning, reflect upon his/her actions, conceptualize new actions, and engage in further practice. Accordingly, a passive bystander who engages in reflection and conceptualization is

likely to learn less effectively than another learner who also actively participates in concrete activities and experimentation. Milne, Aylott, Fitzpatrick, and Ellis (2008) adhered to this theory in their model of supervision, which hypothesizes that within contextual factors (i.e., organizational factors, intervention factors, research factors, learning factors, and participant factors) supervisory techniques positively affect clinician skill and client outcomes primarily through assisting the clinician in moving through Kolb's (1984) learning cycle.

A review of training and supervision provides preliminary support for the effectiveness of active learning techniques. For example, interactive methods were found to be important in continuing medical education workshops (Davis et al., 1999). Incorporating role-plays into suicide prevention gatekeeper training resulted in higher levels of skill than standard training (Cross et al., 2011). Milne and James (2000) summarized effective supervision techniques found in the most methodologically sound supervision studies conducted to date. They identified the most prevalent active (i.e., enactive; behavior-based), symbolic (i.e., word-based), and iconic (i.e., image-based) supervision techniques. Although the review did not conclude which techniques were most effective, it is of note that active techniques were more commonly used than either symbolic or iconic techniques. The most common active techniques included feedback, meetings, and role-plays. These findings suggest that active learning contributes to positive training and supervision outcomes. Given the similarities between traditional supervision and consultation as an ongoing support strategy for training, it can be hypothesized that active learning strategies also contribute to positive outcomes in consultation.

The present study examined components of consultation following training in CBT for youth anxiety disorders with a focus on the effects of active learning techniques. We examined whether the use of an active learning technique (i.e., role-play) in consultation calls conducted in the Beidas et al. (2012) training study predicted (a) utility (i.e., skill and adherence) and (b) affective outcomes (i.e., self-efficacy and satisfaction; Kirkpatrick, 1979). It was hypothesized that proportion of time dedicated to active learning (i.e., role-plays) would predict greater skill, better adherence and higher ratings of self-efficacy at post-consultation as well as higher ratings of perceived quality of the consultation calls. It was also hypothesized that the proportion of time dedicated to active learning techniques would be a stronger predictor of these outcomes than the proportion of time dedicated to passive learning techniques. Additionally, we examined whether clinician involvement (i.e., amount and depth of clinician discussion on call as well as their participation in role-plays) moderated the relationship between active learning and outcomes. We also examined whether participation in consultation independent of learning techniques predicted implementation of the treatment following participation in the study. It was hypothesized that participation in consultation calls would predict higher implementation rates and that clinicians who attended calls that included a higher proportion of time dedicated to active learning would demonstrate higher implementation rates following participation in the study. Lastly, exploratory analyses examined maintenance of CBT knowledge and attitudes toward EBPs at a 2-year follow-up as well as potential predictors of these variables and implementation rates.

Method

Participants

Of the 115 participants in the Beidas et al. (2012) study, the 99 participants who completed at least one consultation call and post-consultation measures served as the participants of the current study when testing hypotheses pertaining to the prediction of adherence, skill, self-efficacy, and satisfaction. Subsequent to the Beidas et al. (2012) study, 50 (43%) clinicians completed a 2-year follow-up interview. These clinicians served as participants when testing hypotheses regarding implementation rates and exploratory analyses.

Demographics. All participants were from urban and suburban areas in the northeastern United States. Ages ranged from 23 to 75 (M = 35.92, SD = 11.36) and 91.9% were female (N = 91). Clinicians self-identified as Caucasian (69.7%), African-American (13.1%), Hispanic/Latino (2%), Asian (5.1%), Native American/Alaskan (1.0%), and Other (4.0%). Ethnicity data was missing for 5.1% of participants. Information regarding these demographics for participants in the original sample and the 2-year follow-up sample can be seen in Table 1. Compared to participants who attended no consultation calls, those who attended at least one call were significantly less likely to be Hispanic/Latino. Compared to participants who completed the 2-year follow-up, those who did not participate were significantly more likely to be Hispanic/Latino. Other demographic variables were similar across samples.

Educational Status. With regard to educational degree, 59.6% had a master's degree, 18.2% were enrolled in a graduate program, 5.1% had a medical degree, 4.0% had a doctorate in philosophy, 5.1% had a doctorate in psychology, 2.0% had a doctorate

in education, and 6.1% had an "other" degree. With regard to state licensure, 28.3% were licensed. Information regarding these demographics for participants in the original sample and the 2-year follow-up sample can be seen in Table 1. Chi Square analyses comparing those who attended at least one consultation call versus those who did not as well as analyses comparing those who completed the 2-year follow-up versus those who did not indicated similar educational and licensure status across samples.

Clinical Experience. Therapists reported previous clinical experience ranging from 0 to 396 months (M =65.12, SD = 86.18). Approximately half of the clinicians (49.5%) reported having previously treated an anxious youth. None reported previously receiving supervision on the use of the *Coping Cat* (Kendall & Hedtke, 2006) and few reported having previously used the *Coping Cat* to treat anxious youth, with the number of cases ranging from 0 to 2 (M = .12, SD = .46). Clinicians reported high identification with CBT (M = 4.96, SD = 1.69; range = 1-7). With regard to caseload, clinicians reported carrying an active caseload of 0 to 150 clients (M = 18.44, SD = 23.37). Clinicians reported receiving 0 to 25 hours of supervision per week (M = 1.65, SD = 2.81) and attending 0 to 600 hours of workshops in the past 2 years (M = 29.43, SD = 81.38). Information regarding these demographics for participants in the original sample and the 2-year follow-up sample can be seen in Table 1. Compared to those who attended at least one consultation call, participants who attended no calls reported fewer previous *Coping Cat* cases. Compared to those who participated in the 2-year follow-up, participants who declined or failed to respond the study invitation reported significantly higher levels of identification with CBT and more previous hours of workshop training at baseline. Other clinical experience variables were similar across samples.

Measures

Clinician Demographics and Attitudes Questionnaire (CDAQ; Beidas, Barmish, & Kendall, 2009). The CDAQ (see Appendix A) is a 15-item questionnaire that gathers background information (e.g., demographics) and assesses for prior experience with the *Coping Cat* program (Kendall & Hedtke, 2006) as well as opinions towards CBT for youth anxiety. Psychometric data on the CDAQ questions that target opinions towards CBT for youth anxiety indicate acceptable reliability with an intraclass coefficient (ICC) of .91 and Spearman Brown split-half reliability of .85 (Beidas et al., 2009).

Therapist Background Questionnaire (TBQ; Weisz, 2004). The TBQ (see Appendix A) is an 11-item questionnaire that gathers demographic information, including (1) numbers of hours spent in workshops over the past two years, (2) number of active cases, (3) weekly supervision hours, (4) professional burnout, and (5) theoretical orientation.

Organizational Readiness for Change (ORC; Institute for Behavioral Research, 2002). The ORC (see Appendix A) is a 129-item questionnaire that measures organizational characteristics using 5-point Likert rating scales from 1 (*strongly disagree*) to 5 (*strongly agree*). The ORC consists of 18 scales organized into four major domains: (1) motivation, (2) resources, (3) staff attributes, and (4) organizational climate. Motivational factors include training needs, program needs, and pressures for change. Resources refer to office facilities, staffing, training availability, and equipment. Staff attributes refer to clinical orientation, growth, efficacy, influence, and adaptability. Organizational climate refers to the organization's mission, cohesiveness, autonomy,

communication, stress, and openness to change. High coefficient alphas and principal component analyses support the four factors (Lehmen, Greener, & Simpson, 2002).

Evidence-Based Practice Attitude Scale (EBPAS; Aarons, 2005). The EBPAS is a 15-item self-report measure assessing participants' attitudes towards the adoption and implementation of ESTs (see Appendix A). The EBPAS consists of four subscales: appeal, requirements, openness, and divergence (Aarons, 2005). Appeal (Cronbach's α = .80) refers to the extent to which a therapist would adopt a new practice if it was intuitively appealing. Requirements (Cronbach's α = .90) refers to the extent to which a therapist would adopt a new practice if it was mandated. Openness (Cronbach's α = .78) is the extent to which a therapist is generally open to trying new interventions. Divergence (Cronbach's α = .59) is the extent to which a therapist perceives research-based treatments as lacking clinical utility (Aarons, 2004). Dr. Aarons granted permission for this measure to be used in the Beidas et al. (2012) study (personal communication, May 7th, 2007).

Consultation Feedback Form (CFF; Stirman, Buchhofer, McLaulin, Evans, & Beck, 2009). The CFF (see Appendix A) is a 9-item questionnaire similar to the Beck Initiative Practicum Feedback Form (Stirman et al., 2009) with slight wording changes and the addition of two questions pertaining to the use of technology during consultation. This questionnaire uses a combination of 7-point Likert scales and forced choice questions to assess the perceived quality of consultation received, comfort in applying CBT with anxious youth following consultation, comfort in applying what was discussed in consultation to client sessions, satisfaction with consultation session structure, and experience with using technology during consultation calls. For the current study, the

summed ratings of perceived overall quality of calls and rating of the call structure was used as an index of satisfaction. Internal consistency analysis across all continuous items yielded a Cronbach's α of .60.

Knowledge Test (Beidas et al., 2009). This 20-item test measures knowledge of CBT for child anxiety (see Appendix A). The test was developed and used in CBT training (e.g., Walkup et al., 2008). Three versions of the knowledge test were created to allow for repeated measures with minimal practice effects. Psychometric properties were examined for the Beidas et al. (2012) study via repeated assessment with 10 second-year graduate students. Analysis indicated a Cronbach's α of .76 and Spearman Brown split-half reliability of .69. Retest reliability was .86. Students trained in CBT for youth anxiety (M = 19.33, SD = .58) scored higher than untrained students (M = 13.71, SD = 2.75), (F (1, 9) = 11.51, p = .01), supporting the measure's validity.

Provider Efficacy Questionnaire (PEQ; Ozer et al., 2004). Adapted from Ozer et al. (2004), this 9-item questionnaire (see Appendix A) measures clinicians' confidence in their ability to deliver core clinical competencies of CBT for youth anxiety on 11-point Likert scales ranging from 0 (*not at all confident*) to 10 (*extremely confident*). For the present study, scores were summed across all items to create a total score. Analyses of internal consistency yielded a Cronbach's α of .93.

Adherence and Skill Checklist (ASCL; Beidas et al., 2009). This coding instrument measures both adherence to the content of CBT for child anxiety and skill in treatment delivery (see Appendix A). Adherence, which refers to the use of the procedures of a treatment protocol with a client (Perepletchikova & Kazdin, 2005), was assessed by coding the presence or absence of six core CBT competencies in treating

child anxiety: (1) identification of somatic symptoms, (2) identification of anxious cognitions, (3) relaxation, (4) coping thoughts, (5) problem-solving, and (6) positive reinforcement. Additional components, which were desirable but not considered essential, were coded, including: (1) asking for subjective units of distress (SUDS) ratings, (2) using cognitive restructuring, (3) engaging in imaginal exposure, and (4) being a coping model. Skill, which refers to the level of competence demonstrated by the clinician when delivering treatment (Perepletchikova & Kazdin, 2005), was assessed via a 7-point Likert scale ranging from 1 (*not well*) to 7 (*very well*).

The ASCL measured adherence and skill demonstrated in 8-minute performance-based role-plays (PBRPs), which involved clinicians preparing an anxious child (played by a trained undergraduate) for an exposure task. Coders (one doctoral level psychology graduate student, two post-undergraduate research assistants, and one honors undergraduate research assistant) were blind to condition and time-point of the assessment. Inter-rater reliability for the total adherence score was strong with an ICC of .98. Each individual item had a kappa coefficient of .75 or higher. Experienced CBT therapists reviewed the ASCL and rated it as accurately capturing the components of CBT for youth anxiety.

Consultation Coding and Rating System (CCRS). The CCRS, adapted from a similar measure (Pimentel, Hoagwood, Albano, & Regan, 2012), measures the content covered and consultative methods employed in consultation (see Appendix B). The CCRS includes minute-to-minute frequency counts of content and methods as well as summary ratings of content and methods using 7-point Likert scales ranging from 0 (*no discussion/use*) to 6 (*extensive discussion/use*). The content areas measured include

components of CBT for anxiety, case identification/appropriateness, how to appropriately adapt treatment, and barriers of implementation. The methods measured include didactic methods (i.e., instructing, informing) and active methods (i.e., skill rehearsal/role-play). Clinician involvement is assessed using a 7-point Likert scale from 0 (*uninvolved*) to 6 (*extensively involved*) based on how much clinicians spoke and whether or not they participated in role-plays.

To evaluate its validity, three licensed psychologists experienced in providing consultation and/or supervision reviewed the CCRS and rated on 7-point Likert scales from 0 (*strongly disagree*) to 6 (*strongly agree*) whether it (1) covered all it should (M = 5.67, SD = 0.47), (2) allowed for sufficient variability (M = 5.67, SD =0.47), (3) accurately reflected consultation content (M = 5.33, SD = 0.47), and (4) accurately reflected consultation techniques (M = 6, SD = 0).

Coders were three doctoral psychology graduate students (one of whom is the investigator) and one post-undergraduate psychology research assistant trained through didactics and supervised practice with feedback. The investigator explained the coding scheme in detail to the raters and provided examples of the various ratings using illustrations from calls. Following the initial training and introduction to the procedures, the training group met four times to discuss practice codes. Interrater reliability for the CCRS ratings was established between the primary investigator and the three independent coders prior to initiating the official coding of calls. Coders were blind to the skill and adherence data of clinicians. All independent observers met an ICC or kappa coefficient criterion of $\geq$.70 at the outset of the study on a sample of 12 calls for variables pertinent to the current study, which indicates substantial inter-rater reliability (Landis &

Koch, 1977). ICC interrater reliability was used for continuous variables whereas kappa coefficients were used for categorical variables. The ICC reliability score for the variable of interest was .92 for individual clinician involvement. The mean kappa coefficients for variables of interest were .98 for therapist-led role-plays, .98 for consultant-led role-plays, and .83 for didactics. A random reliability check was implemented during the coding phase such that the investigator's calls randomly overlapped with 10 calls of each of the other coders. Analyses revealed that reliability on constructs of interest was maintained.

Identification and Treatment of Anxious Youth – Revised (ITAY-R). The ITAY-R, which is based on the ITAY (Benjamin, Beidas, Edmunds, Cohen, & Kendall, 2010), assesses primary treatment setting, rates of treatment use since ending consultation, types of treatment modalities used, barriers of treatment use, and facilitators of treatment use (see Appendix B). The measure involves a combination of 7-point Likert scales, close-ended questions, and open-ended questions. The investigator and one post-undergraduate research assistant served as interviewers. The research assistant observed the investigator complete an interview before completing her own. The investigator shadowed the research assistant during her first interview. All interviews were audio-taped.

Procedure

Before describing the procedures of the current study, a brief description of the original study is provided. For further details, please see Beidas et al. (2012). Community clinicians signed up for one of six training dates, each of which was randomly assigned to one of three training conditions. At pre-training, consent was obtained from all

participants, and participants completed a pre-training assessment to evaluate their knowledge of CBT for youth anxiety, demographics, attitudes toward EBPs, and organizational characteristics. Participants also completed the PBRP via telephone, which required them to prepare a standardized, anxious youth (played by a trained undergraduate) for an exposure task. PBRPs were digitally recorded and later independently coded for adherence and skill by reliable raters.

Following completion of pre-training measures, participants participated in one of three training conditions. The Routine Training condition involved a 6-hour didactic workshop that covered the *Coping Cat* (Kendall & Hedtke, 2006) treatment session-by-session. The Computer Training condition involved a 6-hour session of self-guided study using CBT4CBT (Computer-based training to be a cognitive-behavioral therapist; Kendall & Khanna, 2008). The Augmented Training condition involved a 6-hour workshop that focused on CBT core competencies and utilized behavioral rehearsal techniques. Following training, CBT knowledge, attitudes toward EBPs, and satisfaction with training was assessed. Clinicians also completed the PBRP.

Clinicians then participated in weekly consultation calls for three months. Consultation was conducted via the WebEx virtual conferencing platform by an advanced doctoral student under the supervision of an expert in CBT (PCK) for child anxiety. Participants were given the option to call in via telephone or computer. Those who called in via computer were able to view the consultant as well as a whiteboard of notes. A 12-week consultation curriculum was designed with participant input. Consultation calls involved the elaboration of didactic topics and were designed to address clinician questions and discuss implementation of the treatment with specific clients. In addition to

case discussion and didactics, the consultant offered opportunities to engage in role-plays in order for participants to practice problem-solving, cognitive restructuring, and preparing youth for an exposure task. A total of 108 consultations were completed, with the average length of the calls equaling 52.95 minutes (*SD* = 10.60; range = 22-65 minutes). On average, 7.83 participants attended each call (*SD* = 4.52; range = 1-20 participants). The average number of cases discussed per call was 2.69 (*SD* = 1.90; range = 0-7 cases). The intent-to-treat sample attended an average of 7.15 consultation calls (*SD* = 3.17; range = 0-10). Eighty-six participants (75%) completed 8 or more consultations, which was requested of them at the outset of the study. A majority of the consultation calls (*N* = 104; 96%) were digitally recorded. Following consultation, CBT knowledge, attitudes toward EBPs, and satisfaction with consultation was assessed. Clinicians also completed the PBRP.

For the present study, the 104 consultation calls that had complete digital recordings were randomly divided among four coders. Coders completed the CCRS for each assigned call. The mean frequency counts and Likert ratings of the 104 digitally-recorded calls were entered for the four calls that had not been recorded.

All participants of the original training study, regardless of whether he/she completed the study or participated in consultation calls, were re-contacted and invited to participate in a follow-up interview via an electronic newsletter. After obtaining consent, participants completed the ITAY-R via telephone. Additionally, each participant completed the EBPAS and one randomly assigned version of the knowledge test. Participants received a $10 gift card for participation.

Data Analysis

Power analysis

Given that the current study used previously collected data, a sensitivity analysis was conducted using G*Power 3.1 (Faul, Erdfelder, Buchner, & Lang, 2009) to determine the effect size that could be detected with the study's sample size and the number of predictors included in a linear multiple regression analysis. With the sample size of 99, two controlling variables (number of consultation calls attended and skill/adherence level at post-training), and two predictor variables (proportion of time dedicated to active learning techniques and proportion of time dedicated to didactics), the study was powered to detect a medium effect ($f^2 = 0.20$).

Data Analytic Plan

Multiple regression analyses examined the relation between the proportion of time dedicated to active learning (i.e., role-plays) and outcomes of interest. Analyses controlled for the number of consultation calls attended given that this variable was significantly associated with outcome in Beidas et al. (2012). Analyses also controlled for therapists' post-training scores on outcomes of interest (e.g., post-training adherence and skill scores) if they had been collected. In addition to examining the proportion of time dedicated to active learning techniques, the last step of each analysis included the proportion of time dedicated to didactics.

With regard to statistical assumptions for primary analyses, post-consultation skill and consultation satisfaction failed to meet the Shapiro-Wilkes test ($p < .05$) of normality. A squared transformation ameliorated this for skill and analyses pertaining to post-consultation skill used transformed data. Non-transformed data were used for

consultation satisfaction. Diagnostics comparing variance inflation factors (VIFs) revealed all VIFs under the recommended threshold of ten (Hocking, 2003), indicating no issues of multicollinearity.

To investigate training-to-criterion, separate logistic regression analyses examined the relation between proportion of time dedicated to active learning techniques and training-to-criterion for adherence and skill, while controlling for number of consultation calls attended and post-training scores for adherence and skill. Although an 80% cutoff score for adherence is typically used when evaluating clinicians in randomized controlled trials (e.g., Walkup et al., 2008), a 70% cutoff score (4.2 out of 6) was adopted to allow greater flexibility for community clinicians. A cutoff score of 3.5 out of 7 (50%), which is consistent with previous trials of CBT (e.g., Carroll et al., 2000; Sholomskas et al., 2005), categorized clinicians who exhibited acceptable levels of skill.

Results

Descriptive Analyses

The average number of role-plays completed by therapists as either the therapist or the child across all calls they attended was .66 (*SD* = .82, range = 0-3). The average number of times therapists participated in a role-play in the role of therapist was only .29 (*SD* = .50, range = 0-2). With regard to frequency counts, 2% of clinicians participated in two role-plays as the therapist, 25% participated in one role-play as the therapist, and 72% participated in no role-plays as a therapist. Table 2 shows the average amount of minutes and proportions of time per consultation call spent discussing each content area and utilizing each consultation method across participants as coded by the CCRS. Table 3 shows the average summary ratings per call across participants as yielded from the

CCRS. Table 4 provides means and standard deviations for information pertaining to caseloads and treatment of anxious youth as collected by the ITAY-R at the 2-year follow-up. Table 5 displays the correlations between study measures that were included in the primary analyses.

Primary Analyses

Adherence. Multiple regression analyses indicated no significant relation between the proportion of time dedicated to active learning and post-consultation adherence scores. The only significant predictor in each of the models was the clinician's post-training adherence score (see Table 6), indicating that higher adherence scores at post-training predicted higher adherence scores at post-consultation. The proportion of time dedicated to didactics was also not a significant predictor and adding this variable to the model did not change the relation between proportion of time dedicated to active learning and post-consultation adherence.

With regard to training-to-criterion, logistic regression analyses similarly indicated no significant relation between the proportion of time dedicated to active learning and achieving the 70% adherence threshold. The only significant predictor of training-to-criterion was therapists' post-training adherence score (see Table 7), indicating that higher adherences scores at post-training predicted a greater likelihood of achieving the 70% adherence threshold at post-consultation.

Skill. Multiple regression analyses indicated no significant relation between the proportion of time dedicated to active learning and post-consultation skill scores. The only significant predictor in each of the models was the clinician's post-training skill score (see Table 8), indicating that higher skill scores at post-training predicted higher

skill scores at post-consultation. The ratio of time dedicated to didactics was also not a significant predictor and adding this variable to the model did not change the relation between proportion of time dedicated to active learning and post-consultation skill.

With regard to training-to-criterion, logistic regression analyses similarly indicated no significant relation between the proportion of time dedicated to active learning and achieving the skill threshold. The only significant predictor of training-to-criterion was therapists' post-training adherence score (see Table 9), indicating that higher skill scores at post-training predicted a greater likelihood of achieving the skill threshold at post-consultation.

Self-Efficacy. Multiple regression analyses indicated no significant relation between any predictors (i.e., consultation call attendance, proportion of time dedicated to active learning, and proportion of time dedicated to didactics) and post-consultation self-efficacy scores (all $\beta < .25$, all $p > .05$).

Satisfaction. Multiple regression analyses indicated no significant relation between proportion of time dedicated to active learning and consultation satisfaction. The only significant predictor in each of the models was the number of consultation calls attended (see Table 10), indicating that increased attendance predicted higher satisfaction ratings. The proportion of time dedicated to didactics was also not a significant predictor and adding this variable to the model did not change the relation between proportion of time dedicated to active learning and satisfaction.

Additional Analyses

Clinician Involvement. Multiple regression analyses were conducted to examine whether level of clinician involvement on the calls moderated the relation between the

proportion of time spent on active learning and outcomes. Analyses controlled for the number of consultation calls attended as well as therapists' post-training scores on outcomes of interest if they had been collected.

Adherence. Multiple regression analyses indicated no significant relation between clinician involvement and post-consultation adherence scores (see Table 11). In the final model, neither clinician involvement nor the proportion of time dedicated to active learning were significant predictors of post-consultation adherence scores, and there was no significant interaction between clinician involvement and the proportion of time dedicated to active learning.

Skill. Though initially non-significant when first entered into the regression (see Table 12), clinician involvement was significant in the final regression. However, this was limited by a significant clinician involvement by active learning interaction. This interaction indicates that level of involvement moderated the effect of active learning on post-consultation skill such that as the level of clinician involvement increased, the effect of active learning on skill increased.

Self-Efficacy. Multiple regression analyses indicated no significant relation between clinician involvement and post-consultation self-efficacy as well as no moderating effect of clinician involvement on the relation between active learning and self-efficacy scores (all $\beta < -.25$, all $p > .05$).

Satisfaction. Multiple regression analyses indicated no significant relation between clinician involvement and consultation satisfaction (see Table 13). In the final model, neither clinician involvement nor the proportion of time dedicated to active learning were significant predictors of satisfaction, and there was no significant

interaction between clinician involvement and the proportion of the time dedicated to active learning.

Implementation. Implementation rates were gathered from therapists who participated in the 2-year follow-up study. Although 50 therapists completed the follow-up interview, only 39 reported providing therapy to anxious youth clients in the prior year. Analyses included only the 37 of these participants who attended at least one consultation call. Implementation was categorized in two ways. First, therapists were asked whether they implemented CBT elements with their anxious youth clients and, if so, with what percentage of clients. Secondly, they were asked if they implemented the *Coping Cat* program, specifically, with their anxious youth clients and, if so, with what percentage of clients.

Multiple regression analyses were conducted to examine the relation between proportion of time dedicated to active learning techniques and implementation of CBT elements, while controlling for number of consultation calls attended. Results indicated no significant relation between any predictors (i.e., consultation call attendance, proportion of time dedicated to active learning, and proportion of time dedicated to didactics) and post-consultation implementation of CBT elements (all $\beta < -.24$, all $p > .05$). Additional regression analyses indicated no significant relation between clinician involvement and implementation of CBT elements and no moderating effect of clinician involvement on the relation between active learning and implementation rates (all $\beta < -.17$, all $p > .05$).

Multiple regression analyses were also conducted to examine the relation between proportion of time dedicated to active learning techniques and implementation of the

Coping Cat. While controlling for number of consultation calls attended, proportion of time dedicated to active learning negatively predicted implementation of the *Coping Cat* ($\beta = -.33$, $p < .05$). This was no longer significant when proportion of time dedicated to didactics was added to the model (see Table 14). Additional regression analyses indicated no relation between clinician involvement and implementation of the *Coping Cat.* However, in this model, number of consultation calls attended served as a negative predictor of implementation (see Table 15). In the final model, this was no longer significant, and there was no moderating effect of clinician involvement on the relation between active learning and implementation of the *Coping Cat*.

Exploratory Analyses

Predictors of Implementation at 2-Year Follow-Up. Multiple regression analyses examined potential predictors of implementation rates for individuals who completed the 2-year follow-up study. The analyses included the therapists who reported providing therapy to anxious youth in the previous year and was not limited to therapists who had participated in consultation calls, yielding a total of 39 participants. Separate multiple regressions analyses, each controlling for number of consultation calls attended, examined whether the following variables predicted implementation rates of CBT elements and the *Coping Cat*: post-consultation adherence score, post-consultation skill score, post-consultation self-efficacy score, satisfaction with consultation, post-consultation EBPAS scale scores, 2-year follow-up EBPAS scale scores, post-consultation knowledge score, and 2-year follow-up knowledge score. None of these variables was significantly associated with implementation rates with the exception of the post-consultation EBPAS Divergence score and the 2-year follow-up EBPAS Openness

score. Post-consultation EBPAS Divergence subscale scores significantly negatively predicted implementation of CBT elements (see Table 16), indicating that as the belief in the lack of clinical utility of research-based practices increased, clinicians were less likely to implement CBT elements with their clients. EBPAS Openness subscale score collected at 2-year follow-up positively predicted implementation of CBT elements (Table 16), indicating that a greater openness to trying EBPs was associated with increased implementation rates of CBT elements.

Maintenance and Predictors of Knowledge and Attitudes at 2-Year Follow-Up. A series of paired-samples *t*-tests were conducted to examine whether knowledge and EBPAS scores differed between post-consultation and 2-year follow-up (see Table 17). These tests indicated a significant decline in CBT knowledge scores from post-consultation to 2-year follow-up. With regard to therapist attitudes, the EBPAS Openness scale evidenced a significant decline from post-consultation to 2-year follow-up. The EBPAS total score as well as the Requirements, Appeal, and Divergence scale scores did not significantly differ between post-consultation to 2-year follow-up, indicating stability in these attitudes.

Multiple regression analyses examined whether consultation call attendance predicted 2-year follow-up knowledge scores, controlling for post-consultation knowledge score (see Table 18). Number of consultation calls attended was found to significantly predict knowledge scores at 2-year follow-up. The proportion of time dedicated to active learning and didactics did not serve as significant predictors and did not affect the relation between consultation call attendance and follow-up knowledge score.

Multiple regression analyses examined whether consultation call attendance predicted EBPAS scores at 2-year follow-up, controlling for the EBPAS scores at post-consultation (see Table 19). Consultation call attendance served as a significant predictor of EBPAS total scores, indicating that an increase in consultation call attendance was associated with an increase in positive attitudes toward EBPs. Consultation call attendance also served as a significant predictor for the EBPAS Appeal scores, indicating that an increase in attendance was associated with increased attitudes regarding the appeal of EBPs. Lastly, consultation call attendance was a significant predictor of the EBPAS Divergence scale scores, indicating that an increase in consultation call attendance was associated with a decrease in beliefs that EBPs lack clinical utility.

Discussion

The present study is one of the first to closely examine the components of consultation provided to community therapists following workshop training and to evaluate the relation between consultation techniques and training outcomes. Based on Kolb's (1984) theory of experiential learning, it was hypothesized that the presence of active learning techniques (i.e., role-plays) in consultation would positively predict therapist outcomes. Furthermore, it was hypothesized that active learning techniques would yield stronger effects on outcomes than didactic learning techniques. Contrary to these hypotheses, no significant relation was found between either active or passive learning techniques and therapist adherence, skill, self-efficacy, and satisfaction. However, findings point to the importance of clinician involvement as a moderator of the relation between active learning and skill. The present study also identified consultation

call attendance as a predictor of CBT knowledge and positive attitudes toward EBPs assessed two years following consultation.

The null findings pertaining to primary hypotheses call into question the importance of including active learning strategies in training and consultation efforts. Potential explanations for these null findings are described below in order to guide future research in this area. First, perhaps the overall amount of time spent in consultation, regardless of the specific techniques used, is what accounts for the positive effects of ongoing support. Second, perhaps a certain threshold of active learning must be achieved in order for it to result in improved outcomes. For example, role-plays may have elicited anxiety in the therapists. They may not have spent enough time participating in role-plays to achieve habituation, which may have negatively impacted their ability to benefit from such role-plays. Alternatively, it may be that a mix of techniques is optimal for improving outcomes rather than active learning techniques alone. Advocates of blended learning (e.g., Heinze & Procter, 2006) suggest the importance of a blended learning environment, defined as "a learning facilitation that incorporates different modes of delivery, models of teaching, and learning styles, introduces multiple media to the dialog between the learner and the facilitator" (p. 235). The null findings of the present study may also be reflective of the varied learning styles of clinicians. Although Kolb's (1984) theory refers to stages of learning, it can also be interpreted to suggest that individuals vary with regard to their preferred learning styles, defined as "generalized differences in learning orientation based on the degree to which people emphasize the four modes of the learning process" (Kolb 1984, 67) and as "the complex manner in which, and conditions under which, learners most efficiently and most effectively perceive, process, store, and recall what they are

attempting to learn" (James & Gardner, 1995, p. 20). It may be erroneous to examine the main effects of active versus didactic learning techniques across all participants given potential variability in learning style. Consideration of learning style is in accord with a systems-contextual framework (Beidas & Kendall, 2010; Sanders et al., 2002), which asserts that trainees are embedded within various contexts. Learning style may have been a moderator of outcomes in the present study but was not examined because it had not been assessed.

The main moderator of interest examined in the present study was clinician involvement, which was assessed based on the amount of time a clinician spoke and whether or not s/he participated in a role-play as a child or therapist. The group format of the consultation calls allowed for variability in the amount of involvement of each call participant. Whereas some clinicians actively participated in case discussion, didactic discussion, and role-plays, others attended calls but did not speak beyond initial greetings. Although clinician involvement did not appear to moderate the relation between the proportion of time dedicated to active learning and post-consultation adherence, self-efficacy, and satisfaction, it did moderate the relation between the proportion of time dedicated to active learning and post-consultation skill. Specifically, as clinician involvement increased, the effect of time dedicated to active learning on post-consultation skill increased. These findings suggest that in addition to being exposed to active learning, it is important to encourage therapists to fully engage in active learning. Although Bandura (1977) suggests the potency of learning through the modeling of others, the present study suggests that participating in discussion and role-plays is more beneficial than observing them. This has important implications for future training

endeavors, particularly those that incorporate group consultation formats. Consultants are encouraged to monitor the involvement of participants and provide multiple opportunities for each participant to actively engage in discussion and behavioral rehearsal.

In addition to attempting to identify effective components of consultation, the present study provided a follow-up of therapists who participated in the training study to identify the effects of training and consultation two years later. With regard to implementation rates, implementation rates of CBT elements were generally high among participants at the 2-year follow-up. Seventy-two percent of therapists reported implementing CBT elements with 100% of their anxious youth clients. Only 5% of therapists reported not using CBT with their clients. Implementation rates of *Coping Cat* were lower with only 10% of therapists implementing it with all anxious youth clients and 39% not implementing it with any anxious youth clients. These findings imply that therapists prefer providing principle-based CBT rather than adhering to a specific manual or formal CBT program. Given that implementation rates were based on recall of the therapists and not gathered from record review, it is possible that therapists overestimated their use of CBT with their clients, especially given prior research showing poor concordance rates between therapist self-report and objective ratings of techniques delivered during sessions (Hurlbut, Garland, Nguyen, & Brookman-Frazee, 2010). Contrary to hypotheses, no relation was found between consultation call attendance and implementation of CBT or *Coping Cat* with anxious youth clients. Additionally, a higher proportion of time dedicated to active learning did not predict implementation of CBT elements. Unexpectedly, the proportion of time dedicated to active learning predicted decreased implementation of the *Coping Cat*, which may suggest that role-plays

contributed to discomfort with use of the formal program. However, this relation did not remain significant when controlling for the proportion of time dedicated to didactics.

Other important findings emerged regarding implementation rates. Specifically, therapists' beliefs at post-consultation that researched-based practices lack clinical utility predicted lower implementation rates of CBT elements with anxious youth clients two years later. Given this finding, it is recommended that trainers and consultants assess and address this belief in order to promote the use of EBPs with clients. Consultants can seek to evaluate what doubts therapists have regarding the usefulness of EBPs and work to correct any erroneous beliefs and/or problem-solve how to adapt EBPs to best fit the needs of the therapists' clients. Additionally, openness to EBPs at the 2-year follow-up also predicted implementation of CBT elements with anxious youth clients. It is difficult to ascertain directionality given that openness was assessed at the same time as implementation rates. Nevertheless, it is reasonable and possible that openness to EBPs contributed to greater use of CBT. It may also be the case that implementation of CBT increased therapists' openness to EBPs, assuming they had positive experiences with it. Given its relation to implementation, it is recommended that trainers and consultants also assess therapists' openness to treatments and respond to any specific reservations therapists may have regarding EBPs.

Examinations of CBT knowledge and attitudes towards EBPs at a 2-year follow-up indicated maintenance of overall attitudes toward EBPs, willingness to implement EBPs if mandated, views regarding the appeal of EBPs, and beliefs regarding the clinical utility of EBPs. CBT knowledge and openness to implementing EBPs declined from post-consultation to 2-year follow-up suggesting that ongoing support may be needed in

order to maintain these. Additional analyses provided further support for the importance of providing consultation following initial training. Number of consultation calls attended was a predictor of higher follow-up knowledge scores, stronger views regarding the appeal of EBPs, and stronger overall positive beliefs toward EBPs. Number of consultation calls attended was also a predictor of stronger beliefs in the clinical utility of EBPs. What is interesting about these findings is that they controlled for therapists' knowledge and attitudes at post-consultation, meaning that number of consultation calls attended predicted CBT knowledge and attitudes toward EBPs two years after consultation had ended regardless of where knowledge and attitudes stood immediately following consultation. Thus, the effects of consultation lasted beyond the provision of consultation. Consultation may lay a foundation on which to build even after it has ended.

The limitations of the present study merit consideration. Limitations included lack of experimental manipulation of consultation call techniques and random allocation of techniques to therapists, lack of objective data regarding implementation rates and client outcomes, failure to examine the learning styles of therapists, and limited variability in the amount of time dedicated to active learning techniques. Additionally, the present study did not reexamine CBT skill and adherence at the 2-year follow-up, and thus, the long-term maintenance of skill and adherence remains unclear.

The present study lays the groundwork for future dissemination and implementation research in the area of training and consultation. Future work would benefit from addressing the limitations of the present study. In order to further elucidate the effects of consultation, future work should objectively assess therapist and client outcomes during and following consultation. In order to identify which training and

consultation techniques work best for whom, by whom, under which circumstances, future work would benefit from adopting a systems-contextual framework (Beidas & Kendall, 2010) and examining contextual factors (e.g., learning styles). Comparative studies that involve random allocation of techniques to therapists would allow us to identify the differential effectiveness of various consultation techniques (e.g., role-plays versus modeling). Heeding these recommendations will assist in closing the research-practice chasm and improving mental health care for those in need.

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Table 1

Demographic Data

Variable	Overall Sample (N=115)	Coding Sample (N=99)	2-Year Follow-Up Sample (N=50)
	n(%)	n(%)	n(%)
Sex			
Male	11(9.6%)	8(8.1%)	4(8%)
Female	104 (90.4%)	91(91.9%)	46(92%)
Race			
Caucasian	77(67%)	69(69.7%)	37(74%)
African American	15(13%)	13(13.1%)	4(8%)
Hispanic/Latino	6(5.2%)	2(2%)	0
Asian	5(4.3%)	5(5.1%)	4(8%)
Native American/Alaskan	1(.9%)	1(1%)	0
Other	6(5.2%)	4(4%)	2(4%)
Missing	5(4.3%)	5(5.1%)	3(6%)
Educational Status			
Enrolled in graduate school	18(15.7)	18(18.2%)	9(18%)
Master's degree	72(62.6%)	59(59.6%)	32(64%)
Doctor of philosophy	6(5.2%)	4(4%)	3(6%)
Doctor of psychology	5(4.3%)	5(5.1%)	2(4%)
Doctor of education	2(1.7%)	2(2%)	2(4%)
Medical doctor	6(5.2%)	5(5.1%)	1(2%)
Other degree	6(5.2%)	6(6.1%)	1(2%)
State Licensed	33(28.7%)	28(28.3%)	15(30%)
Previously treated anxious youth	58(50.4%)	49(49.5%)	29(58%)
	M(SD)	M(SD)	M(SD)
Age	35.93(11.36)	35.56(11.63)	35.09(10.85)
Months of clinical experience	65.46(82.38)	65.12(86.18)	69.59(86.85)
Identification with CBT	4.86(1.68)	4.96(1.69)	4.77(2.02)
Caseload	19.48(23.72)	18.44(23.27)	18.65(18.15)
Supervision per week	1.57(2.66)	1.65(2.81)	1.29(1.33)
Hour attendance at workshops	28.83(76.18)	29.43(81.38)	15.97(19.54)
Previous cases treated with CC	.11(.43)	.12(.46)	.08(.35)
Previous supervision on CBT	0	0	0

Note. CBT = cognitive-behavioral therapy. CC = *Coping Cat*.

Table 2

CCRS Mean Minutes and Ratios of Calls Dedicated to Content Areas and Methods Per Call Across Participants

Item	Minutes		Ratios	
	M (SD)	*Range*	*M (SD)*	*Range*
Content				
CBT model	.71 (1.19)	0-5	.01 (.02)	0-.08
Identifying somatic thoughts/arousal	9.34 (6.77)	0-27	.16 (.11)	0-.46
Relaxation	5.68 (4.20)	0-22	.10 (.07)	0-.35
Coping thoughts	6.81 (4.94)	0-25	.12 (.09)	0-.42
Problem-solving	3.88 (5.33)	0-30	.07 (.09)	0-.49
Exposure	15.01 (9.61)	0-42	.29 (.21)	0-1
Homework	2.96 (2.90)	0-14	.05 (.05)	0-.24
Positive reinforcement.	5.16 (4.07)	0-22	.09 (.07)	0-.37
Case Review	24.75 (12.30)	0-55	.43 (.20)	0-.87
Case appropriateness.	4.16 (4.26)	0-19	.07 (.07)	0-.34
Organizational Systems	2.92 (2.63)	0-12	.05 (.05)	0-.23
Flexibility	12.25 (9.30)	0-32	.23 (.20)	0-1
Barriers	1.63 (2.39)	0-10	.03 (.04)	0-.19
Technical issues	6.76 (3.67)	0-21	.12 (.06)	0-.37
Active Methods				
Therapist-led role-play	1.46 (4.01)	0-24	.03 (.07)	0-.44
Consultant-led role-play	2.28 (4.21)	0-16	.04 (.08)	0-.50
Total role-plays	3.75 (6.23)	0-34	.07 (.11)	0-.56
Modeling	5.85 (3.36)	0-16	.11 (.06)	0-.29
Passive Methods				
Informing	27.56 (9.32)	3-51	.51 (.19)	.13-1
Didactic	10.63 (8.83)	0-37	.22 (.22)	0-1
Mixed/Other Methods				
Case discussion of therapist example	36.31 (16.06)	0-63	.63 (.26)	0-.98
Case discussion of consultant example	4.88 (4.21)	0-21	.09 (.09)	0-.57
Feedback/Suggestions	28.11 (10.44)	0-51	.49 (.16)	0-.82
Prompts/Probes/Questions	24.02 (7.60)	4-49	.43 (.11)	.16-.78
General Praise Statements	11.82 (5.90)	0-28	.21 (.10)	0-.48
Supporting	6.00 (3.83)	0-18	.11 (.07)	0-.33
Call length	55.12 (9.11)	23-66	--	--

Note. CCRS = Consultation Coding and Rating System. CBT = cognitive-behavioral therapy.

Table 3

CCRS Mean Summary Ratings Per Call Across Participants

Item	*M (SD)*	*Range*
CBT model	.42 (.61)	0-2
CBT content	4.21 (.98)	2-6
Case review	3.53 (1.24)	0-6
Case discussion of therapist example	4.39 (1.51)	0-6
Case appropriateness	1.40 (1.03)	0-5
Flexibility	2.43 (1.34)	0-6
Barriers	.65 (.76)	0-2
Case discussion of a consultant example	1.82 (1.03)	0-5
Informing	4.33 (.87)	2-6
Didactics	2.42 (1.71)	0-6
Active learning methods	2.48 (1.15)	0-5
Active learning methods + case discussion	4.50 (1.15)	1-6
Supporting	3.24 (.79)	1-5
Overall clinician involvement	3.36 (.96)	1-6
Individual clinician involvement	2.02 (1.42)	0-6

Note. CCRS = Consultation Coding and Rating System. CBT = cognitive-behavioral therapy.

Table 4

ITAY-R Means and Standard Deviations

Item	M (SD)	Range
Average child/adolescent caseload per week	13.95 (15.65)	0-75
% of youth caseload involving 7-17 year old anxious youth	44.65 (31.65)	0-100
% of these anxious youth treated with CBT	88.72 (25.90)	5-100
Minimum number of CBT sessions	7.31 (7.67)	1-30
Maximum number of CBT sessions	24.86 (18.55)	4-80
Average/typical number of CBT sessions	15.68 (11.55)	2-40
% of these anxious youth treated with CC	27.56 (33.83)	0-100
Minimum number of CC sessions	5.73 (4.45)	1-16
Maximum number of CC sessions	14.04 (7.70)	1-30
Average/typical number of CBT sessions	9.96 (5.35)	1-18
% of CC cases who completed full program	32.12 (37.16)	0-100
% of anxious youth under age 7 treated with CBT	52.68 (44.66)	0-100
% of anxious adult clients treated with CBT [a]	84.08 (29.00)	20-100
Extent to which, on average, following components of CBT with anxious youth over the last year:[b]		
Identification and management of somatic arousal	5.03 (1.09)	2-6
Identification and cognitive restructuring of self-talk	4.54 (1.25)	2-6
Problem-solving anxiety-provoking situations	4.56 (1.41)	0-6
Conducting imaginal exposures	2.49 (1.30)	0-4
Conducting behavioral/in vivo exposures	3.03 (1.75)	0-6
Utilizing positive reinforcement	5.03 (1.35)	2-6

Note. ITAY-R = Identification and Treatment of Anxious Youth – Revised. Based on participants who reported treating anxious youth in the previous year. [a] Based on participants who reported treating anxious adults in the previous year. [b] Rated on 7-point Likert scale from (*not at all*) to 6 (*extensively*).

Table 5

Correlations Between Primary Study Variables

	Variable	1	2	3	4	5	6	7	8	9	10
1	Number of calls	-									
2	Post-training Adherence	.03	-								
3	Post-training Skill	.16	.82***	-							
4	Post-Consultation Adherence	.17	.46***	.50***	-						
5	Post-Consultation Skill[a]	.10	.45***	.47***	.83***	-					
6	Self-efficacy	-.03	.17	.26*	.05	.08	-				
7	Satisfaction	.28**	.08	.05	.10	.07	.22*	-			
8	Ratio of Role-plays	.12	.00	-.00	.05	.09	-.13	-.02	-		
9	Ratio of Didactics	.07	-.15	-.15	-.07	-.03	-.05	.14	.19	-	
10	Involvement	.01	.04	.17	-.03	.01	.13	.13	.08	-.29**	-

Note. [a] A squared transformation was used for post-consultation skill.
* $p < .05$. ** $p < .01$. *** $p < .001$.

Table 6

Multiple Regression Analyses Examining the Proportions of Time Dedicated to Active and Passive Learning Techniques During Consultation as Predictors of Treatment Adherence at Post-Consultation

	B	*SE B*	*β*	*p*
Step 1				
Constant	1.59	0.59		.01
Post-training adherence score	0.47	0.09	.45	.00
Number of consultation calls attended	0.11	0.06	.15	.09
Step 2				
Constant	1.52	0.62		.02
Post-training adherence score	0.48	0.09	.45	.00
Number of consultation calls attended	0.11	0.06	.15	.10
Ratio of time dedicated to role-plays	1.33	3.34	.04	.72
Step 3				
Constant	1.58	0.71		.03
Post-training adherence score	0.47	0.10	.45	.00
Number of consultation calls attended	0.11	0.06	.15	.10
Ratio of time dedicated to role-plays	1.44	3.42	.04	.70
Ratio of time dedicated to didactics	-0.33	1.88	-.02	.89

Note. Analysis includes those who participated in at least one consultation call and completed all study assessments, yielding 99 total participants. $R^2 = .23$ for Step 1 (*ps* < .001); $\Delta R^2 = .00$ for Step 2 (*ps* = .69); $\Delta R^2 = .00$ for Step 3 (*ps* = .86). * $p < .001$.

Table 7

Logistic Regression Analyses Examining the Proportions of Time Dedicated to Active and Passive Learning Techniques During Consultation as Predictors of Achieving Treatment Adherence Criterion at Post-Consultation

		95% CI for exp *b*			
	B (SE)	Lower	exp *b*	Upper	*p*
Included					
Constant	-2.22 (1.20)	--	0.11	--	.07
Post-training adherence score	0.63 (0.18)	1.31	1.87	2.66	.00
# of consultation calls attended	0.09 (0.10)	0.89	1.09	1.33	.39
Ratio of time dedicated to role-plays	0.80 (5.64)	0.00	2.23	140313.85	.89
Ratio of time dedicated to didactics	0.48 (3.16)	0.00	1.61	791.46	.88

Note. Analysis includes those who participated in at least one consultation call and completed all study assessments, yielding 99 total participants. R^2 = .14 (Cox & Snell), .20 (Nagelkerte). Model χ^2 (1) = 15.36, $p < .01$.

Table 8

Multiple Regression Analyses Examining the Proportions of Time Dedicated to Active and Passive Learning Techniques During Consultation as Predictors of Treatment Skill[a] *at Post-Consultation*

	B	*SE B*	*β*	*P*
Step 1				
Constant	8.29	4.71		.08
Post-training skill score	3.68	.73	.46	.00
Number of consultation calls attended	.12	.49	.02	.81
Step 2				
Constant	7.03	4.90		.15
Post-training skill score	3.69	.73	.47	.00
Number of consultation calls attended	.06	.50	.01	.90
Ratio of time dedicated to role-plays	24.01	25.68	.09	.35
Step 3				
Constant	6.37	5.61		.26
Post-training skill score	3.72	.74	.47	.00
Number of consultation calls attended	.05	.50	.01	.92
Ratio of time dedicated to role-plays	22.82	26.26	.08	.39
Ratio of time dedicated to didactics	3.57	14.46	.02	.81

Note. Analysis includes those who participated in at least one consultation call and completed all study assessments, yielding 99 total participants. [a] A squared transformation was used for post-consultation skill. $R^2 = .22$ for Step 1 (*ps* < .001); $\Delta R^2 = .01$ for Step 2 (*ps* = .35); $\Delta R^2 = .00$ for Step 3 (*ps* = .81).

Table 9

Logistic Regression Analyses Examining the Proportions of Time Dedicated to Active and Passive Learning Techniques During Consultation as Predictors of Achieving Treatment Skill Criterion at Post-Consultation

		95% CI for exp *b*			
	B (SE)	Lower	exp *b*	Upper	*p*
Included					
Constant	1.21 (1.96)		3.35		.54
Post-training skill score	0.76 (0.24)	1.34	2.14	3.42	.00
# of consultation calls attended	-0.25 (0.20)	0.53	0.78	1.15	.21
Ratio of time dedicated to role-plays	-6.34 (7.84)	0	0.00	8249.15	.42
Ratio of time dedicated to didactics	0.78 (4.66)	0	2.18	20075.25	.87

Note. Analysis includes those who participated in at least one consultation call and completed all study assessments, yielding 99 total participants. R^2 = .13 (Cox & Snell), .23 (Nagelkerte). Model χ^2 (1) = 13.95, $p < .01$.

Table 10

Multiple Regression Analyses Examining the Proportions of Time Dedicated to Active and Passive Learning Techniques During Consultation as Predictors of Consultation Satisfaction

	B	*SE B*	*β*	*p*
Step 1				
Constant	8.58	1.28		.00
Number of consultation calls attended	0.41	0.15	.28	.01
Step 2				
Constant	8.69	1.30		.00
Number of consultation calls attended	0.42	0.15	.29	.01
Ratio of time dedicated to role-plays	-2.45	4.91	-.05	.62
Step 3				
Constant	8.35	1.31		.00
Number of consultation calls attended	0.40	0.15	.27	.01
Ratio of time dedicated to role-plays	-5.58	5.38	-.12	.30
Ratio of time dedicated to didactics	3.71	2.66	.16	.17

Note. Analysis includes those who participated in at least one consultation call and completed the Consultation Feedback Form, yielding 91 total participants. $R^2 = .08$ for Step 1 (*ps* < .01); $\Delta R^2 = .00$ for Step 2 (*ps* = .61); $\Delta R^2 = .02$ for Step 3 (*ps* = .17).

Table 11

Multiple Regression Analyses Examining Clinician Involvement and the Proportion of Time Dedicated to Active Learning Techniques During Consultation as Predictors of Treatment Adherence at Post-Consultation

	B	*SE B*	*β*	*p*
Step 1				
Constant	1.59	0.59		.01
Post adherence score	0.47	0.09	.45	.00
Number of consultation calls attended	0.11	0.06	.15	.09
Step 2				
Constant	1.72	0.64		.01
Post adherence score	0.48	0.09	.46	.00
Number of consultation calls attended	0.11	0.06	.16	.09
Clinician involvement on call	-0.07	0.13	-.05	.60
Step 3				
Constant	1.58	0.70		.03
Post adherence score	0.47	0.10	.45	.00
Number of consultation calls attended	0.10	0.07	.14	.17
Clinician involvement on call	-0.01	0.23	-.01	.96
Ratio of time dedicated to role-plays	3.80	7.92	.10	.63
Involvement x ratio dedicated to role-plays	-.96	2.96	-.08	.75

Note. Analysis includes those who participated in at least one consultation call and completed all study assessments, yielding 99 total participants. $R^2 = .23$ for Step 1 (*ps* < .001); $\Delta R^2 = .00$ for Step 2 (*ps* = .60); $\Delta R^2 = .00$ for Step 3 (*ps* = .86).

Table 12

Multiple Regression Analyses Examining Clinician Involvement and the Proportion of Time Dedicated to Active Learning Techniques During Consultation as Predictors of Treatment Skill[a] *at Post-Consultation*

	B	*SE B*	*β*	*p*
Step 1				
Constant	8.29	4.71		.08
Post skill score	3.68	.73	.46	.00
Number of consultation calls attended	.12	.49	.02	.81
Step 2				
Constant	9.48	4.98		.06
Post skill score	3.77	.74	.48	.00
Number of consultation calls attended	.11	.49	.02	.83
Clinician involvement on call	-.76	1.01	-.07	.45
Step 3				
Constant	10.83	5.20		.04
Post skill score	4.16	.75	.53	.00
Number of consultation calls attended	.44	.53	.08	.41
Clinician involvement on call	-3.90	1.81	-.35	.03
Ratio of time dedicated to role-plays	-84.99	60.33	-.30	.16
Involvement x ratio dedicated to role-plays	45.90	22.67	.53	.046

Note. Analysis includes those who participated in at least one consultation call and completed all study assessments, yielding 99 total participants. [a] A squared transformation was used for post-consultation skill. $R^2 = .22$ for Step 1 (*ps* < .001); $\Delta R^2 = .01$ for Step 2 (*ps* = .40); $\Delta R^2 = .04$ for Step 3 (*ps* = .11).

Table 13

Multiple Regression Analyses Examining Clinician Involvement and the Proportion of Time Dedicated to Active Learning Techniques During Consultation as Predictors of Consultation Satisfaction

	B	*SE B*	*β*	*p*
Step 1				
Constant	8.58	1.28		.00
Number of consultation calls attended	0.41	0.15	.28	.007
Step 2				
Constant	8.39	1.29		.00
Number of consultation calls attended	0.39	0.15	.27	.01
Clinician involvement on call	0.17	0.18	.10	.35
Step 3				
Constant	8.41	1.54		.00
Number of consultation calls attended	0.40	0.15	.28	.01
Clinician involvement on call	0.20	0.40	.11	.62
Ratio of time dedicated to role-plays	-0.90	12.31	-.02	.94
Involvement x ratio dedicated to role-plays	-0.57	5.48	-.03	.92

Note. Analysis includes those who participated in at least one consultation call and completed the Consultation Feedback Form, yielding 91 total participants. $R^2 = .08$ for Step 1 (*ps* < .01); $\Delta R^2 = .01$ for Step 2 (*ps* = .35); $\Delta R^2 = .00$ for Step 3 (*ps* = .91).

Table 14

Multiple Regression Analyses Examining the Proportions of Time Dedicated to Active and Passive Learning Techniques During Consultation as Predictors of Implementation Rates of Coping Cat Two Years Following Consultation

	B	*SE B*	*β*	*p*
Step 1				
Constant	79.44	28.92		.01
Number of consultation calls attended	-6.02	3.30	-.29	.08
Step 2				
Constant	84.73	27.78		.004
Number of consultation calls attended	-4.02	3.31	-.20	.23
Ratio of time dedicated to role-plays	-335.08	162.70	-.33	.047
Step 3				
Constant	108.36	31.55		.002
Number of consultation calls attended	-4.38	3.26	-.21	.19
Ratio of time dedicated to role-plays	-224.25	176.23	-.22	.21
Ratio of time dedicated to didactics	-136.68	91.55	-.25	.15

Note. Analysis includes those who participated in the 2-year follow-up, attended at least one consultation call, and reported treating anxious youth clients in the previous year, yielding 37 total participants. $R^2 = .09$ for Step 1 (*ps* = .08); $\Delta R^2 = .10$ for Step 2 (*ps* < .05); $\Delta R^2 = .05$ for Step 3 (*ps* < .05).

Table 15

Multiple Regression Analyses Examining Clinician Involvement and the Proportion of Time Dedicated to Active Learning Techniques During Consultation as Predictors of Implementation Rates of Coping Cat Two Years Following Consultation

	B	*SE B*	*β*	*p*
Step 1				
Constant	79.44	28.92		.009
Number of consultation calls attended	-6.02	3.30	-.29	.08
Step 2				
Constant	77.09	28.93		.01
Number of consultation calls attended	-7.40	3.53	-.36	.04
Clinician involvement on call	6.148	5.70	-.19	.29
Step 3				
Constant	86.94	28.53		.005
Number of consultation calls attended	-4.22	3.95	-.21	.29
Clinician involvement on call	.23	11.61	.01	.98
Ratio of time dedicated to role-plays	-615.79	406.99	-.61	.14
Involvement x ratio dedicated to role-plays	111.26	160.03	.36	.49

Note. Analysis includes those who participated in the 2-year follow-up, attended at least one consultation call, and reported treating anxious youth clients in the previous year, yielding 37 total participants. $R^2 = .09$ for Step 1 (*ps* = .08); $\Delta R^2 = .03$ for Step 2 (*ps* = .12); $\Delta R^2 = .13$ for Step 3 (*ps* = .06).

Table 16

Multiple Regression Analyses Examining the Relation Between Attitudes and Implementation of CBT Elements with Anxious Youth at the 2-Year Follow-Up

	B	*SE B*	*ß*	*p*
Model 1[a]				
Constant	112.72	14.68		.00
Number of consultation calls attended	-1.42	1.60	-.14	.38
Post-Consultation EBPAS Divergence Score	-14.36	6.66	-.34	.04
Model 2[b]				
Constant	61.48	21.59		.08
Number of consultation calls attended	-1.69	1.58	-.17	.29
2-year follow-up EBPAS Openness Score	14.13	6.06	.36	.03

Note. EBPAS = Evidence-Based Practitioner Attitude Scale (Aarons, 2005). Analyses included those who completed 2-year follow-up and treated an anxious youth in the previous year, yielding 39 participants. [a]R^2 = .13 (*ps* = .08). [b]R^2 = .15 (*ps* = .05).

Table 17

Comparing Means Between Post-Consultation and 2-Year Follow-Up

Measure	Post-Consultation	2-Year Follow-Up	
	M (SD)	*M (SD)*	*p*
EBPAS Requirements Scale	2.66 (.98)	2.85 (1.04)	.26
EBPAS Appeal Scale	3.32 (.57)	3.21 (.61)	.30
EBPAS Openness Scale	3.21 (.51)	2.89 (.69)	.00
EBPAS Divergence Scale	0.83 (.58)	0.78 (.59)	.43
EBPAS Total	3.09 (.46)	3.04 (.53)	.54
Knowledge Test	17.86 (1.59)	16.20 (2.53)	.00

Note. EBPAS = Evidence-Based Practitioner Attitude Scale (Aarons, 2005). Analyses included those who participated in the 2-year follow-up, yielding 50 participants. * = $p <$ .001

Table 18

Multiple Regression Analyses Examining Consultation Call Attendance as a Predictor of Knowledge Scores at 2-Year Follow-Up

	B	*SE B*	*ß*	*p*
Step 1				
Constant	2.52	3.17		.43
Knowledge Test Score Post-Consultation	.78	.18	.54	.00
Step 2				
Constant	-2.11	3.13		.50
Knowledge Test Score Post-Consultation	.75	.16	.53	.00
Number of consultation calls attended	.59	.17	.39	.00
Step 3				
Constant	-2.15	3.23		.51
Knowledge Test Score Post-Consultation	.72	.16	.51	.00
Number of consultation calls attended	.68	.17	.45	.00
Ratio of time dedicated to role-plays	-14.74	7.70	-.24	.06
Ratio of time dedicated to didactics	4.02	4.63	.10	.39

Note. Analyses included those who participated in the 2-year follow-up, yielding 50 participants. $R^2 = .30$ for Step 1 (*ps* < .001); $\Delta R^2 = .15$ for Step 2 (*ps* < .01); $\Delta R^2 = .04$ for Step 3 (*ps* = .17).

Table 19

Multiple Regression Analyses Examining Consultation Call Attendance as a Predictor of EBPAS Scores at 2-Year Follow-Up

	B	*SE B*	*β*	*p*
EBPAS Requirements[1]				
Constant	1.43	.69		.00
EBPAS Requirements Post-Consultation	.32	.15	.30	.04
Number of consultation calls attended	.07	.06	.15	.28
EBPAS Appeal[2]				
Constant	1.51	.57		.01
EBPAS Appeal Post-Consultation	.30	.14	.29	.04
Number of consultation calls attended	.08	.04	.32	.02
EBPAS Openness[3]				
Constant	.40	.60		.50
EBPAS Openness Post-Consultation	.73	.16	.54	.00
Number of consultation calls attended	.02	.04	.06	.61
EBPAS Divergence[4]				
Constant	.72	.23		.003
EBPAS Divergence Post-Consultation	.73	.10	.72	.00
Number of consultation calls attended	-.07	.03	-.25	.01
EBPAS Total[5]				
Constant	.82	.51		.12
EBPAS Total Post-Consultation	.55	.14	.48	.00
Number of consultation calls attended	.06	.03	.27	.04

Note. EBPAS = Evidence-Based Practitioner Attitude Scale (Aarons, 2005). Analyses included those who participated in the 2-year follow-up, yielding 50 participants. [1]R^2 = .11 (*ps* = .07). [2]R^2 = .17 (*ps* < .05). [3]R^2 = .30 (*ps* < .001). [4]R^2 = .57 (*ps* < .001). [5]R^2 = .29 (*ps* < .001).

CHAPTER 2

LITERATURE REVIEW

Dissemination and Implementation of Evidence-Based Practices: The Role of Ongoing Support in Clinician Training

Mental health problems constitute a major public health concern warranting attention. Mental health problems contribute to impaired functioning and are the second leading cause of disability, accounting for more than 15% of the overall burden of disease in the United States (Satcher, 2000). Fortunately, evidence-based practices (EBPs), defined as "the integration of the best available research with clinical expertise in the context of patient characteristics, culture, and preferences" (American Psychological Association [APA], 2005, p. 1), have been developed to treat a variety of mental health problems in youth and adults (U.S. Surgeon General, 1999). However, EBPs are only useful to the extent that they are implemented with those who need them. Despite the development of EBPs, a "gap" exists between optimal care and the care typically received by individuals with mental health problems (President's New Freedom Commission on Mental Health, 2003). After describing this gap, this paper examines a component essential to closing this gap – training community clinicians in the use of EBPs (Fixsen, Naoom, Blasé, Friedman, & Wallace, 2005). Specifically, the incorporation of ongoing support (e.g., consultation) following initial training is identified as an important feature needed to close the gap. In efforts to identify the critical components of ongoing support, a review and criticism of the supervision and consultation literatures is included.

The Gap between Optimal Care and Actual Care

A report by the U.S. Surgeon General (1999) exposed the gap between research and clinical practice, stating that "a wide variety of effective, community-based services,

carefully refined through years of research, exist for even the most severe mental illnesses yet are not being translated into community settings" (p. xix). A more recent report revealed the persistence of this gap over time (President's New Freedom Commission on Mental Health, 2003), which is evident across psychological disorders and age. Research findings indicate that less than 10% of adults with depression and anxiety disorders receive recommended care (Katon, Unutzer, & Simon, 2004). With regard to the treatment of schizophrenia, Drake and Essock (2009) labeled the "95% problem," arguing that approximately 95% of individuals with schizophrenia do not receive optimal care. Only 20% of youth in need of mental health services receive them – a finding referred to as the "20/20" problem (Healthy Development, 2009). Although cognitive-behavioral therapy (CBT) is considered an EBP for many disorders, few people receive it and those who do often receive suboptimal CBT (Shafran et al., 2009), which is due, in part, to the lack of clinicians trained in CBT (Williams & Martinez, 2008).

To close this gap, the call has been made to offer EBPs in community settings. The President's New Freedom Commission on Mental Health (2003) set forth the following goal for transforming mental health care in America:

> In a transformed mental health system, consistent use of evidence-based, state-of-the art medications and psychotherapies will be standard practice throughout the mental health system. Science will inform the provision of services, and the experience of service providers will guide future research. Every time any American — whether a child or an adult, a member of a majority or a minority, from an urban or rural area — comes into contact with the mental health system, he or she will receive excellent care that is consistent with our scientific

understanding of what works. That care will be delivered according to the consumer's individualized plan. (p. 19)

In pursuit of this goal, the National Institute of Health (NIH) has encouraged researchers to examine how to effectively transfer EBPs into community settings (Program Announcement in Dissemination and Implementation Research in Health; http://grants.nih.gov/grants/guide/pa-files/par-10-038.html). Dissemination (i.e., the purposeful relay of important information to treatment providers), implementation (i.e., the adoption of specific practices based on the disseminated information), and sustainability (i.e., continued implementation over time) are the recommended foci of research (Lomas, 1993; Stirman et al., 2012). By opening the door to such research, NIH has fostered the development of implementation science (Fixsen, Blasé, Naoom, & Wallace, 2009; Fixsen et al., 2005). In line with efforts made to establish treatments as evidence-based, implementation scientists seek to empirically examine the components involved in transporting EBPs into the community. Although research in this field is still in its infancy, Fixsen and colleagues (2005) articulated what appear to be "the most essential and indispensable components of an implementation practice or program" (p. 24) based on their review of implementation efforts made thus far. Two of these "core" components are the focus of the present paper: (a) preservice training and (b) consultation/coaching.

Definition of Terms

Before proceeding, it is important to clarify the terminology used throughout this review. When discussing training, reference will be made both to training approaches and training techniques. Training approaches refer to the entire training package (i.e., the

amalgamation of all techniques used) whereas techniques refer to the individual methods used by trainers (Lyon, Stirman, Kerns, & Bruns, 2010). A key technique discussed will be ongoing support provided to trainees following the initial training workshops.

A common criticism of the DI field is its lack of consistent terminology (Michie, Fixsen, Grimshaw, & Eccles, 2009), which is evident when attempting to label ongoing support strategies following training. Various terms have been used, such as supervision (e.g., Mannix et al., 2006), consultation (e.g., Beidas et al., 2012), coaching (e.g., Miller, Yahne, Moyers, Martinez, & Pirritano, 2004), monitoring with feedback (e.g, Parsons, Reid, & Green, 1993) and audit and feedback (Jamtvedt et al., 2006). Although terms vary, it is difficult to determine whether these strategies are qualitatively distinct from each other given the frequently limited descriptions of what these strategies entail. The definitions of supervision and consultation indicate shared features. Supervision is "the formal provision, by approved supervisors, of a relationship-based education and training that is work-focused and which manages, supports, develops and evaluates the work of colleague/s" (Milne, 2007, p. 439). According to Caplan and Caplan (1993), mental health consultation is "a process of interaction between two professionals–the consultant, who is a specialist, and the consultee, who invokes the consultant's help in a current work problem that he believes is within the consultant's area of specialized competence" (p. 11) with the primary goal of improving mental health care provided to the patient. Caplan and Caplan (1993) distinguish consultation from supervision based on the non-hierarchical relationship between consultant and consultee. Going forward, ongoing support will be used as the term of choice. However, when studies explicitly refer to

supervision, consultation, coaching, monitoring with feedback and/or audit with feedback, the specific terms used by the authors will be noted.

The primary outcomes of interest in this review include improved competence (i.e., improved skill and adherence), skill (i.e., ability to deliver the specific treatment being trained), adherence (i.e., the presence of desired treatment elements when delivering the treatment; Perepletchikova & Kazdin, 2005), knowledge of the treatment and/or disorder of interest, rates of implementation (e.g., frequency of treatment use following the training), and client outcomes (e.g., increased coping skills, improved quality of life, decreased symptomatology, treatment compliance). The studies reviewed varied in how they defined and measured these outcomes (e.g., self-report versus independently-coded videotapes). The specific outcomes examined and how they were measured will be stated if adequate descriptions were available in the original article.

Training in EBP

Training is both a core component of and an obstacle in the implementation of EBPs in community settings (Addis, 2002). The importance of training is recognized (Task Force on Promotion and Dissemination of Psychological Procedures, 1995), however, the availability of training in EBPs is lacking. Prior reviews have indicated that graduate training programs often fail to incorporate EBPs in coursework and supervision (Crits-Christoph, Frank, Chambless, Brody, & Karp, 1996; Weissman et al., 2006). In addition to the lack of training in EBPs lay concern with the effectiveness of training. In order to guide the implementation field in the optimal ways to train clinicians in EBPs, the following question has been posed (Schacht as cited in Bennett-Levy, McManus, Westling, & Fennell, 2009, p. 572): “What training, by whom, is most effective with

which student, who is acquiring the specific knowledge or competency, under which set of circumstances, and at what cost?" Although research findings to date do not fully answer this complex question, tentative answers have emerged. Following is a trans-disciplinary review of the training literature that points to the importance of providing ongoing support following initial training.

Medical Field

Efforts have been made to examine the effectiveness of required continuing medical education (CME) training workshops on physician performance and patient health care outcomes. One such investigation examined 14 randomized controlled trials (RCTs) of CME trainings spanning various topics, including prevention and screening, disease management, counseling and communication skills, smoking cessation, and manual skills (Davis et al., 1999). The training approaches found across studies were categorized as didactic (i.e., lectures with little active audience participation), interactive (i.e., sessions employing active learning techniques), or mixed (i.e., sessions that combined didactic and interactive techniques). Although detailed descriptions of the outcomes assessed were not provided, each study included objective measures of physician performance (e.g., communication skills) and/or health care outcomes (e.g., patient adherence to medication or smoking cessation). Based on quantitative pooling, no overall effects of CME workshops on physician skill or health care outcomes were found. Additional analyses found that interactive workshops and mixed workshops produced significantly positive effects on physician performance, and some showed evidence for positively affecting health care outcomes. Sequenced workshops, which involved multiple or longitudinal sessions, showed better effects on physician performance and

health care outcomes than single session workshops. Workshops that incorporated enabling methods, such as providing patient education materials, also demonstrated positive effects on physician performance. These findings echo those of previous researchers (e.g., Bero et al., 1998) and suggest that traditional didactic educational meetings have minimal effect on improved physician performance or health care outcomes.

In an ongoing effort to examine the effects of CME on physician performance and health care outcomes, the Cochrane Effective Practice and Organization of Care (EPOC) Group conducts systematic reviews, which are periodically updated in step with the expanding research base. In their most recently updated review, Forsetlund et al. (2009) examined 81 trials of CME. They concluded that educational meetings alone provide generally small effects on physician performance and health care outcomes. Factors associated with moderate effects on physician and health care outcomes included higher attendance at CME meetings and sessions incorporating a mix of didactic and interactive methods.

Mental Health Field

Despite the greater range in the backgrounds of service providers in the mental health field, as compared to the medical field, research on training outcomes yields similar findings. Various training approaches, particularly those that incorporated ongoing support, have been found to yield beneficial outcomes, but conclusions are limited given variability in findings and methodological limitations.

In their review of workshop training for psychosocial addiction treatments, Walters, Matson, Baer, and Ziedonis (2005) stated that intensive training approaches that

incorporated ongoing support yielded a "uniformly positive effect" (p. 291), in contrast to variable effects following workshop training alone. Their extensive search yielded 17 training evaluations meeting the following inclusion criteria: appeared in a peer-reviewed journal article, included training in a psychosocial treatment for substance abuse, measured at least one training outcome (e.g., knowledge of treatment, attitudes toward the treatment and/or substance abuse, skill in delivering the treatment), involved training lasting less than 40 hours, and targeted training clinicians to implement treatment in a community setting rather than an academic setting or as part of an efficacy trial. These trials demonstrated that workshops generally resulted in improvements in clinicians' self-reported attitudes (i.e., produced positive attitudes toward treatment and working with substance abuse clients), knowledge (i.e., increased knowledge regarding substance abuse and the specific treatment being trained), skill (i.e., increased self-perceived competence), and the frequency of treatment use (i.e., higher frequency following training). More intensive training approaches appeared most beneficial. However, more modest improvements were found when clinician skill was assessed via videotaped or audiotaped interactions, client report, or written responses to clinical vignettes. Initial training effects generally deteriorated without the incorporation of ongoing support. For example, in one study (Baer et al., 2004), only 8 of the 10 clinicians rated as competent in motivational interviewing by independent coders at post-training were rated as competent at a 2-month follow-up. A majority of the studies failed to include follow-ups. Also, conclusions should be interpreted with caution given variability of findings across studies, the methodological limitations identified (e.g., only four of the studies included a control

condition), limited examination of client outcomes, and the fact that none of the studies reported organizational change following training.

Unfortunately, the passage of time has not resulted in firmer conclusions regarding training effects in the substance abuse field. The tentative conclusion regarding the effectiveness of training in this area is that distance learning may develop knowledge and workshops may improve basic treatment skills, but clinicians likely require ongoing support that includes observation, feedback, and coaching in order to proficiently implement new treatments with real clients (Martino, 2010).

Similar conclusions have been drawn in the broader mental health field. Herschell, Kolko, Baumman, and Davis (2010) examined the effectiveness of various training approaches in psychosocial treatments. Because its focus was on the effectiveness of training approaches with community-based mental health care providers, the review excluded studies that only included graduate students, medical residents, and/or primary care physicians. Given its focus on training approaches rather than treatment content, the training offered in each study did not have to center on an EBP. Primary outcomes of interest included skill, adherence, knowledge of the treatment, rates of implementation, and client outcomes (which varied across studies depending on the disorder of interest). Although some studies only included self-reported skill, some included observer-coded skill based on videotaped or audiotaped clinical interactions. Quantitative pooling analyses were not conducted across studies, thus, the following conclusions should be considered tentative: (1) reading manuals/educational materials is insufficient at improving skill and adherence although these methods may yield short-lived increases in knowledge, (2) self-directed training (e.g., with materials such as

computer programs or tape review) appear more effective than reading materials but only yield slight improvements in knowledge, skill, and adherence, (3) workshops increase knowledge but are generally ineffective at changing behavior, particularly over time, (4) workshop supplements, such as ongoing consultation and supervisor feedback, enhance therapist skill and rates of implementation and in some preliminary studies show positive effects on client outcomes, (5) preliminary work support pyramid training but more rigorous studies are needed before firm conclusions can be made, and (6) multi-component trainings appear effective at improving skill, adherence, knowledge, rates of implementation, and client outcomes.

In addition to the lack of quantitative pooling, caution should be heeded when interpreting these findings due to the numerous methodological limitations of the studies under review. Methodological limitations included, but were not limited to, small sample sizes and frequent failure to include random assignment, comparison groups, standardized assessments, and/or long-term follow-ups. Each of the 55 studies under review were categorized in terms of their methodological rigor using criteria established by Nathan and Gorman (2002; 2007). Type 1 studies were the most methodologically rigorous and involved comparisons, random assignment, blind assessment, standardized assessments, adequate power, and well-described statistical methods. Type 2 studies involved trials that had a significant flaw that prevented them from being considered a Type 1 study. Type 3 studies had numerous methodological limitations. Of the 55 studies reviewed, only 6 (11%) were classified as Type 1. Twenty (36%) were classified as Type 2, and 29 (53%) were classified as Type 3. Of the ten studies that examined workshop supplements (e.g., ongoing support), two were classified as Type 1, four were classified

as Type 2, and four were classified as Type 3. Of the 21 studies that examined multi-component training methods, some of which included ongoing support, two were classified as Type 1, five were classified as Type 2, and 14 were classified as Type 3. In addition to the numerous methodological limitations found in the literature, the studies often showed variability in the outcomes of interest with few studies examining the impact of training on client outcomes. Also, the clinicians involved in the studies volunteered to participate and were generally highly motivated. Thus, it is possible that study participants were not representative of typical community clinicians with regard to their openness to learning and implementing new treatments.

Similar to conclusions gleaned from the Herschell et al. (2010) review, categorization of 35 CBT trials (only seven of which were primarily training studies) suggests the effectiveness of intensive training approaches (Rakovshik & McManus, 2010). In category I studies, clinicians achieved established competence criteria (which varied across studies) or client outcomes were comparable to those found in benchmarking studies. In category II studies, positive improvements in clinician competence and client outcomes were achieved. However, these changes were not comparable to those found in benchmarking studies or the measures used were trial specific and, thus, difficult to compare to benchmarking studies. Category III studies evidenced no improvements in clinician competence or client outcomes. Category I studies were more likely to have included extensive training (i.e., more than 137 hours of training) as compared to brief training (i.e., 60 hours or fewer). Category I studies also more often incorporated graded training in which clinicians who were not progressing received additional training and support. Although supervision was found across

categories, a greater proportion of Category I studies incorporated supervision as compared to Category III studies.

Summary

A trans-disciplinary review of the training literature suggests that the "train and hope" method (Stokes & Baer, 1977) of one-shot workshops is insufficient to improve and sustain clinician outcomes (i.e., skill, adherence, rates of use) and client outcomes. More rigorous studies, using interactive training techniques and multi-component training packages, especially those that incorporate ongoing support, have been found to be most effective at improving clinician skill and implementation rates. However, even these approaches failed to result in proficiency in all clinicians. From the perspective of treatment researchers who conduct RCTs, these findings are not surprising. Clinicians in RCTs typically undergo intensive training that involves close supervision in order to ensure fidelity to the treatment protocol (Roth, Pilling, & Turner, 2010). It appears that the investment in rigorous training and ongoing support often seen in highly controlled RCTs is warranted when attempting to disseminate EBPs into the community.

Although these reviews address the question posed by Schacht (as cited in Bennett-Levy et al., 2009), additional empirical work is required in the area of training, especially in light of the fact that current gold standard training approaches (i.e., workshop, manual, and supervision) frequently failed to produce proficient levels of clinician adherence and skill. This result may be due to the narrow focus commonly found in training studies. Instead of comparing training approaches with each other, Beidas and Kendall (2010) argued that research on training should adopt a systems-contextual perspective that recognizes that therapists are embedded within a context.

According to this perspective, therapist behavior change and, ultimately, client outcomes, will occur when training approaches adequately take into account the transactional relationships among organizational, therapist, and client variables. Thus, further investigations of training approaches that have been shown to be effective as well as examination of the specific components that contribute to their success and their association with contextual variables will bring the dissemination and implementation (DI) field closer to achieving the goal of transforming mental health care (Herschell, McNeil, & McNeil, 2004; McHugh & Barlow, 2010).

Ongoing Support as a Core Component of Training

In light of the findings that ongoing support is important for promoting and sustaining change in clinician behavior (e.g., Herschell et al., 2010) and that consultation/coaching is considered a core component of implementation practices (Fixsen et al., 2005), it is prudent for the DI field to conduct research aimed to better understand this component. The following sections offer reflections from the field regarding the importance of ongoing support and empirical evidence on the effectiveness of various types of ongoing support as compared to pre-training levels, waitlist controls, and alternative training methods.

Reflections from the Field

As previously stated, EBPs are defined as "the integration of the best available research with clinical expertise in the context of patient characteristics, culture, and preferences" (APA, 2005, p. 1). It can be argued that evidence-based training is the integration of the best available research with clinical expertise in the context of trainee characteristics, culture, and preferences. Such a definition values both empirical research

and expertise. Thus, an examination of empirical investigations of training is complemented by reflections from experts in the field who have engaged in DI efforts. A common message from DI researchers who have attempted to bring EBPs into community settings is that ongoing support is a facilitator of the implementation process. Following includes reflections from the field as well as descriptions of two exemplar programs.

The importance of ongoing support in DI efforts was recognized by DI workers who were forced to quickly disseminate EBPs into the community following wide-scale traumatic events. For example, the Child and Adolescent Trauma Treatments and Services Consortium (2007), which formed in response to the September 11th attacks on the World Trade Center, sought to deliver evidence-based, trauma-focused CBT to youth affected by the attacks. Their strategy involved ongoing, intensive consultation with participating clinicians from schools and communities. Consultation involved both case consultation and consultation on how to overcome implementation barriers. Given the diversity in settings and the lack of empirical guidelines regarding how to adapt treatments appropriately, consultation between clinicians and treatment developers was used extensively. Although the consortium did not empirically investigate their implementation strategies, they attributed consultation focused on applying treatment techniques to specific cases as being most helpful to clinicians throughout the implementation process. An additional facilitator was the involvement of supervisors from each site in the training and consultation process, which allowed for continuity of care at each site. This was corroborated by those who trained clinicians to deliver trauma services to children following Hurricane Katrina (Dean et al., 2008). They noted that

clinicians frequently expressed frustration toward outside professionals who came to provide one-shot trainings without then providing ongoing support to assist in the actual implementation of services. Ongoing consultation appears both needed and wanted.

Numerous other successful implementation efforts have regarded ongoing support as integral. For example, based on five years of experience in disseminating socials skills training for schizophrenia in Peru and achieving improvement in therapist skill (i.e., competence in implementing role-played sessions) and improved quality of life and social adjustment in patients, Sotillo, Rodriguez, and Salazar (1998) recommended that continued training and consultation be routine components of DI efforts. In their review of three successfully disseminated programs, Backer, Liberman, and Kuehnel (1986) asserted that consultation on the adoption process itself, including the administrative and psychological effects that change would incur, was critical to the success of each program. They argued that consultation on the process of change is "probably the most critical consultation an outside expert can offer" (Backer et al., 1986, p. 115). Similarly, when comparing sites that successfully implemented psychoeducation for families of individuals with schizophrenia to sites that were less successful, McFarlane, McNary, Dixon, Hornby, and Cimett (2001) found that individuals at successful sites were more interested in receiving supervision and consultation. In fact, individuals at successful sites were almost unanimous in their statements regarding the value of ongoing supervision and consultation. Few of the less successful sites participated in consultation or supervision following the workshop. However, it should be noted that a principal component analysis did not find the item related to clinical supervision (i.e., "availability of help") as predicting success. Following initial lack of success in training workers at a

large mental health agency to deliver Integrated Dual Disorders Treatment, Devitt, Davis, Kinley, and Smyth (2009) improved success by adding ongoing supervision and consultation. They referred to their new emphasis on supervision as "perhaps the most important dissemination activity" they conducted (Devitt et al., 2009, p. 103). In an examination of facilitators of program success at six Kansas sites who participated in the National Implementing EBP Project, which focused on the dissemination of EBPs for adults with severe mental illness, Rapp et al. (2008) identified one facilitators as the training and ongoing consultation program provided to each site based on interviews with program directors. Overall, voices from the field endorse the incorporation of ongoing support in training efforts.

Exemplars. To illustrate the use of ongoing support, two programs that have been widely disseminated include Triple P (Positive Parenting Program) (Sanders, 1999), a program designed to teach parents how to promote social competence and address common behavioral problems in children, and Multisystemic Therapy (MST; Henggeler, Schoenwald, Borduin, Rowland, & Cunningham, 1998), an intensive family- and home-based treatment for antisocial youth. Based on their experiences disseminating and implementing these treatments in community settings, both program developers have pointed to ongoing support as contributing to their success.

Triple P has trained over 16,000 professionals in 14 countries and has been incorporated into routine care in some state agencies (Sanders & Turner, 2005). To promote large-scale dissemination, Sanders, Turners, and Markie-Dadds (2002) adopted a systems-contextual framework that highlights the importance of providing ongoing, multilevel support. According to this framework, it is essential to recognize the broader

organizational environment in which clinicians and consulting practices are embedded. Thus, efforts to disseminate Triple P have focused not only on individual clinicians but also the larger organizational systems in which they belong. In addition to providing ongoing posttraining consultation to individual clinicians, Triple P researchers provide orientation to on-site supervisors and managers on the program and training process so as to foster ongoing support for Triple P within the organizations that will attempt to implement it. The technical support offered to clinicians and agencies include: Triple P researchers and developers attending staff meetings to address issues, fostering the development of peer supervision networks, providing regular updates on Triple P via newsletters and websites, and a question and answer forum via e-mail with the State Program Coordinator. Additionally, consultation backup is offered, which includes: regular contact with agencies, troubleshooting with agencies, and assisting agencies in the development and maintenance of peer support networks. Periodic reviews provide information about the strengths and weaknesses of implementation at each site. Data are used as feedback to agencies regarding the successful implementation of the program at their site. These efforts assist in quality maintenance of Triple P across the numerous sites that implement it.

Investigations of the effectiveness of Triple P are encouraging. Shapiro, Prinz, and Sanders (2008) found increased confidence and self-reported competence in delivering the program following participation in training. Their examination was a large-scale endeavor and involved the training of 448 service providers from various disciplines, including mental health professionals, educators, paraprofessionals, child care and faith-based institutions, health professionals, and administrators. Positive findings

lend support to their comprehensive implementation approach, although the specific impact of consultation was not assessed. A more recent investigation of 611 providers who underwent the Triple P training program identified characteristics of providers who exhibited greater use of Triple P following training (Sanders, Prinz, & Shapiro, 2009). Among other characteristics, this investigation found that providers who participated in consultation with other Triple P practitioners were more likely to become high users of the program, lending some support for the specific importance of consultation.

The dissemination and implementation of MST into community settings also highlights the role of supervision and consultation in successful implementation. Typical training in MST includes a 5-day workshop for therapists and supervisors followed by one hour per week of on-site supervision, one hour per week of telephone consultation with an MST expert, and quarterly training booster sessions (Schoenwald, Heiblum, Saldana, & Henggeler, 2008). Analyses have found treatment adherence to MST principles, based on therapist, parent, and adolescent report, to be associated with reduced criminal behavior in youth receiving the treatment (Henggeler, Melton, Brondino, Scherer, & Hanley, 1997; Schoenwald, Carter, Chapman, & Sheidow, 2008). Additional analyses found that perceived consultant competence, as rated by MST therapists, predicted therapist adherence and improved youth outcomes and, surprisingly, that supportive aspects of consultation (i.e., alliance) were negatively associated with therapist adherence and youth outcomes (Schoenwald, Sheidow, & Letourneau, 2004). Also, some characteristics of supervisors, as rated by the therapists, were found to be negatively and positively associated with therapist adherence and youth outcomes (Schoenwald, Sheidow, & Chapman, 2009). Specifically, supervisor's average focus on

adherence to MST principles predicted greater therapist adherence. Whereas greater supervisor adherence to structure and the process of supervision was associated with greater reduction in youth problems, supervisor's overall higher average focus on clinician development was associated with weaker reductions in youth problems. It may be that supportive aspects of consultation occur in response to therapists having a difficult time implementing treatment and, similarly, that supervisor focus on clinician development occurs in response to clinicians having difficulty dealing with particularly challenging clients. Overall, the MST literature corroborates the direct role of ongoing supervision and consultation on therapist adherence and youth outcome and also demonstrates the importance of examining specific aspects of supervision and consultation, given that they do not contribute to universally positive outcomes.

Summary. DI experts frequently recommend ongoing support following training. They recommend consultation to both individual clinicians and the organizations in which they work in order to overcome barriers involved in implementing a new treatment. A common theme seen across the DI efforts is the focus on building relationships and strong lines of communication with individuals and organizations so as to maximize and sustain DI efforts across diverse settings.

Comparison to Pre-training Skills or Waitlist Controls

The methods that define good therapy outcome research (e.g., Kendall, Holmbeck, & Verduin, 2004) equally apply to good training outcome research. Important preliminary steps when examining a treatment are to measure its effectiveness as compared to a waitlist control and to use repeated measure designs (e.g., pre-post or single-subject multiple baseline designs). These methods allow one to conclude whether

the intervention incurs any benefit beyond what would occur naturally. Within the training literature, studies across various target disorders provide preliminary support for the effectiveness of various types of ongoing support on therapist knowledge, skill, adherence, and implementation as compared to pre-training levels or waitlist controls.

A common structure for ongoing support in training efforts that appears to be effective is group supervision. For example, in one study, general practitioners who had no prior training in CBT were randomly assigned to receive training in CBT for panic disorder immediately or following a delay (Heatley, Ricketts, & Forest, 2005). Training consisted of two 3.5-hour didactic workshops followed by six 1.5-hour group supervision sessions. Supervision sessions focused on applying skills taught during the workshops and consisted of further elaboration of the clinical approaches introduced during the workshops. Following training, no significant increases were found in knowledge about panic disorder. However, based on their performance in role-plays, GPs evidenced improved ability to assess and plan for the management of panic disorder. Additionally, according to patient records, GPs evidenced greater use of CBT techniques with their patients.

Similar outcomes were achieved by a different research group examining CBT training for primary care mental health therapists treating clients with panic disorder (Grey, Salkovskis, Quigley, Clark, & Ehlers, 2008). Prior to participation in the training, all therapists conducted their treatment-as-usual (TAU) for eight months. Training involved 3-day didactic workshops followed by eight months of seeing clients while participating in group supervision. Group supervision consisted of case discussion, tape review (either audio or video), and role-plays. If scheduling conflicts arose, therapists

were able to participate in individual supervision. This phase was followed by another 1-day workshop and then another eight months of ongoing supervision. Results indicated that TAU yielded significant improvements in client outcomes in terms of panic severity, general anxiety, and depression. However, clients evidenced even greater improvements during the CBT training phase. In contrast to the 17% of clients who were panic-free following TAU, 54% of clients seen by therapists following their training in CBT were panic-free. Of note, six of the seven participating therapists rated ongoing supervision as the most helpful part of the training.

In another study, group supervision as an adjunct to training in CBT for psychosis was similarly valued (Newton & Yardley, 2007). Following participation in the training and supervision program, therapists evidenced increased knowledge of CBT and confidence to implement CBT. Also, therapists reported spending 40% more of their sessions using CBT than they did at pre-training. Audit reviews conducted 12 months and 24 months post-training indicated that 88% of therapists documented the use of CBT with their clients. Although it is uncertain whether supervision was critical to achieve the outcomes in these examples, these findings provide preliminary support for training approaches that includes both didactic workshops and ongoing group supervision.

Common practices within group supervision found across training studies are case review and performance-based feedback. For example, one study offered a 10-session training program that incorporated 30 minutes of didactics and 90 minutes of group supervision for therapists learning CBT for adults with mood and anxiety disorders (Lau, Dubord, & Parikh, 2004). During group supervision, time was spent watching videotapes or listening to audiotapes of actual sessions. Instructor and peer feedback was provided.

Improved skill, as assessed by independent raters watching therapy tapes using the Cognitive Therapy Scale (CTS; Young & Beck, 1980), was found following participation in the training and supervision. Clients seen by therapists who received training and supervision demonstrated reduced symptomatology according to changes in scores on the Beck Depression Inventory-II (Beck, Steer, & Brown, 1988), the Beck Anxiety Inventory (Beck, Epstein, Brown, & Steer, 1988), and the Clinical Global Impression Scale (Guy, 1976). Of note, only 41% of clinicians submitted therapy tapes prior to and following training, and only 59% submitted client records. Also, to participate in training, the study required clinicians to have previously attended at least a 2-day workshop on CBT and to have had exposure to a CBT manual. Thus, results from this study should be interpreted with caution. It is possible that findings would not have been significant if all clinicians submitted tapes and records, and it is questionable how generalizable the findings are to community clinicians who have had less exposure to CBT prior to training.

Similarly, competence to deliver CBT for substance abuse (as assessed by supervisors and independent raters) improved after substance abuse counselors participated in 35 hours of didactic and practice-based instruction over the span of two weeks and then conducted manualized treatment with at least three clients while receiving ongoing supervision (Morgenstern, Morgan, McCrady, Kelly, & Carroll, 2001). Supervision consisted of one hour of group supervision and one hour of individual supervision. Supervisors reviewed session tapes and provided session-by-session feedback during supervision.

In another study, opportunities for self-evaluation during group session appeared beneficial (Schoener, Madeja, Henderson, Ondesma, & Janisse, 2006). Therapists (N =

10) participated in a 2-day workshop that combined didactic and experiential methods. Therapists then participated in eight supervision groups every other week, which allowed for opportunities of self-evaluation. Thirty-five of their clients participated. At baseline, clients completed structured diagnostic interviews to confirm diagnosis. Audiotapes of all individual sessions were recorded. A randomly selected number of tapes were analyzed for the presence of motivational interviewing skills and client response, yielding 156 tapes. From pre- to post-training, improvements were found in five out of six therapist skills assessed. Specifically, therapist empathy, motivational interviewing spirit, and reflective listening statements increased following training, whereas close-ended questions and advising without permission decreased. The one client variable assessed (i.e., client change talk) was found to increase following training. Given that client change talk has been linked to subsequent behavior change (Amrhein et al., 2003), this study provides preliminary support for the effects of this training approach on both clinician performance and client outcomes.

Other studies have demonstrated the effectiveness of training that involves live observation paired with performance-based feedback. Two separate studies found improved staff behavior (i.e., use of token reinforcement system and teaching behaviors) and client behaviors (i.e., engagement) after direct care staff in a community group home for adults with severe intellectually disabilities received training followed by three in vivo observation and feedback sessions (Harchik, Sherman, Sheldon, & Strouse, 1992; Parsons et al., 1993). The particular training procedure implemented was as follows: First, the staff member participated in a mini-workshop with a consultant, the focus of which was decided upon by the consultant based on the staff member's current

performance and the needs of the adults. During the workshop, the consultant modeled targeted behaviors, the staff member role-played the skills, and the consultant provided feedback to the staff member. Within one week of this meeting, the consultant observed and recorded data while the staff member ran his/her teaching groups with the adults in the home. The consultant then met with the staff member individually to provide feedback. The consultant began the conversation by providing a general description of what was observed. The consultant provided either a statement of general praise or a statement of empathy. Then, the consultant and staff member reviewed the consultant's written notes. The consultant provided specific praise when the staff member correctly implemented a skill and also provided suggestions to the staff member on ways to improve his/her skills. The consultant sought suggestions from the staff member regarding ways he/she could improve. The end of the feedback session consisted of the consultant summarizing what had been discussed, inquiring about the staff member's opinion on the reasonableness of the feedback, and arranging a follow-up observation. Target behaviors tended to return to baseline levels when consultation was discontinued (Harchik et al., 1992), suggesting that the maintenance of training effects likely requires ongoing support.

In a follow-up study, Parsons and Reid (1995) examined whether training on-site supervisors in providing feedback to direct care staff would foster maintenance of teaching skills. Supervisors participated in the same teaching program their staff had participated in (which involved observation and feedback until they reached criterion for teaching skills). Supervisors then participated in a program to teach them how to provide feedback to their staff. Direct care staff whose supervisors had completed feedback

training demonstrated greater maintenance in their teaching skills compared to direct care staff whose supervisors had not participated in feedback training, suggesting that the ongoing support they received from their trained supervisors bolstered their skill maintenance.

Summary. Compared to pre-training levels or waitlist controls, training approaches that include ongoing support in the form of supervision appear to yield positive therapist and client outcomes across a variety of target treatments. The most common format appears to be group supervision. Individual supervision and consultation have also demonstrated effectiveness. Case review (utilizing video or audiotapes), live observation, peer feedback, instructor feedback, self evaluation, and elaboration of material taught during training have been found in studies that evidence positive outcomes. However, methodological limitations, including lack of a comparison group and poor response rates for submitting tapes and records, prevent firm conclusions. Also, it is unclear from these studies whether ongoing support provided an additional benefit beyond what would have incurred from workshops alone.

Group Comparisons

Although comparison to pre-training skills or waitlist controls is the first step toward empirically supporting a training approach, stronger support comes from examining the relative effectiveness of various training approaches. Following is a review of trials containing group comparisons, most of which involved randomization, whose findings suggest training approaches that include various types of ongoing support are more effective than training approaches that do not include ongoing support.

For example, one study found that mental health nurses who participated in a diploma course that incorporated workplace clinical supervision evidenced greater improvements in their knowledge of serious mental illness than mental health nurses who participated in a diploma course that did not provide workplace clinical supervision (Bradshaw, Butterworth, and Mairs, 2007). Twenty-three mental health nurses with at least one year of experience working with individuals with schizophrenia and who were participating in a 36-week diploma course in psychosocial interventions for psychosis were recruited for this study. As part of the education program, nurses were required to complete knowledge questionnaires and recruit six clients with whom they could conduct a psychosocial intervention. Symptom data was gathered on patients at the start and end of the nurses' education program. The control condition consisted of 12 nurses who were enrolled in the education program the year prior to the inclusion of workplace clinical supervision. The 11 nurses in the experimental conditions were enrolled in the education program the year after those in the control condition. They participated in workplace clinical supervision, which consisted of 60-90 minute meetings every other week in groups of three (two supervisees and one supervisor). The supervision process paralleled that of the therapy by being structured and following a collaboratively set agenda. At each meeting, one supervisee presented a client. Supervisors listened to audiotaped sessions in between supervision meetings and provided feedback during supervision. Fidelity to the supervision model was monitored. In addition to contributing to improved knowledge, participation in the diploma course that offered supervision resulted in improved client outcomes. Although the clients of participants in both conditions experienced reductions in positive symptoms, significantly greater reductions were found

in the condition involving workplace clinical supervision. Although this finding provides support for the effectiveness of supervision, it is worth noting that other factors may explain the finding. The nurses in the experimental condition significantly differed from the nurses in the control condition in terms of age and experience. The positive findings in the experimental condition may be associated with the older, more experienced nurses in that condition. Also, given that the conditions involved nurses who entered the programs in two separate years, it is possible that cohort effects, other than the desired difference in supervision availability, accounted for differential outcomes.

Another study demonstrated the effectiveness of ongoing supervision compared to discontinued supervision (Mannix et al., 2006). Twenty nurses were trained through nine days worth of didactic and interactive workshops delivered over a 12-week period. Nurses then participated in 2-hour sessions of skill-building supervision every other week for three months. Supervision consisted of guided discovery. Audiotape review was encouraged in order to foster reflection on the part of the nurse and to allow for the sharing of feedback from others. Based on audiotaped interactions with patients, the nurses demonstrated improved CBT skills from baseline to post-training as assessed by independent coders. Skill was defined as competence in structuring the session, pacing the session, summarizing and providing feedback to clients, fostering a collaborative relationship, implementing guided discovery, incorporating CBT in the model of care, drawing out components of the CBT model, applying CBT change techniques, evidencing interpersonal effectiveness, and appropriately ending sessions. Following initial training, half of the nurses were randomly selected to participate in ongoing supervision. Six months later, all nurses were reassessed. Those who had discontinued

supervision evidenced a slight decline in CBT skills whereas those who had participated in ongoing supervision evidenced further improvements in skills. Those in the extended supervision condition also reported greater use of CBT skills with their patients. Thus, it appears that ongoing supervision contributes to the maintenance of skills developed during earlier training and supervision. Findings also suggest that case review during supervision may be an important component of supervision.

Forms of ongoing support other than case supervision also appear to be effective at improving clinician and agency level outcomes. For example, Luoma et al. (2007) provided training for 30 counselors via a 1-day workshop on how to implement Group Drug Counseling (Daley, Mercer, & Carpenter, 1998). Half of the counselors were randomly assigned to participate in additional consultation, which involved eight 1.5-hour consultation sessions. Consultation sessions did not include case supervision but instead focused on relapse prevention, which encouraged counselors to discuss barriers to adoption and ways to overcome such barriers. Consultation also incorporated the principles of Acceptance and Commitment Therapy (Hayes, Strosahl, & Wilson, 1999), which encouraged counselors to mindfully accept any uncomfortable thoughts or feelings that might arise from attempting the new intervention and to create behavioral goals. A higher sense of personal accomplishment was reported by clinicians in the consultation condition at the 4-month follow-up. Although counselors in both conditions evidenced self-reported adoption of the treatment, significantly higher levels of adoption were reported by participants in the consultation condition at the 2-month and 4-month follow-ups.

A quasi-experimental study focused on agency level changes following training in family services for the families of adults with schizophrenia at nine state agencies (Dixon et al., 1999). At four agencies, staff participated in a 1-day didactic training followed by discussion with family members and patients. At the other five agencies, staff participated in a more intensive, 2-day workshop, which incorporated books, a manual, a video, and role-play. The intensive training condition also included ongoing technical assistance via telephone and two follow-up visits by the trainers. At 1-year follow-up, all four agencies in the control condition reported no changes in family services. In contrast, three of the five agencies in the intensive training condition reported improved family services, with one agency fully implementing the multiple-family group model that was taught in the training. This finding suggests that ongoing technical assistance in the form of consultation appears important in maximizing training gains at the agency level. However, findings also indicate that room for improvement exists even in agencies that received the most intensive training approach.

The usefulness of consultation that centers on overcoming implementation barriers was observed by a research group in the public health field. In efforts to disseminate social-cognitive HIV risk reduction interventions, Kelly et al. (2000) randomized AIDS service organizations (ASOs) to one of the three following conditions: (1) written materials and video only, (2) written materials and 2-day interactive workshop, or (3) written materials, 2-day workshop, and 6 months of telephone consultations to problem-solve implementation barriers. Interviews with the prevention service directors at each ASO included evaluation of the adoption of targeted strategies (i.e., whether or not they were used) and the frequency of adoption (i.e., how often they

were used). ASOs in all conditions demonstrated greater adoption and a higher frequency of use of the targeted strategies with women following training. The greatest improvement in the adoption and frequency of use with gay men was found in ASOs that were in the consultation condition. Also, ASOs in the consultation condition showed the greatest improvement in offering targeted strategies to any clients.

A recent study demonstrated a linear relationship between participation in consultation and clinician skill (Beidas et al., 2012). Clinicians (N =115) were randomly assigned to one of three conditions: (1) a one-day workshop that covered a specific manual (i.e., *Coping Cat*; Kendall & Hedtke, 2006) and procedures of CBT for child anxiety, (2) computer training on CBT for child anxiety accomplished through an interactive DVD, and (3) a one-day workshop that included a focus on principles of CBT and active learning (including behavioral role-play exercises). Following one day of training, participants completed three months of weekly consultation via phone or Internet, which consisted of continued didactics, role-plays, and case discussion. Outcomes of interest included skill (i.e., competence in delivering treatment according to the CBT model) and adherence (i.e., the presence of core CBT components) during independently-rated, audiotaped role-plays. CBT knowledge was also assessed. Clinicians in all conditions demonstrated moderate improvements in skill, adherence, and knowledge from pre- to post-training and further improvements in skill and adherence from post-training to post-consultation. Clinicians who attended more consultation calls post-training evidenced greater improvements in skill and adherence compared to clinicians who attended less calls. This points to the importance of ongoing support and

suggests the potential effectiveness of the combination of and/or the individual techniques used during ongoing support, such didactics, role-plays, and case discussion.

Studies reviewed thus far demonstrate that ongoing support is more effective at improving skill, knowledge, client change, and agency level change than training that does not include ongoing support. Researchers have also begun actively comparing various types of support during training in order to better understand which training components are most potent. For example, one study compared the effectiveness of reading a manual, reading a manual plus accessing an interactive website, and participation in a workshop followed by up to three 1-hour supervision calls for 78 substance abuse counselors learning CBT for substance abuse (Sholomskas et al., 2005). Due to practical constraints, random assignment was only possible with 54 participants; the rest were forced into a condition. Of the 27 participants in the supervision condition, 17 opted to participate in at least one supervision session. Therapist skill and adherence were assessed via performance in videotaped role-plays. Results indicated that all conditions evidenced improved skill and adherence following training. The enhanced training condition outperformed the manual only condition on two of three role-plays. Although the web condition had larger effect sizes than the manual only condition for skill and adherence, these conditions were not statistically different from each other following training. The web and enhanced training conditions showed maintenance of skills at a 3-month follow-up whereas the manual only condition evidenced a slight decline in skill. When looking at the enhanced condition, those who participated in supervision evidenced higher skill and adherence scores than those who did not. In addition to skill and adherence, Sholomskas et al. (2005) measured improvements in CBT

knowledge, self-reported use of CBT, and satisfaction with CBT. Increased knowledge of CBT was evident across all conditions. Those in the web and enhanced conditions tended to report higher levels of use of CBT and greater satisfaction with CBT than those in the manual only condition but no statistically significant differences were found across conditions.

Another study offers further suggestions regarding which specific types of ongoing support are effective. Miller et al. (2004) randomly assigned 140 licensed substance abuse counselors to one of five CBT training conditions: (1) 2-day workshop, (2) 2-day workshop plus written feedback, (3) 2-day workshop plus 6 individual coaching sessions, (4) 2-day workshop plus written feedback and 6 individual coaching sessions, or (5) self-training control (received therapist manual and training videos to learn on their own). In the feedback conditions, feedback consisted of written feedback sent via e-mail or hard copy. Coaching involved positive reinforcement, problem-solving difficulties, and demonstrating and practicing motivational interviewing skills. Therapist skill (as defined by use of motivational interviewing techniques) was assessed at baseline, posttraining, four, eight, and 12 months later via audiotaped sessions with actual clients. Results indicated that all four training conditions showed greater improvements in skill than the self-training control at posttraining. From baseline to four months, no significant improvement in skills was found in the control condition whereas large training effects were seen in the conditions that offered workshops plus additional support. Although the workshop only condition exhibited gains similar to the enhanced workshop conditions at posttraining, at four months they demonstrated a reversal in skills, only evidencing marginal improvements in skill as compared to baseline. In order to examine whether

training effects were clinically meaningful, standards of clinical proficiency were used. Counselors were considered to be proficient if they received at least a score of 5 (out of 7) on motivational interviewing spirit and if 95% of counselor in-session responses were consistent with motivational interviewing responses. Only those in the enhanced workshop conditions, on average, achieved clinical proficiency criteria at 4-month and 8-month follow-ups. Client outcomes were not assessed, but client responses during audiotaped sessions were analyzed. Only clients in the workshop plus feedback and coaching condition evidenced changes in the expected directions at the 4-month follow-up. These findings suggest that feedback and coaching formats of ongoing support are comparable but that a combination of these types of support is more potent. Herschell et al. (2010) deemed this a Type 1 study, strengthening the conclusions that can be drawn from it. Nevertheless, it is important to recognize that these counselors appeared motivated and were fairly well-educated, and may or may not be representative of community clinicians as a whole.

A recent study directly compared traditional tape supervision versus live teleconferencing supervision following a 2-day workshop in motivational interviewing (Smith et al., 2012). Ninety-seven substance abuse counselors were randomly assigned to workshop only, workshop plus tape supervision tape, or workshop plus live teleconferencing supervision (TCS). For those in the tape condition, counselors completed five simulated therapy sessions with an actor posing as a client. Each session was taped and supervisor feedback was provided to the counselors several days following each session. Those in the TCS similarly completed 5 practice sessions. However, in contrast to delayed feedback based on tape review, they received real-time feedback from

their supervisors who watched them live during their sessions. Counselors submitted audiotapes of real sessions at baseline, following the workshop, following the supervision phase (8-week follow-up), and at a 20-week follow-up. Counselors across all conditions evidenced improvement in skill from baseline to posttraining. Those in the workshop only conditioned demonstrated some deterioration in skill from posttraining to the 8- and 20-week follow-ups. Those in the TCS demonstrated significantly greater skill than those in the workshop only condition at both follow-ups. Although skill scores for those in the tape condition fell between those in the TCS and workshop-only condition, no significant differences were found between the TCS and tape conditions with the exception of the superiority of TCS in increasing reflection to question ratio and the superiority of tape in increasing complex reflections. These findings point to the importance of feedback as an ongoing support strategy, regardless of whether it is immediate or delayed. A later analysis found that contextual factors impacted the effect of supervision methods (Carpenter et al., 2012). TCS was found most effective at increasing some motivational interviewing skills for counselors with no graduate degree and stronger vocabulary skills, whereas tape supervision was most effective for counselors with graduate degrees. These findings highlight the importance of examining ongoing support methods within a systems-contextual framework (Beidas & Kendall, 2010).

Summary. The findings from several comparisons, most of which were RCTs, indicate that the incorporation of ongoing support into training, in the form of either case supervision, relapse prevention, technical assistance, written or verbal feedback, or coaching improves therapist knowledge, skill, adherence, confidence, self-reported usage of the treatment, client outcomes, and agency-level adoption of services. The studies

reviewed demonstrated that training that incorporated ongoing support demonstrated greater improvements than a workshop only (e.g., Dixon et al., 1999; Luoma et al., 2007; Miller et al., 2004), self-training (e.g., Miller et al., 2004; Sholomskas et al., 2005), discontinued supervision (e.g., Mannix et al., 2006), and a diploma course without ongoing supervision (e.g., Bradshaw et al., 2007). Also, when looking at clinicians who participated in training conditions involving ongoing support, those who attended more sessions evidenced greater outcomes (e.g., Beidas et al., 2012).

Despite these promising findings, it is of note that even in the most robust studies there is room for improvement. Also, not all training studies have demonstrated similar findings. For example, a study designed similarly to the Miller et al. (2004) study found no statistically significant differences between a workshop only condition and workshop with training enrichments condition (Moyers et al., 2007). In contrast to the participants in the Miller et al. (2004) study, participants in the Moyers et al. (2007) study were overall less enthusiastic about training, less educated, less experienced with substance abuse clients, younger, had fewer years of experience in counseling, and were more ethnically diverse. These findings suggest that with less experienced and less motivated clinicians, training efforts may produce less robust effects and that ongoing support may not serve to yield additive effects. The discrepancy between these studies points to the importance of examining therapist and contextual factors when analyzing training outcomes as advocated by Beidas and Kendall (2010). Also, it is worth noting that in the Moyers et al. (2007) study, only 44% of clinicians in the enhanced workshop condition participated in their available consultation calls by the first follow-up. Thus, it is possible

that greater improvement in and maintenance of skill might have occurred if participants had completed the recommended consultation calls.

Methodological limitations, the variability in results across studies, and the uneven allocation of resources distributed across training conditions warrant caution when drawing conclusions. Although these studies support the usefulness of ongoing support in training and point to specific types of support that may be beneficial, they do not definitively confirm the critical role of ongoing support or which types of support are most effective. It may be the greater intensity of treatment and the longer time involvement, not ongoing support specifically, that contributed to positive findings. Additional RCTs that involve training conditions of equal time intensity are needed to discriminate the role of ongoing support.

Support for the Specific Role of Ongoing Support

With the exception of the MST literature, a criticism of the prior empirical studies and DI reflections is that they do not empirically address the specific benefit of ongoing support due to the confounding variable of time spent in training. It is possible that greater involvement in training in terms of time and not participation in the specific techniques of providing supervision, consultation, coaching, or feedback resulted in improved outcomes. This section reviews findings suggesting that intensity of training does not necessarily account for positive outcomes and that ongoing support, specifically, contributes to client outcomes.

In contrast to the argument that greater intensity of training may solely account for positive findings, a pilot study found that a less intensive training program yielded similar results as those of a more intensive training program (Westbrook, Sedgwick-

Taylor, Bennett-Levy, and McManus, 2008). The effectiveness of a 10-week program, which included weekly didactics and group supervision was compared to a 1-year diploma course on CBT for anxiety and depression. Independent assessors listened to audiotaped sessions and rated CBT skills using the CTS (Young & Beck, 1980). Trainees self-assessed their CBT skills using the Cognitive Therapy Self-Rating Scale (CTSS; Bennett-Levy & Beedie, 2007). Client outcomes were assessed by examining symptom and functioning data found in client records. From baseline to post-training, significant improvements were found in assessor-rated and self-rated CBT skills as well as client functioning. These results were compared to those obtained in the diploma course benchmarking study (Bennett-Levy & Beedie, 2007). Although trainees in the diploma course evidenced higher total scores on the CTS as compared to participants in the shortened course, no significant differences were found in the CTS cluster (i.e., subscale) scores. No significant differences were found across courses according to the CTSS data or the client outcome data. Thus, the shortened course yielded similar benefits as those of the diploma course. Of note were the high satisfaction ratings for the shortened training. Also, participants rated supervision as a highly important training component. These promising findings imply that greater intensity does not always yield vastly incremental benefits.

Findings suggesting the specificity of ongoing support are corroborated by a study on Dialectical Behavior Therapy (DBT; Linehan 1993a; 1993b) (Hawkins & Sinha, 1998). Front-line clinicians (n = 109) participated in a rigorous training program, which included 1- to 2-day seminars, on-site in-service training, two 5-day intensive workshops (spaced six month apart), and regular consultation with DBT practitioners authorized to

be trainers by the DBT treatment developer or her colleague. The outcome of interest was a written examination assessing DBT knowledge, which was administered at varying times across sites and thus resulted in sampling varying stages of DBT training. Compared to naïve clinicians, who had limited or no training in DBT, clinicians at more advanced levels of training showed significantly greater levels of knowledge, although performed less well than a benchmarking group of doctoral students from the University of Washington. The best predictors of knowledge gain included: reading of materials, peer support/consultation, and study group attendance. Peer support/consultation accounted for somewhat more variance than study group attendance and somewhat less variance than reading of materials. Additional analyses indicated that DBT conceptual mastery depended equally on reading the literature and attending peer support/consultation meetings. The variance in knowledge accounted for by consultation activities was marginally improved after adding the time spent with the expert consultant to peer support/consultation. Although this study did not examine clinician skill, the findings support the particular importance of consultation in training; participation in peer support/consultation meetings accounted for unique variance in knowledge acquisition. Findings also demonstrated that expert consultation contributed to further knowledge acquisition following initial acquisition, suggesting that expert consultation may be beneficial for clinicians who have already developed foundational knowledge of the treatment.

Summary. Studies partially address the argument that the positive findings of the previously reviewed studies may have been due to length of engagement and not specifically ongoing support. Findings suggest that longer time in training does not

always lead to additive benefits. It appears that the potency of training comes not only from its length, but also the specific components and methods it employs.

Identifying the Critical Components of Ongoing Support

Both the recommendations from DI experts and the findings from a review of the training literature suggest the importance of ongoing support for improving clinician knowledge, skill, adherence, and implementation as well as client outcomes (Beidas & Kendall, 2010). Ongoing support includes many features (e.g., case supervision, feedback, consultation on how to overcome barriers), but at this juncture little information is available to suggest which components of ongoing support account for these findings. In similar fashion to the question posed by Schacht (as cited in Bennett-Levy et al., 2009) regarding training and Kiesler (1966) regarding treatment, Spence, Wilson, Kavanagh, Strong, and Worrall (2001) stated the following regarding supervision: "the evaluation of any supervision system needs to examine who needs what type of supervision, from whom, how often, at what cost, and to what benefit" (p. 150). If DI efforts are to be maximized, it is essential to identify the potent components of ongoing support.

The difficulty in identifying such components is quickly realized when reviewing the training literature. Rakovshik and McManus (2010) criticized the training field for lacking detailed descriptions of training techniques used. With some exceptions (e.g., Harchik et al., 1992; Parsons & Reid, 1995; Parsons et al., 1993), the studies reviewed herein also lacked detailed descriptions of the procedures involved in ongoing support. Limited detail prevents researchers from replicating others' work and from conducting needed dismantling studies.

Despite lacking detailed descriptions, the previously reviewed studies referenced numerous types of ongoing support that may have accounted for the positive outcomes achieved. These included: supervision on specific cases (e.g.,, Morgenstern et al., 2001), group supervision (e.g., Lau et al., 2004), session tape review (e.g., Grey et al., 2008), role-plays (e.g., Beidas et al., 2012), instructor and/or peer feedback (e.g., Lau et al., 2004; Harchik et al., 1992), skill-building supervision (e.g., Mannix et al., 2006), on-site observation (e.g., Parsons & Reid, 1995), live teleconferencing supervision (e.g., Smith et al., 2012), phone consultation (e.g., Miller et al., 2004), consultation with experts in addition to case supervision with supervisors (e.g., Hawkins & Sinha, 1998), relapse prevention supervision (e.g., Luoma et al., 2007), supervision structure that paralleled CBT (e.g., Bradshaw et al., 2007), technical assistance on the adoption process (e.g., Dixon et al., 1999), peer supervision networks (e.g., Sanders et al., 2002), and question and answer e-mail forums (Sanders et al., 2002). This list provides brief descriptions of what are likely rich, complex processes.

Although findings from Miller et al. (2004) and Smith et al. (2012) point to the comparable potency of feedback and coaching as well as tape and live teleconferencing supervision, respectively, it largely remains unclear across the literature which specific components of supportive techniques enhance outcomes and whether, in their entirety, each technique of ongoing support is effective, whether each technique is equivalent to each other in terms of potency, and whether potency is enhanced by combining techniques or delivering them in certain ways (Weisz, Ugueto, Herren, Afienko, & Rutt, 2011). In line with the ecological perspective (Beidas & Kendall, 2010; Sanders et al., 2002), it is possible that different answers arise depending on the individual

characteristics of the trainers/supervisors, trainees, organizations, and clients. Findings regarding tape versus live teleconferencing supervision for counselors of various backgrounds highlight the importance of considering contextual factors (Carpenter et al., 2012).

For potential answers regarding effective ongoing support strategies, we look to the more established fields of supervision and behavioral consultation.

Tentative Answers from the Supervision Field

Given that the DI field is young, examinations of the role of ongoing support within training and the relative effectiveness of various types of ongoing support in DI efforts are limited. There is a body of research in the supervision field that may inform the DI field regarding effective elements of "ongoing support." Given the overlap of techniques found across different categories of ongoing support, research pertaining to supervision is informative for DI efforts and training approaches that incorporate supervision, consultation, coaching, and/or observation with feedback.

Before presenting the literature on the effectiveness of supervision, some caveats must be acknowledged. First, the amount of empirical research on the effects of supervision is also limited, as captured in the following statement: "there is a paradoxical lack of research and development regarding clinical supervision, considering its essential role in the development of mental health professionals" (Milne, 2008, p. 779). Second, due to the many methodological flaws found in supervision studies, it is difficult to draw firm conclusions. In a critical review of the methodological rigor of 144 supervision studies, Ellis, Ladany, Krengel, and Schult (1996) exposed numerous flaws (e.g., ex post facto designs with no random assignment or manipulation and numerous threats to

validity). An additional criticism of the supervision literature is that the dependent variables found in most studies include satisfaction ratings of the supervisees, self-rated skills, or supervisor-rated skills rather than examining supervisee skill via independent raters or examining the impact of supervision on client outcomes (Bickman, 1999). Thus, "readers should approach the empirical [supervision] literature with skepticism" (Ellis & Ladany, 1997, p. 496).

Bearing the limitations in mind, various reviews on supervision suggest some tentative conclusions regarding effective supervisory techniques. One review summarized available literature regarding the effect of supervision on trainee's attitudes, beliefs and skills, and client outcomes (Holloway & Neufeldt, 1995). The trustworthiness of the supervisor, as rated by trainees, emerged as a characteristic significantly related to trainee's perceptions of good supervision and to therapist competence as rated by supervisors. Additional characteristics valued by supervisees included supervisor expertness and interpersonal attractiveness. Those regarded as more successful trainers interrupted during tape reviews more often, focused on specific therapist behaviors, questioned therapists about their thought processes, and provided specific praise rather than global support. Supervision characteristics associated with supervisor-rated supervisee effectiveness and supervisor-rated client outcomes included direct instructional methods, corrective feedback, praise, reward, criticism, questioning, and specific directions. A similar review suggested that both inexperienced clinicians and experienced clinicians who are learning new skills value directive supervision (Spence et al., 2001). Although these reviews provided preliminary support for the effects of supervision, they also exposed the many limitations of the studies, including failure to

adequately assess therapist skill and client outcomes and lack of rigorous, empirical designs and standardized measures. Also, neither review employed a systematic approach, which limits the conclusions that can be drawn from them.

A systematic review of 28 studies, which focused particularly on CBT supervision, lends further credence to the effects of supervision (Milne & James, 2000). All studies on supervision included objective outcome measures, which were defined as either involving direct observation or an equivalent 'hard' measure. Outcomes included reaction evaluations (e.g., satisfaction), learning evaluations (e.g., knowledge), work performance evaluations (e.g., therapist behaviors), and other evaluations (e.g., cost-effectiveness). Although the review did not examine the effect sizes associated with each supervisory technique or the relative effectiveness of each technique, it listed the frequency of supervisory techniques found across all studies. The most frequently used enactive (i.e., behavior-based) techniques included feedback, meetings, and role-plays. The most frequently used symbolic (i.e., word-based) techniques included lectures, discussions, and written or verbal instructions. The most frequently used iconic (i.e., image-based) techniques included live or video modeling. Other techniques mentioned in the studies included: observing/collecting data, self-monitoring, written exercises, behavioral rehearsal, homework, case presentations, written guidelines, question and answer, self-management skills, live supervision, and prompts. Enactive techniques were more commonly used than either symbolic or iconic techniques. Given the greater frequency of enactive techniques across studies, it is possible that enactive techniques are more effective than either symbolic or iconic techniques. Future empirical work can

examine the relative effectiveness of these techniques as well as the optimal combination of techniques for various trainees.

In a later review, Milne, Aylott, Fitzpatrick, and Ellis (2008) again searched the literature for empirical studies on supervision that had demonstrated benefits using objective measures on supervisees' learning, attitudes, motivation, or skills, or client outcomes in the last 20 years (objective defined as based on either direct observation or an equivalent 'hard' measure). Of note, client outcomes were not found in most studies. Because their focus was exclusively on supervision, they excluded any studies on training or mentoring. Twenty-six supervisory techniques were identified across 24 studies. Overall, these techniques fell into the categories of teaching (75% of the studies), corrective feedback (63% of the studies), and observing (42% of the studies). In order of frequency, from highest to lowest, the 26 techniques were as follows: training (i.e., teaching and instructing), feedback, observing, goal-setting, question-and-answer, modeling, planning, praise and reinforcement, discussion, prompts, role-play, explanation, monitoring, review and reflection, summarizing, challenging, self-collaborating, confidence building, disagreeing, formulating, and understanding. The average number of methods found across studies was 5.4. The review also identified 35 contextual variables found to moderate the effects of supervision across studies. Milne et al. (2008) posited that within the context of these moderating variables, the supervisory techniques yielded positive outcomes primarily through assisting the supervisee in moving through Kolb's (1984) learning cycle. Although this review did not identify the relative effectiveness of each technique, it did identify the supervisory techniques used in

effective studies and, thus, can guide the selection of supervisory techniques for future comparative and dismantling studies.

Additional effective supervisory characteristics were identified in a systematic review on studies conducted between 1980 and 2006 that examined the effectiveness of supervision on outcomes based on either objective measures or self-report (Wheeler & Richards, 2007). Due to its particular focus on psychologists and counselors, studies were excluded if supervisees were psychiatrists, psychiatric nurses, family therapists, occupational therapists, or other health professionals. Also, all studies had to focus on work with individual, real clients. The search yielded 18 studies on a primarily trainee population. The outcome categories examined included: self-awareness, skill, self-efficacy, timing and frequency of supervision, theoretical orientation, and support and outcome for the client. With regard to self-awareness, supervision was found to increase self-awareness, particularly when it employed a parallel process approach. With regard to self- or supervisor-rated skill, use of the parallel process approach and supervisory working alliance were found to increase skill. Supervisee self-efficacy was associated with task-centered supervision, good rapport with the supervisor, and high interpersonal attractiveness of the supervisor. In terms of timing, findings suggested that follow through from supervision to the therapy session was more likely to occur when supervision occurred close before the session on the same day. Also, client attendance was positively associated with amount of supervision. One study (Steinhelber, Patterson, Cliffe, & LeGoullon as cited in Wheeler & Richards, 2007) found that congruence of theoretical orientation between supervisor and supervisee was positively associated with client outcomes. According to supervisee perceptions, emotional support from

supervisors contributed to improved client outcomes. Overall, this review highlights potentially important aspects of supervision. Given that the majority of the studies focused on trainees, these findings may be particularly pertinent to DI training efforts. However, based on their analysis of methodological rigor, Wheeler and Richards (2007) classified only two of the 18 studies as very good, limiting the conclusions that can be drawn.

Recent work suggests the importance of supervisor discussion of techniques as contributing to treatment adherence (Anderson, Crowley, Patterson, & Heckman, 2012). The study found that during supervision therapist discussion of treatment techniques predicted treatment adherence in the session prior to supervision whereas supervisor discussion of techniques predicted treatment adherence in the session after supervision. Thus, supervisors appear to promote treatment adherence by discussing which techniques to implement prior to the therapy session.

Regarding client outcome as the litmus test of effective supervision, a review of 10 supervision studies explicitly examined the impact of supervision on client outcomes (Freitas, 2002). No firm conclusions could be drawn due to the numerous methodological flaws found across studies. However, two of the more rigorous studies examined the role of supervision in social work practice (Harkness & Hensley, 1991; Harkness, 1997). The first found that client-focused supervision, as opposed to mixed-supervision (half of which focused on clients and half of which focused on administrative aspects), was associated with client satisfaction with treatment (Harkness & Hensley, 1991). In a reexamination of this data using a cross-lagged panel design, Harkness (1997) reported that client-focused supervision was positively associated with counselor-client

partnerships and client goal attainment, both of which were rated by the client. Additionally, supervisory problem-solving was positively associated with client goal attainment. Supervisor empathy was negatively associated with the skill of counselor-client partnership as rated by the client. This finding is consistent with findings from the MST literature (Schoenwald et al., 2004) and may account for supervisor empathy increasing in response to counselor skill deficits. The implications from this review are that supervision practice would benefit from adopting a client focus and incorporating problem-solving.

Reviews of supervision outside the field of psychology offer similar suggestions regarding effective supervision. For example, provision of feedback, especially over time and when given by an authoritative source, improved physician performance, as assessed by clinical processes, clinical outcomes, patient satisfaction, and costs, in a majority of the studies reviewed (Veloski, Boex, Grasberg, Evans, & Wolfson, 2006). In an interdisciplinary review of supervision spanning medicine, nursing, education, social work, and psychology, the following elements of supervision were considered effective: focused feedback, direct guidance on clinical work, joint problem-solving, linking theory to practice, and the supervisee having some control over the supervisory process (Kilminster & Jolly, 2000). These authors asserted that "the quality of the supervision relationship is probably the single most important factor for the effectiveness of supervision, more important than the supervisory methods used" (p. 835). This conclusion is odds with some previous findings (e.g., Harkness, 1997), implying that the effects of the supervisory relationship on clinician skill and client outcome are complex and likely influenced by contextual factors. Unfortunately, of the 300 articles identified

by Kilminster and Jolly's (2000) search, very few were empirical. Thus, research is needed before firm conclusions can be reached.

In addition to examining effective supervision, valuable lessons are gained from examining ineffective supervision. One study surveyed the supervisory experiences of 232 licensed psychologists and discovered the following aspects of supervision considered to be least helpful: interpersonal conflicts between supervisor and supervisee, supervisor lack of availability, theoretical or conceptualization disagreements, disorganized supervisors, supervisors who were too vague or nondirective, personality conflicts, administrative issues taking up too much time, supervisor lack of expertise, and too much time spent discussing the supervisor's work as opposed to the supervisee's work (McCarthy, Kulakowski, & Kenfield, 1994). Other reviews identified the following ineffective supervisory practices, based on trainee perceptions: rigid, self-concealing, prohibitive, indirect, theoretical (as opposed to practical), critical, less supportive, less instructional, and less interpretive (Watkins, 1997; 2011). Clinical and counseling students' self-reported worst supervisory experiences were marked by the supervisor being sexist, the supervisor focusing on the supervisee's weaknesses, a strong emphasis on evaluation, lack of tolerance for differing views, and behaviors that were indirect or avoidant. Supervisors rated lowest according to the Psychotherapy Supervision Inventory (Shanfield, Mohl, Matthews, & Hetherly, 1989) did not consistently monitor supervisees' concerns, asked mostly close-ended questions, and tended to be superficial, distracting, distant, and formal. They also tended to give mini-lectures that were unrelated to the topic at hand. Given that reviews of ineffective supervision were based solely on

supervisee perceptions, empirical work is necessary to examine whether these supervisory characteristics negatively impact therapist skill and/or client outcomes.

Summary. "Who needs what type of supervision, from whom, how often, at what cost, and to what benefit" (Spence et al., 2001, p. 150). Unfortunately, the literature does not provide clear answers and is marred by limitations, including a lack of empirical research, a lack of examination of clinician skills as rated by independent evaluators, and a lack of concrete information on client outcomes. Though most of the research has relied on self-report, reviews suggest that supervision has some positive effects on therapist attitudes and skill and on client outcomes. It appears that enactive, directive forms of supervision that include problem-solving and focused feedback are valued by supervisees and have beneficial effects on supervisees and potential effects on clients. We do not yet know the differential potency of the various supervisory techniques employed, but we have a promising list of techniques with which to guide future research.

Given that ongoing support appears to improve outcomes, the DI field would benefit from future studies examining the differential potency of the various supervisory techniques. Supervisory techniques that merit future research include client-focused versus administrative supervision, varying levels of feedback and praise, and employing various approaches to supervision (enactive vs. iconic vs. symbolic).

Tentative Answers from the Consultation Field

The behavioral consultation field has investigated the differential effectiveness of various forms of ongoing support. Given that behavioral consultation and DI training both seek to maximize behavior change in trainees, this work may offer guidelines for DI

training. Empirical work conducted thus far points to the importance of performance-based feedback in ongoing support efforts.

A preliminary study found that the addition of performance-based feedback to data review resulted in improved implementation of behavioral interventions in the school setting (Noell, Duhon, Gatti, and Connell, 2002). Eight elementary school teachers who had referred disruptive students to consultation participated. Behavioral interventions tailored to each student were developed during individual meetings with consultants and teachers. Following creation of the intervention plan, each teacher participated in a training day, during which time the consultant helped the teacher implement the intervention. Thereafter, implementation was monitored by collecting the daily behavior monitoring records from each teacher and examining how thoroughly they were completed. If implementation rates were low, teachers participated in data review meetings with consultants until implementation increased and maintained. Data reviews consisted of brief morning meetings during which time the consultant would review the previous day's behavior monitoring record and discuss how implementation was going. If implementation failed to improve, performance feedback was added to the data review meetings. Performance feedback involved discussing graphs of student behavior and the percentage of steps completed by the teacher each day, praising the teacher for the steps they completed well, and identifying areas in need of improvement. Results indicated that implementation rates were low immediately following training. Although participation in data review meetings resulted in improved implementation for some teachers, the addition of performance feedback demonstrated stronger improvements in implementation rates.

Another study randomly assigned teachers to one of three follow-up conditions after receiving training on how to conduct behavioral interventions: (1) weekly meetings to discuss implementation and student progress and to address teacher questions, (2) weekly meetings that incorporated the same content as condition one with the addition of social influencing procedures designed to strengthen teachers' commitment to implementation, or (3) performance feedback in the form of reviewing graphs, praising the teacher for the steps they completed well, and identifying areas in need of improvement (Noell et al., 2005). Of note, in contrast to the first two conditions, which consisted of weekly meetings, the performance feedback condition involved daily meetings that were gradually faded following improved implementation rates. Implementation rates (based on how completely the behavior monitoring records were filled out) and student outcomes (based on direct observations of behavior at baseline and at 3-week follow-up) were statistically higher in the performance feedback condition as opposed to the other two conditions, which did not statistically differ from each other.

Summary. Findings from the consultation field point to performance-based feedback as a promising technique for improving and maintaining intervention implementation rates following training. Performance feedback resulted in greater effects than data review meetings and meetings that emphasized implementation commitment. However, given that the frequency of contact differed across conditions, future studies that involve equal allocation of time are needed before firm conclusions can be made regarding the critical role of performance feedback.

Future Directions

The present review of the effects of training on clinician and client outcomes identified the importance of incorporating ongoing support into training efforts. However, given the limitations of existing research (e.g., methodological weaknesses, failure to examine client outcomes), no firm conclusions can be drawn regarding how best to train clinicians in EBPs. The following recommendations and questions are posed to guide future work.

Conduct Multi-Faceted Research

The literature indicates the effectiveness of various training approaches (e.g., multi-component approaches or approaches that include ongoing support; Herschell et al., 2010), but even the most effective training does not result in proficiency (i.e., acceptable levels of skill and adherence) in all trainees (Beidas & Kendall, 2010). What accounts for this? Is this attributable to the treatment being trained, the training approach or techniques, the trainers, the trainees, the organization in which the trainees work, the clients with whom they work, or larger policy issues?

Questions remain regarding which components of ongoing support are critical to achieve positive outcomes. The supervision literature suffers from both a lack of quantity and quality of empirical research (Ellis et al., 1996), a fact that limits conclusions. Recent reviews of supervision (e.g., Milne et al., 2008) provide lists of the various enactive, symbolic, and iconic supervision techniques employed in "effective" supervision, yet it remains unclear which of these methods or which combination of these methods truly accounts for such effectiveness. Although the consultation field points to the importance of performance feedback, due to unequal allocation of time spent across conditions, it

remains unclear whether performance feedback is superior to other types of ongoing support. To inform the field, researchers are encouraged to conduct comparative and dismantling studies. Future studies would also benefit from designs with equal allocation of time spent in training across methods in order to determine whether enhanced outcomes are due specifically to ongoing support or attributable to a greater intensity of training.

Given the complexity of these questions, a systems-contextual approach (Beidas & Kendall, 2010; Sanders et al., 2002) is warranted in such future endeavors. A systems-contextual approach is holistic, taking into account not only the isolated training and/or ongoing support techniques employed but also considers the many contextual factors that influence the effect these techniques have on outcomes.

Improve the Assessment of Outcomes

Few studies, in both the training and supervision literature, examined client outcomes or clinician skill using psychometrically sound, objective measures. Failure to properly examine outcomes calls into question the ultimate impact of training and ongoing support. Although client outcomes are a step removed from training and supervision, and it is likely that effect sizes for training/supervision on client outcomes will be smaller than effect sizes capturing clinician behavior, it is recommended that researchers attempt to measure client outcomes. It is also recommended that objective measures of clinician skill and implementation be measured in light of discrepancies between clinician-reported use of EBPs and actual use assessed by independent evaluators (Hurlbut, Garland, Nguyen, & Brookman-Frazee, 2010).

It is also important for future DI studies to incorporate cost-benefit analyses (Addis, Wade, & Hatgis, 1999). A significant investment of time and money is made in training and ongoing support efforts, but is this investment warranted? Research that identifies which training approaches and ongoing support techniques work best for whom, by whom, under which circumstances will allow us to tailor DI approaches so as to maximize gains. A recent cost-effectiveness study indicated that either self-training or expert-led training and supervision could be considered the most cost-effective strategy for training clinicians in motivational interviewing, depending on the threshold value of decision makers (Olmstead, Carroll, Canning-Ball, & Martino, 2011). Determining threshold values, thus, is important for concluding what training and consultation approaches are cost-effective.

Conduct Theory- or Heuristic-Driven Research

Research on training and ongoing support will be strengthened through the development of theory-based hypotheses (Ellis, 1991). In addition to methodological flaws and inadequate statistical analyses, a common weakness found in the supervision literature reviewed here was the failure to state clear hypotheses based on sound theory (Ellis et al., 1996). To maximize the quality of research on training and ongoing support, theories and models should guide the development of operational hypotheses and sound measures. Recent work has adopted a theory-driven approach (e.g., James, Milne, Marie-Blackburn, & Armstrong, 2007), and this should be continued.

The Consolidated Framework for Implementation Research (CFIR) can also guide research (Beidas, Koerner, Weingardt, & Kendall, 2011). The CFIR (see Damschroder et al., 2009) lists five domains commonly found across implementation

theories: intervention characteristics, the outer setting, the inner setting, individual characteristics, and the implementation process. The CFIR encourages DI researchers to use a contextual framework and examine variables in each of the five domains.

Attend to Issues of Scalability

A key issue in DI efforts concerns scalability, which refers to quickly increasing the number of trainees without significantly increasing the resources necessary to train people (Weingardt, Cucciare, Bellotti, & Lai, 2009). Given that the ultimate goal is to reach all individuals in need of services, it is important to examine how to bring training to scale while maintaining effectiveness and feasibility (Beidas et al., 2011). A promising area for scalability is the use of technology. What role can technology play in both the acquisition and maintenance of skill? Cucciare, Weingardt, and Villafranca (2008) suggest that technology-based platforms offer the same opportunities for blended learning (integration of multiple learning methods) as traditional in-person trainings. Additionally, they describe technology-based platforms as being cost-effective in that they can reach many people quickly for little cost. Given these advantages, research on the effectiveness of technology-based training and ongoing support platforms on therapist skill acquisition and client outcomes is encouraged.

Future research is encouraged by the positive findings from initial studies. For example, Sholomskas et al. (2005) reported beneficial outcomes when training clinicians using a website platform. Another web-based training program for substance abuse counselors has demonstrated effectiveness (Larson et al., 2009). Dimeff et al. (2009) found that online training was comparable to an instructor-led training program with regard to adherence and competence in a performance-based role-play for clinicians

learning DBT. Clinicians in the online training condition evidenced greater knowledge acquisition than those in the instructor-led condition, demonstrating the effectiveness of an online platform. Similarly, Beidas et al. (2012) found roughly equivalent outcomes in trainees who completed computer-based training (CBT4CBT; Kendall & Khanna, 2008) and trainees who completed in-person training.

A common barrier to using skills following training cited by clinicians in the Dimeff et al. (2009) study was the lack of supervision offered across conditions. Given the effectiveness of the online training program, it prompts the question concerning whether online support programs would yield similar effects. Weingardt et al. (2009) found improved CBT knowledge acquisition and self-efficacy in substance abuse counselors who participated in online training and four web conferencing supervision sessions, and Beidas et al. (2012) found that web conferencing platform for consultation was both feasible and beneficial. Other work points to the promising use of web platforms for ongoing support (Abbass et al., 2011).

Conclusion

The President's New Freedom Commission on Mental Health (2003) set forth an ambitious goal for transforming mental health care in America by making EBPs the standard of care. This review addressed a critical step in achieving that goal—training community clinicians in the delivery of EBPs. Research suggests that the most effective training approaches to date incorporate ongoing support following initial training. However, questions remain regarding which specific techniques contribute to improved outcomes. Reviews of the training, supervision, and consultation literatures yield only tentative conclusions. Additional research is necessary to answer the many remaining

questions regarding which training and support methods, by whom, for whom, under which circumstances, and to what costs, are most beneficial. Conducting further empirical work in this area will bring us closer to answering these questions and, consequently, allow us to maximize DI efforts and improve both the well-being of individuals with mental health problems and society-at-large.

CHAPTER 3

RESULTS

Results

CCRS Validity and Reliability

To evaluate its validity, three licensed psychologists experienced in providing consultation and/or supervision reviewed the CCRS and rated on 7-point Likert scales from 0 (*strongly disagree*) to 6 (*strongly agree*) whether it (1) covered all it should, (2) allowed for sufficient variability, (3) accurately reflected consultation content, and (4) accurately reflected consultation techniques (see Table 1).

Table 1

CCRS Validity Ratings

Item	Mean	SD	Range
How comprehensive is the CCRS?	5.67	0.47	5.00 to 6.00
Does the CCRS allow for sufficient variability in the assessed constructs?	5.67	0.47	5.00 to 6.00
How much does the CCRS accurately reflect content present during consultation?	5.33	0.47	5.00 to 6.00
How much does the CCRS accurately reflect methods used during consultation?	6.00	0	--

Note. CCRS = Consultation Coding and Rating System. Responses on 7-point Likert scale from 0 (*not at all*) to 6 (*extensively*).

Interrater reliability for the CCRS ratings was established between the primary investigator of this study and the three independent coders prior to initiating the official coding of calls. Coders were blind to the skill and adherence data of clinicians. All independent observers met an intraclass correlation (ICC) or kappa coefficient criterion of $\geq$.70 at the outset of the study on a sample of 12 calls for variables pertinent to the current study, which indicates substantial inter-rater reliability (Landis & Koch, 1977).

ICC inter-rater reliability was used for continuous variables whereas kappa coefficients were used for categorical variables. The ICC reliability score for the variable of interest was .92 for individual clinician involvement. The mean kappa coefficients for variables of interest were .98 for therapist-led role-plays, .98 for consultant-led role-plays, and .83 for didactics. A random reliability check was implemented during the coding phase such that the investigator's calls randomly overlapped with 10 calls of each of the other coders. Analyses revealed that reliability was maintained (see Tables 2 and 3).

Table 2

Mean Observer Kappa Coefficients for CCRS Minute-to-Minute Codes

Item	Before Coding	Random Check
Content		
CBT Model	.84*	.66
Identification of anxious thoughts and arousal	.65	.63
Relaxation	.92*	.90*
Coping thoughts	.83*	.87*
Problem-solving	.85*	.83*
Exposure	.90*	.82*
Homework	.75	.74
Positive Reinforcement	.80*	.78
Case Review	.85*	.83*
Case appropriateness	.68	.50
Organizational systems	.52	.51
Flexibility	.48	.58
Barriers	.35	.31
Technical Issus	.65	.72
Active Methods		
Therapist-led Roleplay	.99*	.98*
Consultant-led Roleplay	.99*	.98*
Modeling	.68	.69
Passive Methods		
Informing	.71	.60
Didactics	.86*	.80*
Mixed/Other Methods		
Case discussion of consultant example	.83*	.66
Case discussion of therapist example	.93*	.92*
Feedback	.73	.74*
Praise	.61	.56
Prompts	.65	.78*
Supporting	.53	.53

Note. CCRS = Consultation Coding and Rating System. CBT = cognitive-behavioral therapy. * Each coder met the .70 reliability threshold.

Table 3

Mean Intra Class Correlations for CCRS Summary Ratings

Item	Before Coding	Random Check
CBT model	.68	.82*
CBT content	.85*	.54
Case review	.90*	.85*
Case discussion of therapist example	.93*	.97*
Case appropriateness	.70	.60
Flexibility	.17	.72
Barriers	.27	.18
Case discussion of a consultant example	.73	.45
Informing	.63	.12
Didactics	.91*	.85*
Active learning methods	.36	.85*
Active learning methods + case discussion	.55	.33
Supporting	.32	-.03
Overall clinician involvement	.73	.08
Individual clinician involvement	.94*	.92*

Note. CCRS = Consultation Coding and Rating System. CBT = cognitive-behavioral therapy. * Each coder met the .70 reliability threshold.

Participants

Of the 115 participants in the Beidas et al. (2012) study, the 99 participants who completed at least one consultation call and completed post-consultation measures served as the participants of the current study when testing hypotheses pertaining to the prediction of adherence, skill, self-efficacy, and satisfaction. Subsequent to the Beidas et al. (2012) study, 50 (43%) clinicians completed a 2-year follow-up interview. These clinicians served as participants when testing hypotheses regarding implementation rates and exploratory analyses regarding maintenance of CBT knowledge and attitudes toward EBPs.

Demographics. All participants were from urban and suburban areas in the northeastern United States. Ages ranged from 23 to 75 (M = 35.92, SD = 11.36) and 91.9% were female (N = 91). Clinicians self-identified as Caucasian (69.7%), African-

American (13.1%), Hispanic/Latino (2%), Asian (5.1%), Native American/Alaskan (1.0%), and Other (4.0%). Ethnicity data was missing for 5.1% of participants. Information regarding these demographics for participants in the original sample and the 2-year follow-up sample can be seen in Table 4. Compared to participants who attended no consultation calls, those who attended at least one call were significantly less likely to be Hispanic/Latino. Compared to participants who completed the 2-year follow-up, those who did not were significantly more likely to be Hispanic/Latino. Other demographic variables were similar across samples.

Educational Status. With regard to educational degree, 59.6% had a master's degree, 18.2% were enrolled in a graduate program, 5.1% had a medical degree, 4.0% had a doctorate in philosophy, 5.1% had a doctorate in psychology, 2.0% had a doctorate in education, and 6.1% had an "other" degree. With regard to state licensure, 28.3% were licensed. Information regarding these demographics for participants in the original sample and the 2-year follow-up sample can be seen in Table 4. Chi Square analyses comparing those who attended at least one consultation call versus those who did not as well as analyses comparing those who completed the 2-year follow-up versus those who did not indicated similar educational and licensure status across samples.

Clinical Experience. Therapists reported previous clinical experience ranging from 0 to 396 months (M =65.12, SD = 86.18). Approximately half of the clinicians (49.5%) reported having previously treated an anxious youth. None reported previously receiving supervision on the use of the *Coping Cat* (Kendall & Hedtke, 2006) and few reported having previously used the *Coping Cat* to treat anxious youth, with the number of cases ranging from 0 to 2 (M = .12, SD = .46). Clinicians reported high identification

with CBT (*M* = 4.96, *SD* = 1.69; range = 1-7). With regard to caseload, clinicians reported carrying an active caseload of 0 to 150 clients (*M* = 18.44, *SD* = 23.37). Clinicians reported receiving 0 to 25 hours of supervision per week (*M* = 1.65, *SD* = 2.81) and attending 0 to 600 hours of workshops in the past 2 years (*M* = 29.43, *SD* = 81.38). Information regarding these demographics for participants in the original sample and the 2-year follow-up sample can be seen in Table 4. Compared to those who attended at least one consultation call, participants who attended no calls reported fewer previous Coping Cat cases. Compared to those who participated in the 2-year follow-up, participants who declined or failed to respond the study invitation reported significantly higher levels of identification with CBT and more previous hours of workshop training at baseline. Other clinical experience variables were similar across samples.

Table 4

Demographic Data

Variable	Overall Sample (N=115)	Coding Sample (N=99)	2-Year Follow-Up Sample (N=50)
	n(%)	n(%)	n(%)
Sex			
Male	11(9.6%)	8(8.1%)	4(8%)
Female	104 (90.4%)	91(91.9%)	46(92%)
Race			
Caucasian	77(67%)	69(69.7%)	37(74%)
African American	15(13%)	13(13.1%)	4(8%)
Hispanic/Latino	6(5.2%)	2(2%)	0
Asian	5(4.3%)	5(5.1%)	4(8%)
Native American/Alaskan	1(.9%)	1(1%)	0
Other	6(5.2%)	4(4%)	2(4%)
Missing	5(4.3%)	5(5.1%)	3(6%)
Educational Status			
Enrolled in graduate school	18(15.7)	18(18.2%)	9(18%)
Master's degree	72(62.6%)	59(59.6%)	32(64%)
Doctor of philosophy	6(5.2%)	4(4%)	3(6%)
Doctor of psychology	5(4.3%)	5(5.1%)	2(4%)
Doctor of education	2(1.7%)	2(2%)	2(4%)
Medical doctor	6(5.2%)	5(5.1%)	1(2%)
Other degree	6(5.2%)	6(6.1%)	1(2%)
State Licensed	33(28.7%)	28(28.3%)	15(30%)
Previously treated anxious youth	58(50.4%)	49(49.5%)	29(58%)
	M(SD)	M(SD)	M(SD)
Age	35.93(11.36)	35.56(11.63)	35.09(10.85)
Months of clinical experience	65.46(82.38)	65.12(86.18)	69.59(86.85)
Identification with CBT	4.86(1.68)	4.96(1.69)	4.77(2.02)
Caseload	19.48(23.72)	18.44(23.27)	18.65(18.15)
Supervision per week	1.57(2.66)	1.65(2.81)	1.29(1.33)
Hour attendance at workshops	28.83(76.18)	29.43(81.38)	15.97(19.54)
Previous cases treated with CC	.11(.43)	.12(.46)	.08(.35)
Previous supervision on CBT	0	0	0

Note. CBT = cognitive-behavioral therapy. CC = Coping Cat.

Descriptive Analyses

CCRS. The average number of role-plays completed by therapists as either the therapist or the child across all calls they attended was .66 (*SD* = .82, range = 0-3). The average number of times therapists participated in a role-play in the role of therapist was only .29 (*SD* = .50, range = 0-2). With regard to frequency counts, 2% of clinicians participated in two role-plays as the therapist, 25% participated in one role-play as the therapist, and 72% participated in no role-plays as a therapist. Table 5 shows the average minutes and proportions of time per consultation call spent discussing each content area and utilizing each consultation method as coded by the CCRS. These data represent the average per participant across all the calls in which they participated.

Table 5

CCRS Mean Minutes and Ratios of Calls Dedicated to Content Areas and Methods Per Call Across Participants

Item	Minutes		Ratios	
	M (SD)	*Range*	*M (SD)*	*Range*
Content				
CBT model	.71 (1.19)	0-5	.01 (.02)	0-.08
Identifying somatic thoughts/arousal	9.34 (6.77)	0-27	.16 (.11)	0-.46
Relaxation	5.68 (4.20)	0-22	.10 (.07)	0-.35
Coping thoughts	6.81 (4.94)	0-25	.12 (.09)	0-.42
Problem-solving	3.88 (5.33)	0-30	.07 (.09)	0-.49
Exposure	15.01 (9.61)	0-42	.29 (.21)	0-1
Homework	2.96 (2.90)	0-14	.05 (.05)	0-.24
Positive reinforcement.	5.16 (4.07)	0-22	.09 (.07)	0-.37
Case Review	24.75 (12.30)	0-55	.43 (.20)	0-.87
Case appropriateness.	4.16 (4.26)	0-19	.07 (.07)	0-.34
Organizational Systems	2.92 (2.63)	0-12	.05 (.05)	0-.23
Flexibility	12.25 (9.30)	0-32	.23 (.20)	0-1
Barriers	1.63 (2.39)	0-10	.03 (.04)	0-.19
Technical issues	6.76 (3.67)	0-21	.12 (.06)	0-.37
Active Methods				
Therapist-led role-play	1.46 (4.01)	0-24	.03 (.07)	0-.44
Consultant-led role-play	2.28 (4.21)	0-16	.04 (.08)	0-.50
Total role-plays	3.75 (6.23)	0-34	.07 (.11)	0-.56
Modeling	5.85 (3.36)	0-16	.11 (.06)	0-.29
Passive Methods				
Informing	27.56 (9.32)	3-51	.51 (.19)	.13-1
Didactic	10.63 (8.83)	0-37	.22 (.22)	0-1
Mixed/Other Methods				
Case discussion of therapist example	36.31 (16.06)	0-63	.63 (.26)	0-.98
Case discussion of consultant example	4.88 (4.21)	0-21	.09 (.09)	0-.57
Feedback/Suggestions	28.11 (10.44)	0-51	.49 (.16)	0-.82
Prompts/Probes/Questions	24.02 (7.60)	4-49	.43 (.11)	.16-.78
General Praise Statements	11.82 (5.90)	0-28	.21 (.10)	0-.48
Supporting	6.00 (3.83)	0-18	.11 (.07)	0-.33
Call length	55.12 (9.11)	23-66	--	--

Note. CCRS = Consultation Coding and Rating System. CBT = cognitive-behavioral therapy.

Table 6 shows the average summary ratings per call yielded from the CCRS across participants.

Table 6

CCRS Mean Summary Ratings Per Call Across Participants

Item	*M (SD)*	*Range*
CBT model	.42 (.61)	0-2
CBT content	4.21 (.98)	2-6
Case review	3.53 (1.24)	0-6
Case discussion of therapist example	4.39 (1.51)	0-6
Case appropriateness	1.40 (1.03)	0-5
Flexibility	2.43 (1.34)	0-6
Barriers	.65 (.76)	0-2
Case discussion of a consultant example	1.82 (1.03)	0-5
Informing	4.33 (.87)	2-6
Didactics	2.42 (1.71)	0-6
Active learning methods	2.48 (1.15)	0-5
Active learning methods + case discussion	4.50 (1.15)	1-6
Supporting	3.24 (.79)	1-5
Overall clinician involvement	3.36 (.96)	1-6
Individual clinician involvement	2.02 (1.42)	0-6

Note. CCRS = Consultation Coding and Rating System. CBT = cognitive-behavioral therapy.

ITAY-R. Table 7 provides frequency counts for data retrieved from the ITAY-R for the therapists who participated in the 2-year follow-up.

Table 7

ITAY-R Frequency Data

Item	Total Number of Respondents	N(%)
Provided therapy to youth in the past year	50	42 (84%)
Unable to complete CBT with a client?	39	28 (71.8%)
Reasons for prematurely ending		
The child abruptly ended treatment without reason	28	6 (21.4%)
The child did not like the treatment	28	8 (28.6%)
The treatment involved too many sessions	28	11 (39.3%)
The sessions were too long	28	7 (25%)
The child did not respond to treatment	28	12 (42.9%)
The treatment was not developmentally appropriate	28	9 (32.1%)
You did not feel competent to deliver the treatment	28	2 (7.1%)
Comorbid issues became the target of treatment	28	17 (60.7%)
Lacked supervision	28	6 (21.4%)
Other	28	20 (71.4%)
Percentage who sought additional training in youth anxiety since ending training study	50	23 (46%)
% who decided to specialize in anxiety either prior to entering or since ending the training study	50	8 (16%)

Note. ITAY-R = Identification and Treatment of Anxious Youth – Revised.

Table 8 provides means and standard deviations for information pertaining to caseloads and treatment of anxious youth as collected by the ITAY-R at the 2-year follow-up.

Table 8

ITAY-R Means and Standard Deviations

Item	M (SD)	Range
Average child/adolescent caseload per week	13.95 (15.65)	0-75
% of youth caseload involving 7-17 year old anxious youth	44.65 (31.65)	0-100
% of these anxious youth treated with CBT	88.72 (25.90)	5-100
Minimum number of CBT sessions	7.31 (7.67)	1-30
Maximum number of CBT sessions	24.86 (18.55)	4-80
Average/typical number of CBT sessions	15.68 (11.55)	2-40
% of these anxious youth treated with CC	27.56 (33.83)	0-100
Minimum number of CC sessions	5.73 (4.45)	1-16
Maximum number of CC sessions	14.04 (7.70)	1-30
Average/typical number of CBT sessions	9.96 (5.35)	1-18
% of CC cases who completed full program	32.12 (37.16)	0-100
% of anxious youth under age 7 treated with CBT	52.68 (44.66)	0-100
% of anxious adult clients treated with CBT[1]	84.08 (29.00)	20-100
Extent to which, on average, following components of CBT with anxious youth over the last year: [2]		
Identification and management of somatic arousal	5.03 (1.09)	2-6
Identification and cognitive restructuring of self-talk	4.54 (1.25)	2-6
Problem-solving anxiety-provoking situations	4.56 (1.41)	0-6
Conducting imaginal exposures	2.49 (1.30)	0-4
Conducting behavioral/in vivo exposures	3.03 (1.75)	0-6
Utilizing positive reinforcement	5.03 (1.35)	2-6

Note. ITAY-R = Identification and Treatment of Anxious Youth – Revised. Based on participants who reported treating anxious youth in the previous year. [1] Based on participants who reported treating anxious adults in the previous year. [2] Rated on 7-point Likert scale from (*not at all*) to 6 (*extensively*).

Table 9 provides means and standard deviations of therapist ratings of barriers and facilitators of treatment implementation since ending the training study as gathered from the ITAY-R.

Table 9

ITAY-R Barriers and Facilitators to Treatment Implementation Since Ending Study

Item	M (SD)	Range
Barriers		
Had doubts regarding usefulness of the treatment	.60 (1.30)	0-6
Treatment was too involved/required too many resources	1.43 (1.64)	0-6
The treatment was inappropriate for clientele	1.76 (1.90)	0-6
Did not have support from organization	1.00 (1.84)	0-6
Lacked confidence in ability to deliver the treatment	.87 (1.35)	0-6
Supervision on CBT/CC was not available	.98 (1.76)	0-6
The reimbursement structure for practice prevented delivery	.50 (1.35)	0-5
Other	1.89 (2.21)	0-6
Facilitators		
Believed in the usefulness of CBT/CC for anxious youth	5.38 (.92)	2-6
Received further training and/or kept up with literature	3.09 (1.97)	0-6
Clients were appropriate candidates for the treatment	4.19 (1.54)	0-6
Organization supported your use of CBT/CC	4.34 (1.83)	0-6
Were confident in your ability to deliver the treatment	4.55 (1.12)	2-6
Received supervision on CBT/CC	2.89 (2.31)	0-6
Delivering CBT/CC was feasible at work setting	3.76 (2.00)	0-6
Other	1.38 (2.33)	0-6

Note. ITAY-R = Identification and Treatment of Anxious Youth – Revised. Rated on 7-point Likert scale from (*not at all*) to 6 (*extensively*. Derived from all follow-up study participants. Data was missing for 3 of the 50 participants.

Statistical Assumptions

All regression data for primary were analyzed for normality of distribution using the Shapiro-Wilkes test of normality for main outcomes of interest. Post-consultation skill and consultation satisfaction did not meet assumptions of normality due to their negatively skewed distributions. Other primary outcomes (i.e., post-consultation adherence and self-efficacy) were normally distributed. A squared transformation was applied to both post-consultation skill and consultation satisfaction scores. After transformations, post-consultation skill met the assumption of normality but consultation satisfaction continued to fail to meet this assumption. All data analyses pertaining to post-consultation skill were derived using the transformed data. Raw data for consultation

satisfaction was used in all analyses. In addition to examining normality, potential outliers and influential cases were examined based on values of Cook's *D*, leverage, studentized residuals, studentized deleted residuals, and standardized DfBetas. No values emerged as consistent outliers and/or influential cases across all criteria (the maximum number of deviations across the five criteria was two). Therefore, all values were retained in the analyses. Lastly, diagnostics comparing variance inflation factors (VIFs) revealed all VIFs under the recommended threshold of ten (Hocking, 2003), indicating no issues of multicollinearity.

Primary Analyses

Multiple regression analyses were conducted to examine the relation between the proportion of dedicated to active learning techniques (i.e., role-plays) and outcomes of interest. Analyses controlled for the number of consultation calls attended given that this was a significant predictor of outcome in the Beidas et al. (2012) investigation. Analyses also controlled for therapists' post-training scores on outcomes of interest if they had been collected (i.e., post-training adherence and skill scores). In addition to examining the proportion of time dedicated to active learning techniques, the last step of each analysis included the proportion of time dedicated to didactics.

To investigate training-to-criterion, separate logistic regression analyses examined the relation between proportion of time dedicated to active learning techniques and training-to-criterion for adherence and skill, while controlling for number of consultation calls attended and post-training scores for adherence and skill. Although an 80% cutoff score for adherence is typically used when evaluating clinicians in randomized controlled trials (e.g., Walkup et al., 2008), a 70% cutoff score (4.2 out of 6) was adopted to allow

greater flexibility for community clinicians. A cutoff score of 3.5 out of 7 (50%), which is consistent with previous trials of CBT (e.g., Carroll et al., 2000; Sholomskas et al., 2005), categorized clinicians who exhibited acceptable levels of skill.

Table 10 shows the correlations between the study measures that were included in the primary analyses.

Table 10

Correlations Between Primary Study Variables

	Variable	1	2	3	4	5	6	7	8	9	10
1	Number of calls	-									
2	Post-training Adherence	.03	-								
3	Post-training Skill	.16	.82***	-							
4	Post-Consultation Adherence	.17	.46***	.50***	-						
5	Post-Consultation Skill[a]	.10	.45***	.47***	.83***	-					
6	Self-efficacy	-.03	.17	.26*	.05	.08	-				
7	Satisfaction	.28**	.08	.05	.10	.07	.22*	-			
8	Ratio of Role-plays	.12	.00	-.00	.05	.09	-.13	-.02	-		
9	Ratio of Didactics	.07	-.15	-.15	-.07	-.03	-.05	.14	.19	-	
10	Involvement	.01	.04	.17	-.03	.01	.13	.13	.08	-.29**	-

Note. [a] A squared transformation was used for post-consultation skill.
* $p < .05$. ** $p < .01$. *** $p < .001$.

Adherence. Multiple regression analyses indicated no significant relation between the proportion of time dedicated to active learning and post-consultation adherence scores. The only significant predictor in each of the models was the clinician's post-training adherence score (see Table 11), indicating that higher adherence scores at post-training predicted higher adherence scores at post-consultation. The proportion of time dedicated to didactics was also not a significant predictor and adding this variable to the model did not change the relation between proportion of time dedicated to active learning and post-consultation adherence.

Table 11

Multiple Regression Analyses Examining the Proportions of Time Dedicated to Active and Passive Learning Techniques During Consultation as Predictors of Treatment Adherence at Post-Consultation

	B	*SE B*	*β*	*p*
Step 1				
Constant	1.59	0.59		.01
Post-training adherence score	0.47	0.09	.45	.00
Number of consultation calls attended	0.11	0.06	.15	.09
Step 2				
Constant	1.52	0.62		.02
Post-training adherence score	0.48	0.09	.45	.00
Number of consultation calls attended	0.11	0.06	.15	.10
Ratio of time dedicated to role-plays	1.33	3.34	.04	.72
Step 3				
Constant	1.58	0.71		.03
Post-training adherence score	0.47	0.10	.45	.00
Number of consultation calls attended	0.11	0.06	.15	.10
Ratio of time dedicated to role-plays	1.44	3.42	.04	.70
Ratio of time dedicated to didactics	-0.33	1.88	-.02	.89

Note. Analysis includes those who participated in at least one consultation call and completed all study assessments, yielding 99 total participants. $R^2 = .23$ for Step 1 (*ps* < .001); $\Delta R^2 = .00$ for Step 2 (*ps* = .69); $\Delta R^2 = .00$ for Step 3 (*ps* = .86). * $p < .001$.

With regard to training-to-criterion, logistic regression analyses similarly indicated no significant relation between the proportion of time dedicated to active learning and achieving the 70% adherence threshold. The only significant predictor of training-to-criterion was therapists' post-training adherence score (see Table 12), indicating that higher adherences scores at post-training predicted a greater likelihood of achieving the 70% adherence threshold at post-consultation.

Table 12

Logistic Regression Analyses Examining the Proportions of Time Dedicated to Active and Passive Learning Techniques During Consultation as Predictors of Achieving Treatment Adherence Criterion at Post-Consultation

		95% CI for exp *b*			
	B (SE)	Lower	exp *b*	Upper	*p*
Included					
Constant	-2.22 (1.20)	--	0.11	--	.07
Post-training adherence score	0.63 (0.18)	1.31	1.87	2.66	.00
# of consultation calls attended	0.09 (0.10)	0.89	1.09	1.33	.39
Ratio of time dedicated to role-plays	0.80 (5.64)	0.00	2.23	140313.85	.89
Ratio of time dedicated to didactics	0.48 (3.16)	0.00	1.61	791.46	.88

Note. Analysis includes those who participated in at least one consultation call and completed all study assessments, yielding 99 total participants. R^2 = .14 (Cox & Snell), .20 (Nagelkerte). Model χ^2 (1) = 15.36, $p < .01$.

Skill. Multiple regression analyses indicated no significant relation between the proportion of time dedicated to active learning and post-consultation skill scores. The only significant predictor in each of the models was the clinician's post-training skill score (see Table 13), indicating that higher skill scores at post-training predicted higher skill scores at post-consultation. The ratio of time dedicated to didactics was also not a significant predictor and adding this variable to the model did not change the relation between proportion of time dedicated to active learning and post-consultation skill.

Table 13

Multiple Regression Analyses Examining the Proportions of Time Dedicated to Active and Passive Learning Techniques During Consultation as Predictors of Treatment Skill[a] *at Post-Consultation*

	B	*SE B*	*β*	*P*
Step 1				
Constant	8.29	4.71		.08
Post-training skill score	3.68	.73	.46	.00
Number of consultation calls attended	.12	.49	.02	.81
Step 2				
Constant	7.03	4.90		.15
Post-training skill score	3.69	.73	.47	.00
Number of consultation calls attended	.06	.50	.01	.90
Ratio of time dedicated to role-plays	24.01	25.68	.09	.35
Step 3				
Constant	6.37	5.61		.26
Post-training skill score	3.72	.74	.47	.00
Number of consultation calls attended	.05	.50	.01	.92
Ratio of time dedicated to role-plays	22.82	26.26	.08	.39
Ratio of time dedicated to didactics	3.57	14.46	.02	.81

Note. Analysis includes those who participated in at least one consultation call and completed all study assessments, yielding 99 total participants. [a] A squared transformation was used for post-consultation skill. $R^2 = .22$ for Step 1 (*ps* < .001); $\Delta R^2 = .01$ for Step 2 (*ps* = .35); $\Delta R^2 = .00$ for Step 3 (*ps* = .81).

With regard to training-to-criterion, logistic regression analyses similarly indicated no significant relation between the proportion of time dedicated to active learning and achieving the skill threshold. The only significant predictor of training-to-criterion was therapists' post-training adherence score (see Table 14), indicating that higher skill scores at post-training predicted a greater likelihood of achieving the skill threshold at post-consultation.

Table 14

Logistic Regression Analyses Examining the Proportions of Time Dedicated to Active and Passive Learning Techniques During Consultation as Predictors of Achieving Treatment Skill Criterion at Post-Consultation

		95% CI for exp *b*			
	B (SE)	Lower	exp *b*	Upper	*p*
Included					
Constant	1.21 (1.96)		3.35		.54
Post-training skill score	0.76 (0.24)	1.34	2.14	3.42	.00
# of consultation calls attended	-0.25 (0.20)	0.53	0.78	1.15	.21
Ratio of time dedicated to role-plays	-6.34 (7.84)	0	0.00	8249.15	.42
Ratio of time dedicated to didactics	0.78 (4.66)	0	2.18	20075.25	.87

Note. Analysis includes those who participated in at least one consultation call and completed all study assessments, yielding 99 total participants. R^2 = .13 (Cox & Snell), .23 (Nagelkerte). Model χ^2 (1) = 13.95, $p < .01$.

Self-Efficacy. Multiple regression analyses indicated no significant relation between any predictors (i.e., consultation call attendance, proportion of time dedicated to active learning, and proportion of time dedicated to didactics) and post-consultation self-efficacy scores (all $\beta < -.13$, all $p > .05$).

Satisfaction. Multiple regression analyses indicated no significant relation between proportion of time dedicated to active learning and consultation satisfaction. The only significant predictor in each of the models was the number of consultation calls attended (see Table 15), indicating that increased attendance predicted higher satisfaction ratings. The proportion of time dedicated to didactics was also not a significant predictor and adding this variable to the model did not change the relation between proportion of time dedicated to active learning and satisfaction.

Table 15

Multiple Regression Analyses Examining the Proportions of Time Dedicated to Active and Passive Learning Techniques During Consultation as Predictors of Consultation Satisfaction

	B	*SE B*	*β*	*P*
Step 1				
Constant	8.58	1.28		.00
Number of consultation calls attended	0.41	0.15	.28	.01
Step 2				
Constant	8.69	1.30		.00
Number of consultation calls attended	0.42	0.15	.29	.01
Ratio of time dedicated to role-plays	-2.45	4.91	-.05	.62
Step 3				
Constant	8.35	1.31		.00
Number of consultation calls attended	0.40	0.15	.27	.01
Ratio of time dedicated to role-plays	-5.58	5.38	-.12	.30
Ratio of time dedicated to didactics	3.71	2.66	.16	.17

Note. Analysis includes those who participated in at least one consultation call and completed the Consultation Feedback Form, yielding 91 total participants. $R^2 = .08$ for Step 1 (*ps* < .01); $\Delta R^2 = .00$ for Step 2 (*ps* = .61); $\Delta R^2 = .02$ for Step 3 (*ps* = .17).

Secondary Analyses

Clinician Involvement. Multiple regression analyses were conducted to examine whether level of clinician involvement on the calls moderated the relation between proportion of time spent on active learning techniques and outcomes. Analyses controlled for the number of consultation calls attended as well as therapists' post-training scores on outcomes of interest if they had been collected (i.e., post-training adherence and skill scores).

Adherence. Multiple regression analyses indicated no significant relation between clinician involvement and post-consultation adherence scores (see Table 16). In the final model, neither clinician involvement nor the proportion of time dedicated to active learning were significant predictors of post-consultation adherence scores, and there was

no significant interaction between clinician involvement and the proportion of time dedicated to active learning.

Table 16

Multiple Regression Analyses Examining Clinician Involvement and the Proportion of Time Dedicated to Active Learning Techniques During Consultation as Predictors of Treatment Adherence at Post-Consultation

	B	*SE B*	*β*	*P*
Step 1				
Constant	1.59	0.59		.01
Post adherence score	0.47	0.09	.45	.00
Number of consultation calls attended	0.11	0.06	.15	.09
Step 2				
Constant	1.72	0.64		.01
Post adherence score	0.48	0.09	.46	.00
Number of consultation calls attended	0.11	0.06	.16	.09
Clinician involvement on call	-0.07	0.13	-.05	.60
Step 3				
Constant	1.58	0.70		.03
Post adherence score	0.47	0.10	.45	.00
Number of consultation calls attended	0.10	0.07	.14	.17
Clinician involvement on call	-0.01	0.23	-.01	.96
Ratio of time dedicated to role-plays	3.80	7.92	.10	.63
Involvement x ratio dedicated to role-plays	-.96	2.96	-.08	.75

Note. Analysis includes those who participated in at least one consultation call and completed all study assessments, yielding 99 total participants. $R^2 = .23$ for Step 1 (*ps* < .001); $\Delta R^2 = .00$ for Step 2 (*ps* = .60); $\Delta R^2 = .00$ for Step 3 (*ps* = .86).

Skill. Though initially non-significant when first entered into the regression (see Table 17), clinician involvement was significant in the final regression. However, this was limited by a significant clinician involvement by active learning interaction. This interaction indicates that level of involvement moderated the effect of active learning on post-consultation skill such that as the level of clinician involvement increased, the effect of active learning on skill increased.

Table 17

Multiple Regression Analyses Examining Clinician Involvement and the Proportion of Time Dedicated to Active Learning Techniques During Consultation as Predictors of Treatment Skill[a] *at Post-Consultation*

	B	*SE B*	*β*	*P*
Step 1				
Constant	8.29	4.71		.08
Post skill score	3.68	.73	.46	.00
Number of consultation calls attended	.12	.49	.02	.81
Step 2				
Constant	9.48	4.98		.06
Post skill score	3.77	.74	.48	.00
Number of consultation calls attended	.11	.49	.02	.83
Clinician involvement on call	-.76	1.01	-.07	.45
Step 3				
Constant	10.83	5.20		.04
Post skill score	4.16	.75	.53	.00
Number of consultation calls attended	.44	.53	.08	.41
Clinician involvement on call	-3.90	1.81	-.35	.03
Ratio of time dedicated to role-plays	-84.99	60.33	-.30	.16
Involvement x ratio dedicated to role-plays	45.90	22.67	.53	.046

Note. Analysis includes those who participated in at least one consultation call and completed all study assessments, yielding 99 total participants. [a] A squared transformation was used for post-consultation skill. $R^2 = .22$ for Step 1 (*ps* < .001); $\Delta R^2 = .01$ for Step 2 (*ps* = .40); $\Delta R^2 = .04$ for Step 3 (*ps* = .11).

Self-Efficacy. Multiple regression analyses indicated no significant relation between clinician involvement and post-consultation self-efficacy as well as no moderating effect of clinician involvement on the relation between active learning and self-efficacy scores (all $\beta < -.25$, all $p > .05$).

Satisfaction. Multiple regression analyses indicated no significant relation between clinician involvement and consultation satisfaction (see Table 18). In the final model, neither clinician involvement nor the proportion of time dedicated to active learning were significant predictors of satisfaction, and there was no significant

interaction between clinician involvement and the proportion of the time dedicated to active learning.

Table 18

Multiple Regression Analyses Examining Clinician Involvement and the Proportion of Time Dedicated to Active Learning Techniques During Consultation as Predictors of Consultation Satisfaction

	B	*SE B*	*β*	*P*
Step 1				
Constant	8.58	1.28		.00
Number of consultation calls attended	0.41	0.15	.28	.007
Step 2				
Constant	8.39	1.29		.00
Number of consultation calls attended	0.39	0.15	.27	.01
Clinician involvement on call	0.17	0.18	.10	.35
Step 3				
Constant	8.41	1.54		.00
Number of consultation calls attended	0.40	0.15	.28	.01
Clinician involvement on call	0.20	0.40	.11	.62
Ratio of time dedicated to role-plays	-0.90	12.31	-.02	.94
Involvement x ratio dedicated to role-plays	-0.57	5.48	-.03	.92

Note. Analysis includes those who participated in at least one consultation call and completed the Consultation Feedback Form, yielding 91 total participants. $R^2 = .08$ for Step 1 (*ps* < .01); $\Delta R^2 = .01$ for Step 2 (*ps* = .35); $\Delta R^2 = .00$ for Step 3 (*ps* = .91).

Implementation. Implementation rates were gathered from therapists who participated in the 2-year follow-up study. Although 50 therapists completed the follow-up interview, only 39 reported providing therapy to anxious youth clients in the prior year. Analyses included only the 37 of these participants who attended at least one consultation call. Implementation was categorized in two ways. First, therapists were asked whether they implemented CBT elements with their anxious youth clients and, if so, with what percentage of clients. Secondly, they were asked if they implemented the

Coping Cat program, specifically, with their anxious youth clients and, if so, with what percentage of clients.

Multiple regression analyses were conducted to examine the relation between proportion of time dedicated to active learning techniques and implementation of CBT elements, while controlling for number of consultation calls attended. Results indicated no significant relation between any predictors (i.e., consultation call attendance, proportion of time dedicated to active learning, and proportion of time dedicated to didactics) and post-consultation implementation of CBT elements (all $\beta < -.24$, all $p > .05$). Additional regression analyses indicated no significant relation between clinician involvement and implementation of CBT elements and no moderating effect of clinician involvement on the relation between active learning and implementation rates (all $\beta < -.17$, all $p > .05$).

Multiple regression analyses were also conducted to examine the relation between proportion of time dedicated to active learning techniques and implementation of the Coping Cat. While controlling for number of consultation calls attended, proportion of time dedicated to active learning negatively predicted implementation of the Coping Cat ($\beta = -.33$, $p < .05$). This was no longer significant when proportion of time dedicated to didactics was added to the model (see Table 19).

Table 19

Multiple Regression Analyses Examining the Proportions of Time Dedicated to Active and Passive Learning Techniques During Consultation as Predictors of Implementation Rates of Coping Cat Two Years Following Consultation

	B	*SE B*	*β*	*p*
Step 1				
Constant	79.44	28.92		.01
Number of consultation calls attended	-6.02	3.30	-.29	.08
Step 2				
Constant	84.73	27.78		.004
Number of consultation calls attended	-4.02	3.31	-.20	.23
Ratio of time dedicated to role-plays	-335.08	162.70	-.33	.047
Step 3				
Constant	108.36	31.55		.002
Number of consultation calls attended	-4.38	3.26	-.21	.19
Ratio of time dedicated to role-plays	-224.25	176.23	-.22	.21
Ratio of time dedicated to didactics	-136.68	91.55	-.25	.15

Note. Analysis includes those who participated in the 2-year follow-up, attended at least one consultation call, and reported treating anxious youth clients in the previous year, yielding 37 total participants. $R^2 = .09$ for Step 1 (*ps* = .08); $\Delta R^2 = .10$ for Step 2 (*ps* < .05); $\Delta R^2 = .05$ for Step 3 (*ps* < .05).

Additional regression analyses indicated no relation between clinician involvement and implementation of the *Coping Cat.* However, in this model, number of consultation calls attended served as a negative predictor of implementation (see Table 20). In the final model, this was no longer significant, and there was no moderating effect of clinician involvement on the relation between active learning and implementation of the *Coping Cat*.

Table 20

Multiple Regression Analyses Examining Clinician Involvement and the Proportion of Time Dedicated to Active Learning Techniques During Consultation as Predictors of Implementation Rates of Coping Cat Two Years Following Consultation

	B	*SE B*	*β*	*p*
Step 1				
Constant	79.44	28.92		.009
Number of consultation calls attended	-6.02	3.30	-.29	.08
Step 2				
Constant	77.09	28.93		.01
Number of consultation calls attended	-7.40	3.53	-.36	.04
Clinician involvement on call	6.148	5.70	-.19	.29
Step 3				
Constant	86.94	28.53		.005
Number of consultation calls attended	-4.22	3.95	-.21	.29
Clinician involvement on call	.23	11.61	.01	.98
Ratio of time dedicated to role-plays	-615.79	406.99	-.61	.14
Involvement x ratio dedicated to role-plays	111.26	160.03	.36	.49

Note. Analysis includes those who participated in the 2-year follow-up, attended at least one consultation call, and reported treating anxious youth clients in the previous year, yielding 37 total participants. $R^2 = .09$ for Step 1 (*ps* = .08); $\Delta R^2 = .03$ for Step 2 (*ps* = .12); $\Delta R^2 = .13$ for Step 3 (*ps* = .06).

Exploratory Analyses

Moderators. Multiple regression analyses examined whether the following variables moderated the relation between consultation call attendance and therapist adherence and skill: attention on calls (as rated by therapists on a 7-point Likert scale), the number of anxious youth treated with CBT while receiving consultation, and the training climate of the therapist's work organization. None of these variables significantly predicted post-consultation adherence or skill or moderated the relation between consultation call attendance and these outcomes (all $\beta < -.58$, all $p > .05$). Additionally, these variables did not moderate the relation between proportion of time spent on active learning and post-consultation adherence and skill (all $p > .05$).

When examining the impact of these variables on self-efficacy, attention during calls was a significant positive predictor when controlling for consultation call attendance (see Table 21) and proportion of time dedicated to active learning (see Table 22) but did not appear to moderate either the relation between consultation call attendance and self-efficacy or the proportion of time dedicated to active learning and self-efficacy.

Table 21

Multiple Regression Analyses Examining Attention on Calls as Moderator of Relation Between Consultation Call Attendance and Self-Efficacy

	B	*SE B*	*β*	*p*
Step 1				
Constant	62.83	9.38		.00
Number of consultation calls attended	-1.44	1.06	-.15	.18
Attention on calls	3.32	1.09	.32	.003
Step 2				
Constant	16.45	39.68		.68
Number of consultation calls attended	4.15	4.77	.42	.39
Attention on calls	11.96	7.27	1.17	.10
Attention x number of consultation calls	-1.03	.86	-1.16	.23

Note. Analyses included those who participated in at least one consultation call, completed the self-efficacy measure, and rated their attention, yielding 92 participants. R^2 = .10 for Step 1 (*ps* < .05); ΔR^2 = .02 for Step 2 (*ps* = .23).

Table 22

Multiple Regression Analyses Examining Attention on Calls as Moderator of Relation Between Proportion of Time Dedicated to Active Learning and Self-Efficacy

	B	*SE B*	*ß*	*p*
Step 1				
Constant	65.16	9.60		.00
Number of consultation calls attended	-1.26	1.07	-.13	.24
Attention on calls	3.10	1.11	.30	.006
Ratio of active learning	-37.22	33.65	-.11	.27
Step 2				
Constant	65.45	18.09		.00
Number of consultation calls attended	-1.26	1.08	-.13	.24
Attention on calls	3.06	2.72	.30	.27
Ratio of active learning	-40.81	192.85	-.13	.83
Attention x ratio of active learning	.59	31.10	.01	.99

Note. Analyses included those who participated in at least one consultation call, completed the self-efficacy measure, and rated their attention, yielding 92 participants. R^2 = .11 for Step 1 (*ps* < .05); ΔR^2 = .00 for Step 2 (*ps* = .99).

Similarly, therapists' organizational training climate was a significant positive predictor of self-efficacy when controlling for consultation call attendance (see Table 23) and proportion of time dedicated to active learning (see Table 24), but did not appear to moderate either the relation between consultation call attendance and self-efficacy or the proportion of time dedicated to active learning and self-efficacy.

Table 23

Multiple Regression Analyses Examining Organizational Training Climate as Moderator of Relation Between Consultation Call Attendance and Self-Efficacy

	B	*SE B*	*β*	*P*
Step 1				
Constant	61.03	5.33		.00
Number of consultation calls attended	-.40	.51	-.08	.43
ORC training climate	.53	.17	.31	.002
Step 2				
Constant	60.86	18.19		.001
Number of consultation calls attended	-.38	2.18	-.07	.86
ORC training climate	.54	.83	.32	.52
Climate x number of consultation calls	-.00	.10	-.01	.99

Note. ORC = Organizational Readiness for Change measure. Analyses included those who participated in at least one consultation call, completed the self-efficacy measure, and the organizational measure, yielding 99 participants. $R^2 = .10$ for Step 1 (*ps* < .01); $\Delta R^2 = .00$ for Step 2 (*ps* = .99).

Table 24

Multiple Regression Analyses Examining Organizational Training Climate as Moderator of Relation Between the Proportion of Time Dedicated to Active Learning and Self-Efficacy

	B	*SE B*	*β*	*P*
Step 1				
Constant	62.71	5.62		.00
Number of consultation calls attended	-.33	.51	-.06	.52
ORC training climate	.51	.17	.30	.003
Ratio of active learning	-25.32	26.74	-.09	.35
Step 2				
Constant	63.23	10.19		.00
Number of consultation calls attended	-.33	.52	-.06	.52
ORC training climate	.49	.39	.29	.21
Ratio of active learning	-33.28	131.88	-.12	.80
Climate x ratio of active learning	.34	5.57	.03	.95

Note. ORC = Organizational Readiness for Change measure. Analyses included those who participated in at least one consultation call, completed the self-efficacy measure, and the organizational measure, yielding 99 participants. $R^2 = .10$ for Step 1 (*ps* < .05); $\Delta R^2 = .00$ for Step 2 (*ps* = .95).

When examining the impact of these variables on satisfaction with consultation, attention during calls was a significant positive predictor when controlling for

consultation call attendance (see Table 25). It did not appear to moderate the relation between consultation call attendance and satisfaction.

Table 25

Multiple Regression Analyses Examining Attention on Calls as Moderator of Relation Between Consultation Call Attendance and Satisfaction with Consultation

	B	*SE B*	*ß*	*P*
Step 1				
Constant	6.71	1.29		.00
Number of consultation calls attended	.23	.15	.16	.12
Attention on calls	.58	.15	.38	.00
Step 2				
Constant	15.39	5.41		.01
Number of consultation calls attended	-.82	.65	-.57	.21
Attention on calls	-1.04	.99	-.69	.30
Attention x number of consultation calls	.19	.12	1.49	.10

Note. Analyses included those who participated in at least one consultation call, completed the Consultation Feedback Form, and rated their attention, yielding 91 participants. $R^2 = .21$ for Step 1 (*ps* < .001); $\Delta R^2 = .02$ for Step 2 (*ps* = .10).

Attention during calls was a positive significant predictor when controlling for consultation call attendance and the proportion of time dedicated to active learning (see Table 26). A conditional effect was observed such that when no time was dedicated to active learning, attention during calls positively predicted satisfaction (see Table 26).

Table 26

Multiple Regression Analyses Examining Attention on Calls as Moderator of Relation Between the Proportion of Time Dedicated to Active Learning and Satisfaction with Consultation

	B	*SE B*	*β*	*P*
Step 1				
Constant	6.67	1.33		.00
Number of consultation calls attended	.23	.15	.16	.13
Attention on calls	.58	.15	.38	.00
Ratio of active learning	.54	4.65	.01	.91
Step 2				
Constant	4.64	2.49		.07
Number of consultation calls attended	.23	.15	.16	.13
Attention on calls	.91	.37	.60	.02
Ratio of active learning	25.74	26.50	.54	.33
Attention x ratio of active learning	-4.13	4.27	-.55	.34

Note. Analyses included those who participated in at least one consultation call, completed the Consultation Feedback Form, and rated their attention, yielding 91 participants. $R^2 = .21$ for Step 1 (*ps* < .001); $\Delta R^2 = .01$ for Step 2 (*ps* = .34).

Similarly, therapists' organizational training climate was a significant positive predictor of satisfaction when controlling for consultation call attendance (see Table 27). It did not appear to moderate the relation between consultation call attendance and satisfaction.

Table 27

Multiple Regression Analyses Examining Organizational Training Climate as Moderator of Relation Between Consultation Call Attendance and Satisfaction with Consultation

	B	*SE B*	*ß*	*P*
Step 1				
Constant	7.48	1.34		.00
Number of consultation calls attended	.38	.15	.26	.01
ORC training climate	.06	.03	.23	.03
Step 2				
Constant	9.75	4.30		.03
Number of consultation calls attended	.11	.51	.08	.82
ORC training climate	-.04	.18	-.16	.82
Climate x number of consultation calls	.01	.02	.45	.58

Note. ORC = Organizational Readiness for Change measure. Analyses included those who participated in at least one consultation call, completed the Consultation Feedback Form, and rated their attention, yielding 91 participants. $R^2 = .13$ for Step 1 (*ps* < .01); $\Delta R^2 = .00$ for Step 2 (*ps* = .58).

Training climate was a significant positive predictor when controlling for consultation call attendance and the proportion of time dedicated to active learning (see Table 28). A conditional effect was observed such that when no time was dedicated to active learning, organizational training climate positively predicted satisfaction (see Table 28).

Table 28

Multiple Regression Analyses Examining Organizational Training Climate as Moderator of Relation Between the Proportion of Time Dedicated to Active Learning and Satisfaction with Consultation

	B	*SE B*	*β*	*P*
Step 1				
Constant	7.55	1.37		.00
Number of consultation calls attended	.38	.15	.26	.01
ORC training climate	.06	.03	.22	.03
Ratio of active learning	-1.20	4.84	-.03	.81
Step 2				
Constant	5.27	1.93		.008
Number of consultation calls attended	.38	.15	.26	.01
ORC training climate	.15	.06	.59	.02
Ratio of active learning	34.82	22.12	.73	.12
Climate x ratio of active learning	-1.50	.90	-.82	.10

Note. ORC = Organizational Readiness for Change measure. Analyses included those who participated in at least one consultation call, completed the Consultation Feedback Form, and rated their attention, yielding 91 participants. $R^2 = .13$ for Step 1 (*ps* < .01); $\Delta R^2 = .03$ for Step 2 (*ps* = .10).

Predictors of Implementation. Multiple regression analyses examined potential predictors of implementation rates for individuals who completed the 2-year follow-up study. The analyses included the therapists who reported providing therapy to anxious youth in the previous year and was not limited to therapists who had participated in consultation calls, yielding a total of 39 participants. Separate multiple regressions analyses, each controlling for number of consultation calls attended, examined whether the following variables predicted implementation rates of CBT elements and the *Coping Cat*: post-consultation adherence score, post-consultation skill score, post-consultation self-efficacy score, satisfaction with consultation, post-consultation EBPAS scale scores, 2-year follow-up EBPAS scale scores, post-consultation knowledge score, and 2-year follow-up knowledge score. None of these variables was significantly associated with implementation rates with the exception of the post-consultation EBPAS Divergence

score and the 2-year follow-up EBPAS Openness score. Post-consultation EBPAS Divergence subscale scores significantly negatively predicted implementation of CBT elements (see Table 29), indicating that as the belief in the lack of clinical utility of research-based practices increased, clinicians were less likely to implement CBT elements with their clients. EBPAS Openness subscale score collected at 2-year follow-up positively predicted implementation of CBT elements (Table 29), indicating that a greater openness to trying EBPs was associated with increased implementation rates of CBT elements.

Table 29

Multiple Regression Analyses Examining the Relation Between Attitudes and Implementation of CBT Elements with Anxious Youth at the 2-Year Follow-Up

	B	*SE B*	*ß*	*P*
Model 1[a]				
Constant	112.72	14.68		.00
Number of consultation calls attended	-1.42	1.60	-.14	.38
Post-Consultation EBPAS Divergence Score	-14.36	6.66	-.34	.04
Model 2[b]				
Constant	61.48	21.59		.08
Number of consultation calls attended	-1.69	1.58	-.17	.29
2-year follow-up EBPAS Openness Score	14.13	6.06	.36	.03

Note. EBPAS = Evidence-Based Practitioner Attitude Scale (Aarons, 2005). Analyses included those who completed 2-year follow-up and treated an anxious youth in the previous year, yielding 39 participants. [a]R^2 = .13 (*ps* = .08). [b]R^2 = .15 (*ps* = .05).

Maintenance and Predictors of Knowledge and Attitudes at 2-Year Follow-Up. A series of paired-samples *t*-tests were conducted to examine whether knowledge and EBPAS scores differed between post-consultation and 2-year follow-up (see Table 30). These tests indicated a significant decline in CBT knowledge scores from post-consultation to 2-year follow-up. With regard to therapist attitudes, the EBPAS Openness

scale evidenced a significant decline from post-consultation to 2-year follow-up. The EBPAS total score as well as the Requirements, Appeal, and Divergence scale scores did not significantly differ between post-consultation to 2-year follow-up, indicating stability in these attitudes.

Table 30

Comparing Means Between Post-Consultation and 2-Year Follow-Up

Measure	Post-Consultation	2-Year Follow-Up	
	M (SD)	*M (SD)*	*p*
EBPAS Requirements Scale	2.66 (.98)	2.85 (1.04)	.26
EBPAS Appeal Scale	3.32 (.57)	3.21 (.61)	.30
EBPAS Openness Scale	3.21 (.51)	2.89 (.69)	.00
EBPAS Divergence Scale	0.83 (.58)	0.78 (.59)	.43
EBPAS Total	3.09 (.46)	3.04 (.53)	.54
Knowledge Test	17.86 (1.59)	16.20 (2.53)	.00

Note. Analysis includes those who participated in the follow-up, yielding 50 total participants. EBPAS = Evidence-Based Practitioner Attitude Scale (Aarons, 2005). * = $p < .001$.

Multiple regression analyses examined whether consultation call attendance predicted 2-year follow-up knowledge scores, controlling for post-consultation knowledge score (see Table 31). Number of consultation calls attended was found to significantly predict knowledge scores at 2-year follow-up. The proportion of time dedicated to active learning and didactics did not serve as significant predictors and did not affect the relation between consultation call attendance and follow-up knowledge score.

Table 31

Multiple Regression Analyses Examining Consultation Call Attendance as a Predictor of Knowledge Scores at 2-Year Follow-Up

	B	*SE B*	*ß*	*P*
Model 1[a]				
Constant	-1.91	2.90		.51
Knowledge Test Score Post-Consultation	.75	.16	.47	.00
Number of consultation calls attended	.57	.11	.51	.00
Model 2[b]				
Constant	-2.15	3.23		.51
Knowledge Test Score Post-Consultation	.72	.16	.51	.00
Number of consultation calls attended	.68	.17	.45	.00
Ratio of time dedicated to role-plays	-14.74	7.70	-.24	.06
Ratio of time dedicated to didactics	4.02	4.63	.10	.39

Note. [a] Analysis included those who participated in the 2-year follow-up, yielding 50 participants. $R^2 = .54$ (*ps* < .001). [b] Analysis included those who participated in the 2-year follow-up and participated in at least one consultation call, yielding 48 participants. $R^2 = .49$ (*ps* < .001).

Multiple regression analyses examined whether consultation call attendance predicted EBPAS scores at 2-year follow-up, controlling for the EBPAS scores at post-consultation (see Table 32). Consultation call attendance served as a significant predictor of EBPAS total scores, indicating that an increase in consultation call attendance was associated with an increase in positive attitudes toward EBPs. Consultation call attendance also served as a significant predictor for the EBPAS Appeal scores, indicating that an increase in attendance was associated with increased attitudes regarding the appeal of EBPs. Lastly, consultation call attendance was a significant predictor of the EBPAS Divergence scale scores, indicating that an increase in consultation call attendance was associated with a decrease in beliefs that EBPs lack clinical utility.

Table 32

Multiple Regression Analyses Examining Consultation Call Attendance as a Predictor of EBPAS Scores at 2-Year Follow-Up

	B	*SE B*	*β*	*P*
EBPAS Requirements[1]				
Constant	1.43	.69		.00
EBPAS Requirements Post-Consultation	.32	.15	.30	.04
Number of consultation calls attended	.07	.06	.15	.28
EBPAS Appeal[2]				
Constant	1.51	.57		.01
EBPAS Appeal Post-Consultation	.30	.14	.29	.04
Number of consultation calls attended	.08	.04	.32	.02
EBPAS Openness[3]				
Constant	.40	.60		.50
EBPAS Openness Post-Consultation	.73	.16	.54	.00
Number of consultation calls attended	.02	.04	.06	.61
EBPAS Divergence[4]				
Constant	.72	.23		.003
EBPAS Divergence Post-Consultation	.73	.10	.72	.00
Number of consultation calls attended	-.07	.03	-.25	.01
EBPAS Total[5]				
Constant	.82	.51		.12
EBPAS Total Post-Consultation	.55	.14	.48	.00
Number of consultation calls attended	.06	.03	.27	.04

Note. EBPAS = Evidence-Based Practitioner Attitude Scale (Aarons, 2005). Analyses included those who participated in the 2-year follow-up, yielding 50 participants. [1]R^2 = .11 (*ps* = .07). [2]R^2 = .17 (*ps* < .05). [3]R^2 = .30 (*ps* < .001). [4]R^2 = .57 (*ps* < .001). [5]R^2 = .29 (*ps* < .001).

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APPENDIX A

MEASURES COLLECTED BY BEIDAS ET AL. (2012)

LIST OF MEASURES

1. Clinician Demographics and Attitudes Questionnaire
2. Therapist Background Questionnaire
3. Evidence-Based Practice Attitude Scale*
4. Organizational Readiness for Change
5. Consultation Feedback Form
6. Knowledge Test*
7. Self-Efficacy Questionnaire
8. Adherence and Skill Checklist

*This measure was also collected as part of the present study's 2-year follow-up

1. Clinician Demographics and Attitudes Questionnaire (CDAQ)

CDAQ
Page 1 of 3
Subject ID: ___ ___ ___
Date: _____

Clinician Demographics and Attitudes Questionnaire (CDAQ)

Please answer the questions below as accurately as possible to best reflect your background.

Background information

1. Age: _____

2. Sex: _____

3. Race (optional):
__ Caucasian
__ Hispanic
__ African American
__ Asian
__ Native American/Alaskan Native
__ Other (please specify:_____)

4. Year in graduate program (if not in graduate program, N/A): _____

5. How much experience (in months) have you had in the role of a therapist (i.e. graduate level clinician, school counselor, etc): _____

6. How would you describe your theoretical orientation?

_____

7. How much do you identify with cognitive behavioral therapy (CBT) as your orientation?

1 2 3 4 5 6 7
Do not identify Strongly identify

8. Have you ever treated a child with a primary diagnosis of social phobia, separation anxiety disorder, or general anxiety disorder?
a. Yes
b. No

9. If yes, what treatment program did you use?
   a. CBT
   b. Coping Cat CBT
   c. Other: _____ (If other, please fill in)

10. Have you ever attended a workshop for CBT for anxious youth?
   a. Yes
   b. No

The questions below are helpful for us to identify how much past experience you have had with the Coping Cat treatment program.

Coping Cat Background

11. How would you describe your past experience with the Coping Cat manual?
   a. Have never used it before.
   b. Have read the manual but never administered the treatment.
   c. Have read the manual and administered treatment.
   d. Have administered the treatment but not read the manual.
   e. Other: _____ (If other, please fill in)

If you answered c or d for number 11, please answer questions 12 and 13. If not, please skip to question 14.

12. How many cases have you treated using the Coping Cat program? _____

13. Have you received supervision for using the Coping Cat program? If yes, approximately how many of hours of supervision per case did you receive? _____

As part of our study, it is important for us to identify your knowledge of empirically supported treatments for anxious youth. Please answer the questions below as accurately as you can.

Empirically Supported Treatments & Cognitive Behavioral Therapy

14. Please give a brief description of your understanding of empirically supported treatment for child anxiety disorders.

_____

_____

15. What is your opinion towards empirically supported treatments (i.e., CBT) for anxious youth?

1	2	3	4	5	6	7
Do not support						Strongly support

16. What is your confidence level in the efficacy of empirically supported treatments (i.e., CBT) for anxious youth?

1	2	3	4	5	6	7
Not confident						Very Confident

17. How motivated do you feel to learn and use CBT as a treatment for child anxiety?

1	2	3	4	5	6	7
Not motivated						Very Motivated

18. How useful do you feel learning about CBT is?

1	2	3	4	5	6	7
Not useful						Very Useful

2. Therapist Background Questionnaire (TBQ)

THERAPIST BACKGROUND QUESTIONNAIRE

ID#:	Today's Date: / /	Gender: Male Female	Ethnicity:

Professional Specialty:

(e.g., social worker, psychologist, psychiatrist)

_____

State licensed? Y N

Date of most advanced degree:

(Mo/Yr) ____/____

Degrees and credentials earned: (Check all that apply)

_____ MA _____ MSW _____ PhD _____ PsyD

_____ MD _____ EdD _____ LCSW ____ MFCC/MFT

_____ Other (please explain)

_____

1. How many years of professional/clinical training (beyond undergraduate degree) have you had?

_____

About what percentage of your training focused on work with:

____ Children aged 5 or younger

____ Children aged 6-12

____ Adolescents aged 13-17

____ Adults aged 18 or older

2. How many years of full-time professional/clinical experience have you had since your training ended? _____

About what percentage of your experience has focused on work with:

____ Children aged 5 or younger

____ Children aged 6-12

____ Adolescents aged 13-17

____ Adults aged 18 or older

3. In the past 2 years, how many total hours have you spent in workshops or other training programs focused on child therapy techniques? _____

4. Do you consider yourself….._____ Primarily a child-adolescent therapist?

_____ Primarily an adult therapist?

_____ Other (please specify) _____

5. How many active cases do you typically carry at one time? _____

6. About how many hours of supervision do you receive each week? _____

7. How many cases would you say constitutes an appropriate caseload - one that would allow you to do your best work with each case?_____

8. How often, if ever, do you experience a feeling of professional burnout?

0 1 2 3 4 5 6 7 8 9 10

9. What is your primary theoretical orientation?_____

10. In what percentage of your work with children and adolescents have you used the following theoretical orientations in conceptualizing cases and thinking about therapeutic goals?

11. In what percentage of your work with children and adolescents have you used the therapeutic methods and techniques advocated by the following orientations?

3. Evidence-Based Practice Attitude Scale

The following questions ask about your feelings about using new types of therapy, interventions, or treatments. Manualized therapy refers to any intervention that has specific guidelines and/or components that are outlined in a manual and/or that are to be followed in a structured/predetermined way.

Fill in the circle indicating the extent to which you agree with each item using the following scale:

0	1	2	3	4
Not at all	**To a slight extent**	**To a moderate extent**	**To a great extent**	**To a very great extent**

1. I like to use new types of therapy/interventions to help my clients…...○ ○ ○ ○ ○
2. I am willing to try new types of therapy/interventions even if I have to follow a treatment manual……....○ ○ ○ ○ ○
3. I know better than academic researchers how to care for my clients….○ ○ ○ ○ ○
4. I am willing to use new and different types of therapy/interventions developed by researchers……..○ ○ ○ ○ ○
5. Research based treatments/interventions are not clinically useful…….○ ○ ○ ○ ○
6. Clinical experience is more important than using manualized therapy/treatment…….…...○ ○ ○ ○ ○
7. I would not use manualized therapy/interventions…….....○ ○ ○ ○ ○
8. I would try a new therapy/intervention even if it were very different from what I am used to doing…….○ ○ ○ ○ ○

For questions below: If you received training in a therapy or intervention that was new to you, how likely would you be to adopt it if:

It was intuitively appealing?…… ○ ○ ○ ○ ○
It "made sense" to you? …… ○ ○ ○ ○ ○
It was required by your supervisor? …… ○ ○ ○ ○ ○
It was required by your agency? …… ○ ○ ○ ○ ○
It was required by your state? …… ○ ○ ○ ○ ○
It was being used by colleagues who were happy with it? …… ○ ○ ○ ○ ○
You felt you had enough training to use it correctly? …… ○ ○ ○ ○ ○

4. Organizational Readiness for Change (TCU-ORC)

TCU-ORC-S
Subject ID: ___ ___ ___
Date: _____

Instructions: Please fill in the circle that shows your answer to each item in reference to the clinical setting within which you see the majority of your clients.

	Disagree Strongly (1)	Disagree (2)	Uncertain (3)	Agree (4)	Agree St. (5)
Your program needs additional guidance in –					
1. Assessing client needs…….....○	○	○	○	○	○
2. Matching needs with services……..○	○	○	○	○	○
3. Increasing program participation by clients……...○	○	○	○	○	○
4. Measuring client performance……..○	○	○	○	○	○
5. Developing more effective group sessions○	○	○	○	○	○
6. Raising overall quality of counseling……○	○	○	○	○	○
7. Using client assessments to guide clinical and program decisions……..○	○	○	○	○	○
8. Using client assessments to document program effectiveness……....○	○	○	○	○	○
You need more training for –					
9. Assessing client problems and needs……○	○	○	○	○	○
10. Increasing client participation in treatment…….○	○	○	○	○	○
11. Monitoring client progress……..○	○	○	○	○	○
12. Improving rapport with clients……○	○	○	○	○	○

		Disagree Strongly (1)	Disagree (2)	Uncertain (3)	Agree (4)	Agree St. (5)
13.	Improving client thinking and problem solving skills……..○	○	○	○	○	○
14.	Improving behavioral management of clients……○	○	○	○	○	○
15.	*Improving cognitive focus of clients during counseling……○	○	○	○	○	○
16.	Using computerized client assessments…○	○	○	○	○	○

Current <u>pressures</u> to make program changes come from –

17.	Clients in the program……○	○	○	○	○	○
18.	Program staff members……○	○	○	○	○	○
19.	Program supervisors or managers……○	○	○	○	○	○
20.	Agency board members…….○	○	○	○	○	○
21.	Community action groups…….○	○	○	○	○	○
22.	Funding and oversight agencies……○	○	○	○	○	○
23.	Accreditation or licensing authorities……○	○	○	○	○	○

How strongly do you a<u>gree</u> or <u>disagree</u> with each of the following statements?

24.	You prefer training content that is based on scientific evidence…….....○	○	○	○	○	○
25.	Your offices and equipment are adequate.○	○	○	○	○	○
26.	You have the skills needed to conduct effective counseling…….....○	○	○	○	○	○
27.	Some staff get confused about the main goals for this program…….....○	○	○	○	○	○

		Disagree Strongly (1)	Disagree (2)	Uncertain (3)	Agree (4)	Agree St. (5)
28.	Staff here all get along very well…….○	○	○	○	○	○
29.	Psychodynamic theory is commonly used In your counseling here……○	○	○	○	○	○
30.	You often have trouble implementing concepts learned at conferences……○	○	○	○	○	○
31.	Program staff understand how this program fits as part of the treatment system in your community……○	○	○	○	○	○
32.	Treatment planning decisions for clients here often have to be revised by a counselor supervisor…….○	○	○	○	○	○
33.	Staff training and continuing education are priorities at this program……...○	○	○	○	○	○
34.	*Facilities here are adequate for conducting counseling…….○	○	○	○	○	○
35.	You frequently share your knowledge of new counseling ideas with other staff……○	○	○	○	○	○
36.	You were satisfied with the training offered at workshops available to you last year…..○	○	○	○	○	○
37.	You used the Internet to communicate with other treatment professionals (e.g., list serves, bulletin boards, chat room) in the past month……..○	○	○	○	○	○
38.	Management here fully trusts your professional judgment……..○	○	○	○	○	○
39.	Pharmacotherapy and medications are Important parts of this program……○	○	○	○	○	○

	Disagree Strongly (1)	Disagree (2)	Uncertain (3)	Agree (4)	Agree St. (5)
40. There is too much friction among staff members……	○	○	○	○	○
41. Some staff members here resist any type of change……	○	○	○	○	○
42. Ideas and suggestions from staff get fair consideration by program management….	○	○	○	○	○
43. Staff generally regard you as a valuable source of information……	○	○	○	○	○
44. You have easy access for using the Internet at work……...	○	○	○	○	○
45. The staff here always works together as a team……	○	○	○	○	○
46. Client assessments here are usually conducted using a computer……	○	○	○	○	○
47. Your duties are clearly related to the goals of this program…….	○	○	○	○	○
48. You learned new skills or techniques at a professional conference in the past year ……..……	○	○	○	○	○
49. You consistently plan ahead and carry out your plans……...	○	○	○	○	○
50. You are under too many pressures to do your job effectively……...	○	○	○	○	○
51. Counselors here are given broad authority in treating their own clients……	○	○	○	○	○
52. This program encourages and supports professional growth……...	○	○	○	○	○

	Disagree Strongly (1)	Disagree (2)	Uncertain (3)	Agree (4)	Agree St. (5)
53. *Cognitive behavior therapy is used with many of your clients here……...○	○	○	○	○	○
54. You read about new techniques and treatment information each month……...○	○	○	○	○	○
55. Staff here are always quick to help one another when needed…….○	○	○	○	○	○
56. Computer problems are usually repaired promptly at this program……...○	○	○	○	○	○
57. Novel treatment ideas by staff are discouraged……...….○	○	○	○	○	○
58. There are enough counselors here to meet current client needs…….○	○	○	○	○	○
59. The budget here allows staff to attend professional conferences each year……○	○	○	○	○	○
60. You have enough opportunities to keep your counseling skills up-to-date……○	○	○	○	○	○
61. Mutual trust and cooperation among staff in this program are strong……...○	○	○	○	○	○
62. Most client records here are computerized……....○	○	○	○	○	○
63. You are willing to try new ideas even if some staff members are reluctant. ……...○	○	○	○	○	○
64. Learning and using new procedures are easy for you……○	○	○	○	○	○
65. This program operates with clear goals and objectives…….……..○	○	○	○	○	○

	Disagree Strongly (1)	Disagree (2)	Uncertain (3)	Agree (4)	Agree St. (5)
66. Staff members often show signs of stress and Strain…….	○	○	○	○	○
67. You have staff meetings weekly……○		○	○	○	○
68. You usually accomplish whatever you set your mind on……	○	○	○	○	○
69. It is easy to change procedures here to meet new conditions……	○	○	○	○	○
70. Counselors here often try out different techniques to improve their effectiveness. ……..○		○	○	○	○
71. *You used the Internet to access therapy information in the past month……○		○	○	○	○
72. The formal and informal communication channels here work very well……○		○	○	○	○
73. Program policies here limit staff access to the Internet and use of email……○		○	○	○	○
74. Offices here allow the privacy needed for individual counseling…….○		○	○	○	○
75. You are sometimes too cautious or slow to make changes…….○		○	○	○	○
76. Staff members are given too many rules here……..….○		○	○	○	○
77. You feel a lot of stress here…….…○		○	○	○	○
78. *CBT theory is followed by many of the counselors here…….	○	○	○	○	○
79. Program staff are always kept well informed……	○	○	○	○	○

		Disagree Strongly (1)	Disagree (2)	Uncertain (3)	Agree (4)	Agree St. (5)
80.	The heavy workload here reduces program effectiveness……	○	○	○	○	○
81.	*You regularly read professional journal articles or books on therapy issues….....	○	○	○	○	○
82.	Communications with other programs that have similar interests would help…	○	○	○	○	○
83.	Other staff often ask your advice about program procedures……..	○	○	○	○	○
84.	More open discussions about program issues are needed here……	○	○	○	○	○
85.	This program holds regular in service training……..	○	○	○	○	○
86.	You learned new clinical skills or techniques from manuals or other self-education materials in the past year……..	○	○	○	○	○
87.	You frequently hear good staff ideas for Improving treatment…….	○	○	○	○	○
88.	Other staff often ask for your opinions about counseling and treatment issues……..	○	○	○	○	○
89.	You are effective and confident in doing your job……	○	○	○	○	○
90.	You have a computer to use in your personal office space at work……..	○	○	○	○	○
91.	Some staff here do not do their fair share of work……..	○	○	○	○	○
92.	A larger support staff is needed to help meet program needs…….	○	○	○	○	○

		Disagree Strongly (1)	Disagree (2)	Uncertain (3)	Agree (4)	Agree St. (5)
93.	The general attitude here is to use new and changing technology……	○	○	○	○	○
94.	You do a good job of regularly updating and improving your skills……	○	○	○	○	○
95.	Staff members always feel free to ask questions and express concerns in this program……	○	○	○	○	○
96.	You have the skills needed to conduct effective individual counseling…….	○	○	○	○	○
97.	Staff frustration is common here……	○	○	○	○	○
98.	You need better access while at work to counseling resources on the Internet……..	○	○	○	○	○
99.	Management here has a clear plan for this program.....	○	○	○	○	○
100.	You often influence the decisions of other staff here……..……	○	○	○	○	○
101.	You have easy access to specialized medications or psychiatric advice for clients when needed……	○	○	○	○	○
102.	You have convenient access to email at work…….	○	○	○	○	○
103.	You are encouraged here to try new and different techniques……	○	○	○	○	○
104.	You are able to adapt quickly when you have to shift focus……..	○	○	○	○	○
105.	*Cognitive theory (Beck) guides much of your counseling here……..	○	○	○	○	○

	Disagree Strongly (1)	Disagree (2)	Uncertain (3)	Agree (4)	Agree St. (5)
106. You are viewed as a leader by other staff here…….	○	○	○	○	○
107. Computer equipment at this program is mostly old and outdated…….	○	○	○	○	○
108. This program provides a comfortable reception/waiting area for clients……	○	○	○	○	○
109. Staff here feel comfortable using computers……..○	○	○	○	○	
110. Frequent staff turnover is a problem for this program…….……○	○	○	○	○	
111. Counselors here are able to spend enough time with clients…….○	○	○	○	○	
112. Support staff here have the skills they need to do their jobs……..○	○	○	○	○	
113. Clinical staff here are well-trained……○	○	○	○	○	
114. The workload and pressures at your program keep motivation for new training low……○	○	○	○	○	
115. More computers are needed in this program for staff to use…….○	○	○	○	○	
116. You were satisfied with the training opportunities available to you last year. ….○	○	○	○	○	
117. The instruction methods for learning new counseling strategies or materials that work best for you are:					
Lectures…… ○	○	○	○	○	
Self-study…….. ○	○	○	○	○	
Workshops……. ○	○	○	○	○	
Consultants…… ○	○	○	○	○	
In-services……. ○	○	○	○	○	
Supervision/feedback…… ○	○	○	○	○	

		None	1	2	3	4
118.	In the last year, how often did you attend training workshops held within 50 miles of your agency?.....	○	○	○	○	○
119.	In the last year how often did you attend training workshops held more than 50 miles from your agency? ……	○	○	○	○	○
120.	How many workshops do you expect to attend in the next 12 months?.....	○	○	○	○	○
121.	In the last year, how many times did outside trainers come to your agency to give workshops……	○	○	○	○	○
122.	In the last year, how many times did your agency offer special in-house training?...	○	○	○	○	○

		Never	Rarely	Sometimes	A lot	Always
123.	When you attend workshops how often do you try out the new interventions or techniques learned?.....	○	○	○	○	○
124.	Are your clients interested or responsive to new ideas or counseling materials when you try them?.....	○	○	○	○	○
125.	In recent years, how often have you adopted (for regular use) new counseling interventions or techniques from a workshop?.....	○	○	○	○	○
126.	When you have adopted new ideas into your counseling, how often have you encouraged other staff to try using them?.....	○	○	○	○	○
127.	How often do new interventions or techniques that the staff from your program learn at workshops get adopted for general use?..	○	○	○	○	○
128.	How often do new ideas learned from workshops get discussed or presented at your staff meetings?.....	○	○	○	○	○

	Never	Rarely	Sometimes	A lot	Always
129. How often does the management at your program recommend or support new ideas or techniques for use by all counselors?.....	○	○	○	○	○

5. Consultation Feedback Form

Consultation Feedback Form (Adapted from Beck Initiative Practicum Feedback Form)

Please take a few moments to complete this questionnaire regarding your experience with consultation. Your responses will enable us to shape and tailor future consultation. Please be honest with your experience.

1. How would you rate the overall quality of the consultation you have received?

0	1	2	3	4	5	6
Poor	barely adequate	mediocre	satisfactory	good	very good	excellent

2. Do you feel that the amount of time spent in group consultation is adequate?

   Yes, no, maybe

3. At this point, how comfortable would you say you are in applying cognitive-behavioral therapy with anxious youth?

0	1	2	3	4	5	6
Not at all			Fairly			Very

4. Are the group consultation topics relevant to the work with your clients?

   Yes, no, maybe

5. How comfortable do you feel applying what you have discussed in consultation to your client sessions?

0	1	2	3	4	5	6
Not at all			Fairly			Very

6. How would you rate the structure of the sessions?

0	1	2	3	4	5	6
Poor	barely adequate	mediocre	satisfactory	good	very good	excellent

7. Do you feel that the consultation sessions are good adjunctive training tools to the training workshop?

   Yes, no, maybe

8. How closely did online consultation mimic face to face meetings?

0	1	2	3	4	5	6
Not at all			Fairly			Very

9. Please rate your experience with using technology (i.e., Webex) during consultation?

0	1	2	3	4	5	6
Poor	barely adequate	mediocre	satisfactory	good	very good	excellent

6. Knowledge Test (3 versions)

Knowledge Test 1

Subject ID: ___ ___ ___
Date: _____
Condition: pretrain, posttrain, postsup

Instructions: Please answer these questions to the best of your ability. If more than one question appears to be correct, please choose the best answer to the question.

1. When doing CBT with an anxious youth, it is recommended that therapists begin with imaginal exposures prior to engaging in in vivo exposures with the client.
   a. True
   b. False

2. Identify which one is not a thinking trap.
   a. The avoider: Staying away from situations you think are scary without trying first
   b. The mind-reader: Jumping to conclusions about a person/thing/situation without the facts
   c. The shoulds: I should always be perfect, I shouldn't make mistakes
   d. **The gooder: Only seeing the positive and not looking at the bad things in the situation**

3. Progressive muscle relaxation is composed of:
   a. Tensing and relaxing parts of your body
   b. Taking a nap
   c. Deep breathing
   d. A and C

4. Which of the following is most true with regard to coping modeling?
   a. Mastery modeling is preferred over coping modeling
   b. Coping modeling increases the similarity between the observer and the model
   c. Coping modeling includes initial difficulties (like those of the client), a strategy to overcome the difficulty, and then success
   d. Both b and c are correct

5. Which of the following is not an action a youth can take to help themselves when they are feeling anxious?
   a. Problem solving
   b. Coping thoughts
   c. Deep breathing
   d. Progressive muscle relaxation
   e. Getting mom to help them get out of the situation

6. The purpose of the commercial at the end of treatment is to:
    a. Allow the child to show off
    b. Give the child a chance to summarize what was accomplished
    c. Give the child an opportunity to put what was learned into his/her own words
    d. Have fun with the therapist
    e. All of the above

7. When the exposure portion of the treatment begins, the therapist should
    a. Display anxiety about exposure tasks
    b. Show confidence in the child
    c. Introduce the most frightening stimulus to the child
    d. Ask the parents for guidance

8. Homework assignments are integral parts of CBT for youth anxiety and are assigned upon beginning exposures.
    a. True
    b. False

9. What kind of thought is, "That dog is big and scary, and he might bight me."
    a. Anxious
    b. Coping
    c. Normal

10. Identify when using SUDS is not appropriate:
    a. Providing feedback to the child about the level of anxiety in the context of the feared object/situation
    b. Data that reflects what happens to the youth's anxiety when in a specific situation
    c. To determine the length of the exposure task
    d. If the SUDS are too high, then the child can opt out of the exposure

11. What is the most appropriate coping thought to counteract the following anxious thought: "My parents might be in a car accident while we are separated"?
    a. I should just get over it
    b. It could happen
    c. **It is unlikely that mom and dad will be in a car accident**
    d. I don't want to separate from them

12. Which example below best characterizes avoidance in an anxious youth?
    a. Not going to school because he has the flu
    b. Not going to a friend's house because he is in a fight with his friend
    c. Not going to sleepover because he is scared to separate from his parents

13. Parents are not involved in CBT for youth anxiety.
    a. True
    b. False

14. Cognitive behavioral therapy (CBT) for child anxiety is comprised of two main segments. These segments are:
    a. Somatic recognition and cognitive recognition
    b. Psychoeducation and exposure
    c. Exposure and response prevention
    d. None of the above

15. To maximize gains, most exposure tasks call for children to stop being in contact with the feared stimulus if the SUDS are increased by 50%.
    a. True
    b. False

16. When a child resists an exposure task, the therapist waits a few minutes for initial turmoil to pass and _____ before doing the exposure.
    a. Insists that the child participate
    b. Allows the child to play a game instead of doing the exposure
    c. Gives choices to the child to communicate a sense of control
    d. Brings the parent in the room to facilitate the exposure

17. What is the appropriate sequence for problem solving?
    a. Identify problem, evaluate situations, and pick a plan
    b. Identify problem, generate solutions, and pick a plan
    c. Evaluate situation, pick a plan
    d. Identify problem, generate solutions, evaluate solutions, and pick a plan

18. Challenging self-talk refers to:
    a. The role that emotional overreactivity plays in enhancing anxiety
    b. The role that cognition plays in anxiety
    c. The use of exposure to challenge anxious symptoms
    d. The need to eat a good meal before coming to the session

19. Which of the following is an example of a somatic response to anxiety?
    a. Thoughts racing
    b. Fast heartbeat
    c. Not going to school

20. Which statement regarding the anxious response in youth is false?
    a. Anxiety is evolutionary and adaptive
    b. Anxiety can help us perform well
    c. Anxiety is the "fight or flight" response
    d. Anxiety is something that we can cure

Knowledge Test 2

Subject ID: ___ ___ ___

Date: _____

Condition: pretrain, posttrain, postsup

Instructions: Please answer these questions to the best of your ability. If more than one question appears to be correct, please choose the best answer to the question.

1. Cognitive behavioral therapy (CBT) for child anxiety is divided into two sections comprised of:
    - **a. Psychoeducation and exposure**
    - b. Exposure and response prevention
    - c. Cognitive recognition and coping skills
    - d. Somatic recognition and cognitive recognition

2. Which of the following is the least helpful "attitude and action" a youth can take to help themselves when they are feeling anxious?
    - a. Problem solving
    - b. Coping thoughts
    - c. Deep breathing
    - **d. Getting a drink of water**
    - e. Progressive muscle relaxation

3. Identify which one is a thinking trap.
    - **a. The avoider: Staying away from situations you think are scary without trying first**
    - b. None of the above
    - c. The facer: Always facing situations that are scary
    - d. The optimist: Only seeing the positive and not looking at the bad things in the situation

4. The purpose of parent involvement in individual CBT for child anxiety is to:
    - a. Allow the child to show off to their parents and a chance to summarize what was accomplished
    - b. Tell the parents they should not be involved in treatment
    - **c. Provide treatment information to the parents and an opportunity for parental concerns to be discussed**
    - d. None of the above

5. Homework assignments are integral parts of CBT for child anxiety.
    a. True
    b. False

6. What is the most appropriate coping thought to counteract the following anxious thought: "I might fail that test"?
    a. I should just get over it
    b. It could happen
    c. It's not likely that I'll fail the test
    d. I don't want to take the test

7. When a child resists an exposure task, what can the therapist do to facilitate participation?
    a. brings the parent in the room to facilitate the exposure
    b. give choices to the child to communicate a sense of control
    c. insist that the child follow the program
    d. allow the child to play a game instead of doing the challenge

8. The most important aspect of the last session with the child is to _____.
    a. Have fun producing the commercial
    b. Bring closure to the therapeutic relationship
    c. A and B
    d. Build rapport with the child

9. Which example below best characterizes avoidance in an anxious youth?
    a. Not going to school because he has to give a presentation
    b. Not going to a friend's house because he has too much homework
    c. Not going out on Friday night because he would rather spend time with the family

10. Discussing self-talk is important in order to identify:
    a. The role that anxious feelings and somatic responses play in feeling anxious
    b. The need to eat a good meal before coming to the session
    c. The use of exposure to challenge anxious symptoms
    d. The role that cognition plays in anxiety

11. How best should a therapist display coping modeling?
    - **a. Disclosing a fear or anxiety provoking situation that the therapist experienced, how it felt, and how it was handled**
    - b. Disclosing a fear or anxiety provoking situation that the therapist experienced where something bad happened
    - c. Disclosing a fear of anxiety provoking situation that the therapist experienced, and how it was avoided
    - d. None of the above

12. To maximize gains, most exposure tasks call for children to remain in contact with the feared stimulus until SUDS are reduced by at least 50%.
    - **a. True**
    - b. False

13. Which statement below is true regarding the anxious response?
    - **a. Anxiety is evolutionary and adaptive**
    - b. Anxiety should be cured
    - c. All kids experience distressing and impairing amounts of anxiety
    - d. It's okay for your client to avoid things that frighten them

14. What kind of thought is, "That dog is big and scary, but he is my friend's dog and he probably won't hurt me."
    - a. Anxious
    - **b. Coping**
    - c. Normal

15. Prior to beginning the exposure tasks, the therapist should
    - a. Ask the parents for guidance
    - b. Show confidence in the child to be able to perform the tasks without guidance
    - **c. Make sure the child understands the FEAR plan and how it will be used**
    - d. Display anxiety about exposure tasks

16. Progressive muscle relaxation and deep breathing should be practiced together.
    - **a. True**
    - b. False

17. Identify when using SUDS is appropriate:
    - a. During the relaxation task
    - b. To determine how scared the child is during the first session.
    - c. As a coping skill for children to let their parents know their level of anxiety at home
    - **d. Providing feedback to the child about the level of anxiety in the context of the feared object/situation**

18. CBT for child anxiety calls for only one type of exposure with the client: in vivo situations.
    a. True
    b. False

19. What is the appropriate sequence for helping your client if they are feeling anxious?
    a. Identify their thoughts, identify their bodily sensations, take an attitude or action to help, rewarding themselves
    b. Identify their bodily sensations, identify their thoughts, reward themselves
    c. Identify why they are anxious, take an attitude or action to help
    d. Identify their bodily sensations, identify their thoughts, take an attitude or action to help, reward themselves

20. Which of the following is an example of a cognitive response to anxiety?
    a. Thoughts racing
    b. Fast heartbeat
    c. Not going to school

Knowledge Test 3

Subject ID: ___ ___ ___ ___

Date: _____

Condition: pretrain, posttrain, postsup

Instructions: Please answer these questions to the best of your ability. If more than one question appears to be correct, please choose the best answer to the question.

1. When a child attempts to not participate in an exposure task, what can the clinician do to encourage the child?
    a. Try to make sense of the resistance
    b. Reflect the child's resistance
    c. End the session and work on it next time
    d. Give choices to the child to allow them to feel a sense of control

2. It is recommended that parents be present in the room for all sessions in CBT for child anxiety.
    a. True
    b. False

3. What is the most appropriate coping thought to counteract the following anxious thought: "Everyone will laugh at me if I stutter when I read out aloud"?
    a. Get over it
    b. Just do it
    c. Everyone makes mistakes once in a while
    d. I'll probably be sweaty

4. Homework is an integral part of CBT for youth anxiety and is assigned in each session.
    a. True
    b. False
5. Which statement below is **not** true regarding the anxious response?
    a. Anxiety is evolutionary and adaptive
    b. Treatment for anxiety "turns down the volume" of anxiety
    c. All kids experience distressing and impairing amounts of anxiety
    d. Many kids with distressing and impairing anxiety try to avoid the situations that they fear

6. The least important aspect of the first session is to_____.
    a. Build rapport with the child
    b. Play a get to know each other exercise
    c. Play a fun game at the end of the session
    d. Ask child to speak at length about their anxiety

7. Which of the following is an action a youth can take to help themselves when they are feeling anxious?
    a. Problem solving
    b. Coping thoughts
    c. Deep breathing
    d. Progressive muscle relaxation
    e. All of the above

8. Which of the following is an example of an avoidant response to anxiety?
    a. Thoughts racing
    b. Fast heartbeat
    c. Not going to school because of a feared presentation

9. What is the appropriate sequence for helping your client if they are feeling anxious?
    a. Identify their bodily sensations, identify their thoughts, take an attitude or action to help, reward themselves
    b. Nothing, they will be able to help themselves after receiving treatment
    c. Help them problem solve
    d. Help them come up with coping thoughts

10. One treatment for child anxiety is cognitive behavioral therapy (CBT). It is comprised of two sections:
    a. Behavior training and cognitive coping skills
    b. Imaginal and in vivo exposures
    c. Relaxation training and exposures
    d. Psychoeducation and exposure

11. Which example below best characterizes parental accommodation?
    a. Allowing the child to not go to school because he has to give a presentation and he's scared
    b. Allowing the child to not going to a friend's house because he has too much homework
    c. Allowing the child to not go out on Friday night because he would rather spend time with the family

12. The purpose of SUDS ratings are to:
    a. allow the child to measure her own rating of effort and performance
    b. allow the child to show off to their parents and a chance to summarize what was accomplished
    c. allow the child to indicate when it is time to stop the exposure
    d. allow the child to build rapport with the therapist

13. What kind of thought is, "Although I feel a bit scared about that big dog, my parents probably wouldn't let me pet it if it were dangerous."
    a. Anxious
    b. Coping
    c. Normal

14. Identify which one is not a thinking trap.
    a. Walking with blinders: Only seeing the negative and overlooking good in the situation
    b. The repetitor: If it happened once it is always going to happen that way
    c. The catastrophiser: Always thinking the worst ever is going to happen
    d. The somatizer: Focusing on bodily feelings

15. To maximize gains, most exposure tasks call for children to stop being in contact with the feared stimulus if the SUDS are reduced by 10%.
    a. True
    b. False

16. Progressive muscle relaxation involves the tensing and relaxing of muscles from the head down to the toes.
    a. True
    b. False

17. When the exposure task is too difficult for the child, the therapist can
    a. Force them to engage in it
    b. Allow them to not participate without discussion as to not make them feel badly
    c. Break down the task into parts in order to find success to make sure the child does not feel like the whole task was a failure
    d. Talk to the parents about the child's inability to participate

18. What is coping modeling?
    a. When the therapist models the child's coping skills
    b. When the therapist tells the child how they should cope in an anxious situation
    c. when the therapist discloses a prior fear which made her feel anxious and how it was handled
    d. A and C

19. CBT for youth anxiety calls for only one type of exposure with the client: imaginal exposure
    a. True
    b. False

20. Cognitive restructuring is discussed in reference to:
    a. the role that anxious thoughts plays in anxiety
    b. the role that somatic responses play in feeling anxious
    c. the use of exposure to challenge anxious symptoms
    d. rating performance and rewarding efforts for coping with situations

7. Provider Efficacy Questionnaire (PEQ)

Provider Efficacy Questionnaire

With each of the following questions regarding the delivery of Cognitive Behavioral Therapy (CBT) to clients with an anxiety disorder, please rate your confidence level on a scale of 0-10; 0 being not confident at all, and 10 being extremely confident.

How confident are you in your ability as a therapist to help your client:

a. Identify their somatic responses? _____

b. Identify their anxious cognitions? _____

c. Use relaxation strategies (e.g., breathing, progressive muscle relaxation)? _____

d. Challenge anxious thoughts? ____

e. Use problem solving skills? _____

f. Use positive reinforcement? ____

g. Setting up exposure tasks (e.g., FEAR hierarchy)? ____

h. Implementing exposure tasks? _____

i. Teach and role-play the FEAR plan? _____

8. Adherence and Skill Checklist

ID NUMBER:
Condition: Colgate, Temple, Maret
CODER:

Adherence and Skill Checklist

1. Preparing the child for the exposure

    a. Feeling Frightened/Somatic Symptoms of Anxiety
        i. Did the therapist help the child identify what physical feelings they might experience during the exposure (e.g. stomach ache)?

        Yes No

    b. Expecting Bad Things to Happen/Anxious Cognitions
        i. Did the therapist help the child identify what anxious thoughts they might have during the exposure (e.g., I might make a mistake)?

        Yes No

    c. Attitudes and Actions that can Help
        i. Did the therapist mention or have the child practice deep breathing and/or progressive muscle relaxation to cope with anxious bodily feelings (e.g., belly breathing, squeezing lemons)?

        Yes No

        ii. Did the therapist help the child generate a coping thought as a way to cope with anxious thoughts (e.g., I can do it, Even if I make a mistake, I can get through it)?

        Yes No

        iii. Did the therapist walk the child through problem-solving possible problems that may come up during the exposure (e.g., what to do if you make a mistake – walk away, ask the question again)?

        Yes No

    d. Rewards
        i. Did the therapist plan a reward with the child for facing their fear (e.g., special time with therapist, ice cream)?

        Yes No

Core Adherence: /6

2. Other general considerations

    a. Did the therapist ask the child's anxiety rating (e.g., SUDS rating) at any point (e.g., What is your number, fear rating, etc.)?

    Yes No

    b. Did the therapist use cognitive restructuring techniques to help the child come up with a coping thought (e.g., How likely is it that you will mess up? Has that ever happened to anyone you know before? What is the worst that can happen)?

    Yes No

    c. Did the therapist have the child imagine engaging in the exposure (e.g., practicing calling the grandmother?)

    Yes No

    d. Was the therapist a coping model (i.e., gave an example of when they felt anxious and how they coped?)

    Yes No

Additional Adherence factors: /4

TOTAL ADHERENCE SCORE (CORE+ADDITIONAL): _____/10

Skill Ratings

1. How skillful was the clinician's performance in preparing the child for the exposure using the cognitive-behavioral framework? (i.e. how well did the individual show the skills they learned?)

1	2	3	4	5	6	7
Not well						Very Well

2. How coherent was the presentation of the exposure task? (i.e. how all over the place was the therapist, how organized were they, did they follow the organization outlined in the adherence section)

1	2	3	4	5	6	7
Not coherent						Very coherent

APPENDIX B

INVESTIGATOR-CREATED MEASURES

LIST OF MEASURES

1. Consultation Coding and Rating Scale (CCRS) Manual
2. CCRS Minute Coding Sheet
3. CCRS Summary Rating Sheet
4. Identification and Treatment of Anxious Youth – Revised

1. Consultation Coding and Rating Scale Manual

Consultation Coding and Rating System
Definition of Terms

General Guidelines

- For timing, refer to whole minutes (e.g., minute 1 is 0-60 seconds, minute 2 is 61 to 120 seconds, minute 3 is 121 to 180 seconds, and so on)
- Press pause when it reaches the mark. You will notice that there will be a lag of audio that continues after you press pause. Include that as the ending part of the minute you are coding.
- Use the transcription as an aid in the coding/rating process. However, given that the transcriptions are likely imperfect, always go by what is spoken on the call if it differs from what is written in the transcription.
- If you notice an error in the transcriptions with regards to the therapists on the call, contact me. At times, it is possible that therapists were marked incorrectly. If you feel strongly that someone was marked incorrectly and you feel like you can identify the therapists based on their voices, go with your gut when rating and then notify me of the change so that I can verify it.
- Buzz words have been added in some sections of the manual. If a call minute contains a buzz word, automatically mark it down in the appropriate category.
- Other useful notes:
    - Generally double-counting is allowed unless there are specific instructions under different items that prohibit double-counting
    - If content overlaps across both minutes, count it as occurring in both (e.g., if Rinad asks a question or is praising someone and it occurs across two minutes, count it in both).

Minute to Minute Codes

Part 1: Content

1.) General CBT model

- Any discussion related to or reference made to the cognitive-behavioral model of anxiety
- The CBT model asserts that anxiety consists of three components: somatic arousal, anxious cognitions, and behavior (typically avoidant behavior)

- Anxiety is a cycle of these three components. Each component impacts the other (e.g., somatic arousal can prompt anxious cognitions and avoidance behavior vice versa)
- Look for when Rinad uses the word "triangle" or refers to the "cognitive-behavioral triangle"
- The rationale for CBT is that we can interject at any part of the cycle and it will have a ripple effect on the whole cycle
- Thus, CBT treatment involves specific techniques to target somatic arousal (relaxation), anxious cognitions (cognitive restructuring) and avoidant behavior (exposures)
- *Note:*
    - Can mark down even if Rinad only mentions or refers to "CBT model" or "CB model"
    - If Rinad is discussing components of treatment in relation to anxiety, she must explicitly refer to the CB model or how treating one of the three components affects the other components in order to count this.

2.) Anxious thoughts or arousal

- Discussion of or reference made to the F and E steps of the treatment
    - F step (feeling frightened?): Identification of somatic arousal
        - Buzz words: somatic symptoms, physiological arousal, any specific symptom (e.g, trouble breathing, fast-beating heart)
    - E step (expecting bad things to happen?): Identification of anxious cognitions (thoughts)
        - Buzz words: thought bubble, self-talk, anxious thoughts, cycle of thoughts (in relation to anxiety)
- Any mention or discussion related to the child's anxious thoughts or somatic symptoms
- Sometimes anxious thoughts may be referred to as worries or fears. In order to count that discussion under this item, it is required for the consultant or therapist to use the words "thoughts" or "self-talk."
- When "thoughts" are mentioned, they must specifically be discussed in relation to anxiety, not general thoughts or other kinds of thoughts.
- Identification of feelings in general are not counted here. Must specifically be identification of anxious feelings.
- When Rinad or therapists discuss self-monitoring, include that here if they specifically refer to thoughts or somatic symptoms. If they only mention self-monitoring the anxiety, do not count that. That is too vague because it is unclear if they are monitoring thoughts, somatic symptoms, or simply severity ratings.

- Can count during role-plays or demonstrations of how to develop the story for an imaginal exposure, given that the content of the story are the anxious thoughts or expectations that the child has regarding that situation
- *Note:* Can mark down even if only briefly mentioned or referred to

3.) Relaxation

- Discussion of or reference to relaxation in order to address somatic arousal
- Examples include:
    - Deep breathing
    - Progressive muscle relaxation (e.g., squeezing lemons)
- *Note:* Can mark down even if only briefly mentioned or referred to

4.) Coping Thoughts/Cognitive Restructuring

- Discussion of what coping thoughts are and how to develop coping thoughts for clients
- Include when Rinad or therapists given an example of a coping thought
- May be referred to as "challenging" anxious thoughts
- Buzz word = coping thoughts
- Do not automatically count if the term "coping skills" is used. Rinad or the therapist must explicitly refer to coping thoughts.
- Discussion or illustration of what cognitive restructuring is and how to use it
    - Cognitive restructuring involves questioning/evaluating thoughts usually in order to come up with coping thought
- *Note:* Can mark down even if only briefly mentioned or referred to

5.) Problem-solving

- Discussion about how to problem-solve anxious situations or suggestion to use problem-solving with the child
- Might be referred to when describing the A step (which stands for Attitudes and Actions that can Help)
- Problem-solving steps include:
    - Define the problem
    - Come up with solutions (even silly ones)
    - Evaluate solutions
    - Choose one and see how it goes
- *Note:*
    - Only mark this down if Rinad is teaching about problem-solving or discussing its use with a client. Do not mark problem-solving if Rinad uses problem-solving in order to address barriers, unless Rinad is purposely using this as an example of the problem-solving steps.

6.) Exposures

- Any discussion related to exposing the child to their feared situation
- Include discussion of fear ladder/hierarchy
- This can be counted if Rinad or therapist talk about exposures without using the word "exposure" if they describe a scenario of the child facing his/her fears
- May also be phrased as "simulating" an anxious experience
- When we work with kids, we do not use the term exposures, we use the term challenges. Rinad and therapists may have used "challenges" in place of "exposures." If the context suggests that "challenges" refers to "exposures," count that here.
- Buzz word = exposure, "facing fears"
- Exposures include:
    - In vivo exposures (actually putting the child in an anxiety-provoking situation)
    - Imaginal exposures (having the child imagine themselves in their feared situation)
        - Rinad or the therapists do not have to explicitly refer to this as an imaginal exposure. They can discuss how they walked the child through a feared scenario with the goal of habituation to anxiety.
- *Note:* Can mark down even if only briefly mentioned or referred to

7.) Homework

- Reference made to homework assignments, often called STIC (Show That I Can) tasks or Take-Home Projects
- Discussion related to assigning out-of-session homework and reviewing homework for children
- Homework could also involve at-home exposures (if Rinad or the therapist discusses at-home exposures, this would be double-counted for homework and exposures)
- *Note:* Do not mark if Rinad is assigning the therapists homework

8.) Positive Reinforcement

- Discussion or reference made to the R step (which stands for Results and Rewards)
- Discussion related to positively reinforcing child for effort, brave behavior, completion of homework, and/or completion of exposures, etc.
- Discussion about types of positive reinforcement (e.g., verbal praise, tangible rewards such as prizes, social rewards such as playing games, or use of a point system)

- Buzz word = R step
- Count when the therapist gives a specific example of praise/positive reinforcement they gave to a child
- *Note:*
    - This does not refer to Rinad positively reinforcing the therapists in the call. It refers to her discussion of positive reinforcement with clients.
    - However, if during a role-play the person playing the role of the therapist praises the child, you can count that as positive reinforcement. Do not double-count as praise.

9.) Case review

- Any discussion of a particular case brought up by the therapist that involves informing Rinad and the other therapists about background and current information regarding the case.
- In order for this to count, the therapist has to be speaking about the client at some point during the minute.
- If the therapist repeats the same information in a later minute that he/she discussed earlier, still count that as case review.
- *Note:*
    - This item is automatically double-counted as "case discussion of a therapist example"
    - If the minute does not involve the therapist talking about or providing information about his/her client, but instead involves Rinad or other therapists talking about the client, that would not be counted here but would be counted only as "case discussion of a therapist example"

10.) Case appropriateness

- Refers to any discussion related to determining whether a child is a good candidate for *CBT for child anxiety*
- This could be in reference to a real case or a hypothetical case
- Discussion may come up about children who have comorbid disorders and either the therapist or Rinad discusses whether they would be appropriate candidates for CBT for child anxiety
    - Do not automatically mark if Rinad mentions comorbidity unless she discusses comorbidity in regard to it potentially interfering with treatment and determining if CBT for the anxiety should be delivered
- Include discussion related to assessing clients in order to determine their primary disorder or whether they do have anxiety
- Buzz word = treatment match, treatment fit
- *Note:*
    - Mark if either Rinad or therapists are talking

- There may be times when you hear a case reviewed and red flags pop up in your mind about whether or not the case is appropriate. Do not mark this code unless the issue of appropriateness is explicitly raised by either Rinad or the therapists.

11.) Organizational Settings/Systems

- Discussion of or reference made to delivering the treatment in various organizational systems or settings, which can include the organizational systems of the therapists or organizational settings where the children receive treatment.
  - At times a therapist may refer to various settings pertinent to the child, such as their school and services they are receiving at school. We would only count that if the services they are referring to are CBT. Do not count discussion of special education services at school.
- Discussion related to how these organizational settings function as a system of care or the context in which they are implementing the treatment
- *Note:*
  - Can mark down even if only briefly mentioned or referred to
  - May overlap with barriers if discussion of organizational system pertains to difficulties implementing treatment
  - DO NOT count discussion or reference made to CAADC

12.) Flexibility/adaptation

- Discussion about the inherent flexibility of CBT (i.e., how you can teach the topics in various ways)
  - Examples:
    - Discussion of how you can choose different activities for the same topics
      - E.g., body drawings versus talking about body reactions
      - E.g., feelings collage vs. feelings charades
      - E.g, post-it note method to create fear hierarchy vs. using the ladder in the workbook
- Discussion related to adapting or flexibly implementing treatment to meet the needs of the client
  - Examples:
    - How to make the treatment developmentally appropriate
    - Any tweaking of the treatment or adaptive delivery of it in response to different client presentations or disorders
      - E.g,. different exposure tasks tailored for different disorders
- Discussion related to adapting the treatment due to treatment setting
  - Examples:

        - How to give rewards if the therapist's organization does not have a budget to buy small prizes
        - How to condense the treatment in fewer sessions because the setting only allows a certain number of sessions
- *Note:* Can mark down if there is any mention of changing/adapting/flexibly implementing the treatment in order to meet the needs of clients or organizations or therapist preferences

13.) Barriers

- In general, look for phrases such as "complicated things" or "made things difficult" to help figure out whether something is a barrier
- Discussion related to obstacles therapists are facing or anticipate facing in their work settings when implementing the *CBT for child anxiety*
    - Examples:
        - Difficulty delivering treatment because of time constraints of setting (only allowed up to a certain number of sessions)
        - Insurance won't cover treatment
        - Organization does not support the treatment
    - *Note:* Only count as a barrier if discussion of these issues pertains to them interfering with or getting in the way of treatment. If the therapist simply mentions them as background information, but does not refer to them as causing problems, do not count.
- Discussion related to personal obstacles faced by therapists when implementing the treatment
    - Examples:
        - Lack of confidence in delivering the treatment
        - Lack of knowledge regarding how to deal with certain clients/situations
        - Doubt that the treatment will help
        - Difficulty/hesitation conducting exposures because of therapist's anxiety
- *Note:*
    - We are no longer counting barriers specific to the client (e.g., transportation, comorbidity) unless the therapist reports that they are having difficulty addressing client barriers due to their own anxiety, lack of confidence, or lack of knowledge

14.) Technical Issues

- Discussion related to difficulties with the web conferencing technology
    - May come up when Rinad or therapists have difficulty hearing each other

    - Buzz phrase = "Can you hear me?"
- Count when loss of audio happens, such that you are not able to comprehend what was said
    - If the transcribers were unable to decipher what was said and you cannot understand it yourself due to sound problems, count that here.
- Also, count discussion related to the web-conferencing capabilities or when Rinad discusses posting something to the website

Part 2: Methods

1.) Case discussion of consultant example

- When Rinad describes a real case in order to illustrate a point
    - This could includes a personal case of Rinad's or when she brings up an example of a therapist from another call
- When other therapists discuss the case brought up by Rinad
- Note, this is Rinad discussing a case, not role-playing or modeling it
- Do not count when Rinad brings up general types of cases she has seen. Only count when she brings up a specific case.

2.) Case discussion of therapist example

- When any therapist brings up a real case example
- When Rinad or other therapists discuss the case brought up by the therapist
- Again, not role-playing it or modeling it
- *Note:* This item will often double-count as "case review."

3.) Informing

- When Rinad informs or instructs the therapists regarding anything related to anxiety, CBT, or other treatments
- This is a broad category that reflects both the official didactics portion of the call as well as throughout the call (e.g., during case review) when Rinad teaches/informs/instructs the therapists about issues pertinent to their cases.
    - In this latter instance, this is distinguished from "feedback/suggestions" in that this is coded when Rinad provides information/rationale for her feedback/suggestions

4.) Didactics

- When Rinad teaches about CBT or relevant topics during the official didactic portion of treatment
- Rinad often signifies when the official didactic portion of the call is about to start by using the term "didactics"

- This can take the form of Rinad lecturing to the therapists, describing treatment or research findings or what she does with clients, teaching therapists about the treatment or informing the therapists of relevant information
- During "open" didactic calls, only count this when Rinad launches into a clear didactic discussion. Do not count if the call is restricted to case discussion.
- *Note:* This item is automatically double-counted as the broader "informing" code.

5.) Modeling

- Rinad demonstrates/models how to deliver treatment or how to speak with the client, even if she only demonstrates a brief sentence or phrase
- This differs from a role-play in that Rinad does not demonstrate the skill with someone pretending to be the client
- Count when Rinad models coping thoughts
- Also, include if a therapist models treatment for another therapist
    - However, do not mark it as modeling if this is in the context of a role-play
    - Also, do not mark as modeling if the therapist appears to be practicing rather than modeling (as that would be marked as skill rehearsal)

6.) Therapist Role-play/Skill Rehearsal

- Whenever therapists engage in practicing the skills (either with each other or with Rinad by pretending to deliver the treatment)
- Do not count if Rinad plays the role of therapist
- Usually will involve at least two people. However, can involve only one person if person is practicing skill in front of others (not modeling it in order to teach others, but practicing it in front of others).

7.) Consultant Role-play

- When Rinad is involved in the role-play as the therapist

8.) Feedback/Suggestions

- Rinad or other therapists provide feedback/suggestion to therapists either following a role-play or discussion of therapist's use of the treatment, or in response to something the therapist said or did
- MUST be in response to something the therapist did or said (as opposed to when Rinad provides general suggestions and recommendations during the didactic portion of calls)
- May be in response to a question posed by a therapist (e.g., when a therapist asks what Rinad would do in a given situation)
- Examples:

    - Rinad makes a suggestion or recommendation to do something (e.g., gather more information about a client)
    - Another therapists makes a suggestion
- *Note:*
    - Can count if Rinad recommends that a therapist keep doing something they have been doing (e.g., says "keep it up" or "do more of that")
    - May be double-counted as "informing" if Rinad provides a rationale for why she would do things differently (e.g., "Children who are 9 have a hard time grasping this concept, therefore, I would start by doing [blank] instead")

9.) Praise

- Any statement of praise spoken by Rinad toward the therapists (outside the context of a role-play or modeling)
- Includes general and specific forms of praise
    - Examples:
        - I really liked how you explained the FEAR plan
        - Great job!
        - Excellent!
        - Thanks!
- *Note:*
    - Do NOT count if praise occurs within the context of a role-play (but look for it following the end of the role-play)

10.) Prompting/Probing/Questioning

- Any time Rinad poses a question or a statement to the group or a therapist with the goal of fostering a discussion or eliciting a response
- Can include close-ended or open-ended questions

11.) Supporting

- Statements of empathy or validation
    - Examples include:
        - I understand where you are coming from
        - I've felt that way myself
        - Yes, that is frustrating …
        - That's tough…
        - Can also include as supporting when Rinad is empathetic or caring about a therapist being sick
- Statements of support or offering of assistance
    - Examples include:

- "I'm here to support you"
- "I'm happy to review that for you if you'd find it helpful"
- "I will look up more info on that for you"
- "I will post this on the website…"
    - (this example would double-count as technical issues)

Summary Ratings

Part 1: Content

For each content area, rate how extensively it was discussed during the call using the following scale:

0	1	2	3	4	5	6
Not at all discussed		**Some discussion**		**Considerable discussion**		**Extensive discussion**

When determining your rating, keep in mind:

- The amount of discussion
- The depth of discussion

0= no discussion at all
1 = brief reference to the topic
2 = some discussion beyond brief reference (but less than 25%)
3 = discussion of some depth (~25%)
4 = lengthy discussion (~50%)
5 = did not last for the entire call but lasted a long time (~75%)
6 = lasted almost the entire call (<90%)

For item 2:

- When determining your rating, take into consideration the amount of discussion of the identification of anxious thoughts or arousal, relaxation, cognitive restructuring, coping thoughts, problem-solving, exposure, homework, and positive reinforcement.

Part 2: Methods

For each method, rate how extensively it was used during the call using the following scale:

0	1	2	3	4	5	6
Not at all present or used		**Somewhat present or used**		**Considerably present or used**		**Extensively present or used**

When determining your rating, keep in mind:

- The amount of use

0 = not used at all
1 = used once or very briefly
2 = used at least twice or lasted for at least a couple minutes
3 = used at least a few times but lasted for less than 25% of call
4 = used at least a few times and lasted for at least 25% of call
5 = used often and lasted for more than 50% (but less than 75%) of the call
6 = lasted for more than 75% of the call

For item 11 (Active Learning):

- Take into account modeling and role-plays
- Although we are no longer coding the minutes for reflective practice or parallel processes, if they occur, you can account for them in this summary rating

For item 13:

- Consider the "supporting" and "praise" minute codes. We are no longer rating this based on the general feeling of warmth and support emitted from Rinad. Strictly go by statements of support, empathy, or praise, or by Rinad offering to assist therapists in some way.

For item 14a:

- Answer yes if she verbalized the agenda or it was written on the board

For item 14b:

- Answer "yes" if Rinad followed agenda in order and covered all she said she would cover

- Answer “mostly” if Rinad mostly followed order and covered more than 50% of what she proposed
- Answer “no” if Rinad covered less than 50% of proposed agenda
- If Rinad did not propose an agenda, circle N/A

Part 3: Therapist Involvement

Item 17:

- Take into account all therapists who spoke because this item is meant to capture the ratio of therapist discussion (as opposed to Rinad talking)

Item 18:

- Transfer the names found at the top of the transcription onto your coding sheet in *alphabetical order*
- When deciding the number, take into account the following:
    - How much the therapist participated in discussion
    - Whether or not the therapist discussed his/her own case example or participated in discussion about another therapist’s case or a hypothetical case
    - Whether or not the therapist participated in a role-play (more weight is given to those who participate in the role-play as the therapist rather than the child)
- Here are anchors for the numbers:
    - 0 = the therapist did not talk at all
    - 1 = the therapist did not talk beyond saying hello
    - 2 = therapist participated in some discussion (but did not participate in role play or discuss cases in any depth)
    - 3 = therapist participated in discussion to some depth or participated in the role-play as the child
    - 4 = therapist participated in case discussion and either extensively discussed a personal case or participated in a role-play (but not both)
    - 5 = therapist participated in discussion, brought up a personal case, and participated in a role-play (as the child)
    - 6 = therapist participated in discussion, brought up a personal case, and participated in a role-play (as the therapist)

2. CCRS Minute Coding Sheet

	1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	16	17	18	19	20	21	22	*TOTALS*
Content																							
1. General CBT Model	1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	16	17	18	19	20	21	22	
2. Anxious thoughts or arousal (F&E steps)	1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	16	17	18	19	20	21	22	
3. Relaxation	1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	16	17	18	19	20	21	22	
4. Coping thoughts/ Cognitive Restructuring	1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	16	17	18	19	20	21	22	
5. Problem-solving	1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	16	17	18	19	20	21	22	
6. Exposure	1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	16	17	18	19	20	21	22	
7. Homework	1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	16	17	18	19	20	21	22	
8. Positive reinforcement (R step)	1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	16	17	18	19	20	21	22	
9. Case review	1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	16	17	18	19	20	21	22	
10. Case appropriateness	1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	16	17	18	19	20	21	22	
11. Organizational Settings/Systems	1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	16	17	18	19	20	21	22	
12. Flexibility/adaptation	1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	16	17	18	19	20	21	22	
13. Barriers	1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	16	17	18	19	20	21	22	
14. Technical Issues	1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	16	17	18	19	20	21	22	
Methods																							
1. Case discussion of consultant example	1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	16	17	18	19	20	21	22	
2. Case discussion of therapist example	1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	16	17	18	19	20	21	22	
3. Informing	1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	16	17	18	19	20	21	22	
4. Didactics	1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	16	17	18	19	20	21	22	
5. Modeling	1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	16	17	18	19	20	21	22	
6. Therapist Role-play/Skill Rehearsal	1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	16	17	18	19	20	21	22	
7. Consultant Role-play	1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	16	17	18	19	20	21	22	
8. Feedback/Suggestions	1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	16	17	18	19	20	21	22	
9. Praise	1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	16	17	18	19	20	21	22	
10. Prompts, Probes, Questions	1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	16	17	18	19	20	21	22	
11. Supporting	1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	16	17	18	19	20	21	22	

	23	24	25	26	27	28	29	30	31	32	33	34	35	36	37	38	39	40	41	42	43	44	*TOTALS*
Content																							
1. General CBT Model	23	24	25	26	27	28	29	30	31	32	33	34	35	36	37	38	39	40	41	42	43	44	
2. Anxious thoughts or arousal (F&E steps)	23	24	25	26	27	28	29	30	31	32	33	34	35	36	37	38	39	40	41	42	43	44	
3. Relaxation	23	24	25	26	27	28	29	30	31	32	33	34	35	36	37	38	39	40	41	42	43	44	
4. Coping thoughts/ Cognitive Restructuring	23	24	25	26	27	28	29	30	31	32	33	34	35	36	37	38	39	40	41	42	43	44	
5. Problem-solving	23	24	25	26	27	28	29	30	31	32	33	34	35	36	37	38	39	40	41	42	43	44	
6. Exposure	23	24	25	26	27	28	29	30	31	32	33	34	35	36	37	38	39	40	41	42	43	44	
7. Homework	23	24	25	26	27	28	29	30	31	32	33	34	35	36	37	38	39	40	41	42	43	44	
8. Positive reinforcement (R step)	23	24	25	26	27	28	29	30	31	32	33	34	35	36	37	38	39	40	41	42	43	44	
9. Case review	23	24	25	26	27	28	29	30	31	32	33	34	35	36	37	38	39	40	41	42	43	44	
10. Case appropriateness	23	24	25	26	27	28	29	30	31	32	33	34	35	36	37	38	39	40	41	42	43	44	
11. Organizational Settings/Systems	23	24	25	26	27	28	29	30	31	32	33	34	35	36	37	38	39	40	41	42	43	44	
12. Flexibility/adaptation	23	24	25	26	27	28	29	30	31	32	33	34	35	36	37	38	39	40	41	42	43	44	
13. Barriers	23	24	25	26	27	28	29	30	31	32	33	34	35	36	37	38	39	40	41	42	43	44	
14. Technical Issues	23	24	25	26	27	28	29	30	31	32	33	34	35	36	37	38	39	40	41	42	43	44	
Methods																							
1. Case discussion of consultant example	23	24	25	26	27	28	29	30	31	32	33	34	35	36	37	38	39	40	41	42	43	44	
2. Case discussion of therapist example	23	24	25	26	27	28	29	30	31	32	33	34	35	36	37	38	39	40	41	42	43	44	
3. Informing	23	24	25	26	27	28	29	30	31	32	33	34	35	36	37	38	39	40	41	42	43	44	
4. Didactics	23	24	25	26	27	28	29	30	31	32	33	34	35	36	37	38	39	40	41	42	43	44	
5. Modeling	23	24	25	26	27	28	29	30	31	32	33	34	35	36	37	38	39	40	41	42	43	44	
6. Therapist Role-play/Skill Rehearsal	23	24	25	26	27	28	29	30	31	32	33	34	35	36	37	38	39	40	41	42	43	44	
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8. Feedback/Suggestions	23	24	25	26	27	28	29	30	31	32	33	34	35	36	37	38	39	40	41	42	43	44	
9. Praise	23	24	25	26	27	28	29	30	31	32	33	34	35	36	37	38	39	40	41	42	43	44	
10. Prompts, Probes, Questions	23	24	25	26	27	28	29	30	31	32	33	34	35	36	37	38	39	40	41	42	43	44	
11. Supporting	23	24	25	26	27	28	29	30	31	32	33	34	35	36	37	38	39	40	41	42	43	44	

	45	46	47	48	49	50	51	52	53	54	55	56	57	58	59	60	61	62	63	64	65	66	*TOTALS*
Content																							
1. General CBT Model	45	46	47	48	49	50	51	52	53	54	55	56	57	58	59	60	61	62	63	64	65	66	
2. Anxious thoughts or arousal (F&E steps)	45	46	47	48	49	50	51	52	53	54	55	56	57	58	59	60	61	62	63	64	65	66	
3. Relaxation	45	46	47	48	49	50	51	52	53	54	55	56	57	58	59	60	61	62	63	64	65	66	
4. Coping thoughts/ Cognitive Restructuring	45	46	47	48	49	50	51	52	53	54	55	56	57	58	59	60	61	62	63	64	65	66	
5. Problem-solving	45	46	47	48	49	50	51	52	53	54	55	56	57	58	59	60	61	62	63	64	65	66	
6. Exposure	45	46	47	48	49	50	51	52	53	54	55	56	57	58	59	60	61	62	63	64	65	66	
7. Homework	45	46	47	48	49	50	51	52	53	54	55	56	57	58	59	60	61	62	63	64	65	66	
8. Positive reinforcement (R step)	45	46	47	48	49	50	51	52	53	54	55	56	57	58	59	60	61	62	63	64	65	66	
9. Case review	45	46	47	48	49	50	51	52	53	54	55	56	57	58	59	60	61	62	63	64	65	66	
10. Case appropriateness	45	46	47	48	49	50	51	52	53	54	55	56	57	58	59	60	61	62	63	64	65	66	
11. Organizational Settings/Systems	45	46	47	48	49	50	51	52	53	54	55	56	57	58	59	60	61	62	63	64	65	66	
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14. Technical Issues	45	46	47	48	49	50	51	52	53	54	55	56	57	58	59	60	61	62	63	64	65	66	
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2. Case discussion of therapist example	45	46	47	48	49	50	51	52	53	54	55	56	57	58	59	60	61	62	63	64	65	66	
3. Informing	45	46	47	48	49	50	51	52	53	54	55	56	57	58	59	60	61	62	63	64	65	66	
4. Didactics	45	46	47	48	49	50	51	52	53	54	55	56	57	58	59	60	61	62	63	64	65	66	
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10. Prompts, Probes, Questions	45	46	47	48	49	50	51	52	53	54	55	56	57	58	59	60	61	62	63	64	65	66	
11. Supporting	45	46	47	48	49	50	51	52	53	54	55	56	57	58	59	60	61	62	63	64	65	66	

3. CCRS Summary Rating Form

Consultation Coding and Rating System:
SUMMARY FORM

PART 1: CONTENT

After listening to the entire consultation call and completing the minute-to-minute codes, please answer the following rating questions using the key below. Please refer to manual to help guide you in your ratings.

0	**1**	**2**	**3**	**4**	**5**	**6**
Not at all discussed		**Some discussion**		**Considerable discussion**		**Extensive discussion**

1. General CBT Model
Did the consultant or therapists review the CBT model and the principles underlying it?

0	1	2	3	4	5	6
No Discussion		Some Discussion		Considerable Discussion		Extensive Discussion

2. Specific CBT Content, Techniques or Treatment Components
Did the consultant or therapists on the call discuss or review specific CBT techniques or components or use CBT language? (*Refer to content minute-to-minute codes 2-8*)

0	1	2	3	4	5	6
No Discussion		Some Discussion		Considerable Discussion		Extensive Discussion

3. Case Review
Did the consultant or therapists on the call review specific therapist cases?

0	1	2	3	4	5	6
No Discussion		Some Discussion		Considerable Discussion		Extensive Discussion

4. Case Discussion of Therapist Example
To what extent was there case discussion of a therapist case example?

0	1	2	3	4	5	6
No Discussion		Some Discussion		Considerable Discussion		Extensive Discussion

5. Case Appropriateness
Did the consultant or therapists on the call discuss issues pertaining to identifying appropriate cases for the treatment?

0	1	2	3	4	5	6
No Discussion		Some Discussion		Considerable Discussion		Extensive Discussion

6. Flexibility/Adaptation
Did the consultant or therapists on the call discuss the flexibility of CBT or how to flexibly adapt treatment to meet the demands of work settings or individual clients?

0	1	2	3	4	5	6
No Discussion		Some Discussion		Considerable Discussion		Extensive Discussion

7. Barriers of Implementation
Did the consultant or therapists on the call discuss barriers of implementation they are experiencing at their work settings or within themselves?

0	1	2	3	4	5	6
No Discussion		Some Discussion		Considerable Discussion		Extensive Discussion

PART 2: METHODS

Please answer the following questions using the key below:

0	**1**	**2**	**3**	**4**	**5**	**6**
Not at all present or used		**Somewhat present or used**		**Considerably present or used**		**Extensively present or used**

8. Case Discussion of Consultant Example
To what extent was there case discussion of a consultant case example?

0	1	2	3	4	5	6
No Discussion		Some Discussion		Considerable Discussion		Extensive Discussion

9. Informing
To what extent did the consultant use didactic/instructing/informing strategies (considering both official didactic portions of the call and informing throughout case discussions and the rest of the call)?

0	1	2	3	4	5	6

Did Not Use	Some Use	Considerable Use	Extensive Use

10. Didactic

To what extent did the consultant incorporate official didactic segments into the call?

0	1	2	3	4	5	6
Did Not Use		Some Use		Considerable Use		Extensive Use

11. Active Learning Techniques

To what extent did the consultant use active learning techniques? Consider the following as active learning techniques: modeling, role-play/behavioral rehearsal, reflective practice, parallel processes

0	1	2	3	4	5	6
Did Not Use		Some Use		Considerable Use		Extensive Use

12. Active Learning Techniques plus Case Discussion

To what extent were active learning techniques and case discussion present on the call? Consider the same active learning techniques listed in item 11 and the amount of back and forth case discussion among therapists and the consultant.

0	1	2	3	4	5	6
None		Some		Considerable		Extensive

13. Supporting

To what extent did the consultant appear supportive of therapists? Consider the statements of support and praise given by the consultant.

0	1	2	3	4	5	6
Unsupportive		A little supportive		Considerably Supportive		Extensively Supportive

14. Agenda

a.) Did the consultant, at the start of the call, set or display an agenda?

Yes No

b.) Did the consultant follow the agenda?

Yes No Mostly N/A

PART 3: THERAPIST INVOLVEMENT

After listening to the consultation call, please answer the following questions. Feel free to use the call transcription as a reference when answering the questions.

15. Overall Therapist Involvement:
Overall, what amount of time did therapists spend talking during the call?

0	1	2	3	4	5	6
0 mins/ 0%	1 – 9mins/ 1-15%	10–19min/ 16-32%	20–29min/ 33-50%	30–39min/ 51-65%	40–49min/ 66-80%	50–60min/ 81-100%

16. Individual Therapist Involvement:
For each therapist on the call, rate how involved they were during the call, taking into account the amount of time they spoke, their discussion of personal cases, and their participation in role-plays. Use the rating scale below. Please write down the names in ***alphabetical order***.

0	1	2	3	4	5	6
Uninvolved		Somewhat Involved		Considerably Involved		Extensively Involved

1. (First name _____): _____
2. (First name _____): _____
3. (First name _____): _____
4. (First name _____): _____
5. (First name _____): _____
6. (First name _____): _____
7. (First name _____): _____
8. (First name _____): _____
9. (First name _____): _____
10. (First name _____): _____
11. (First name _____): _____
12. (First name _____): _____
13. (First name _____): _____
14. (First name _____): _____
15. (First name _____): _____
16. (First name _____): _____
17. (First name _____): _____
18. (First name _____): _____
19. (First name _____): _____
20. (First name _____): _____

4. Identification and Treatment of Anxious Youth - Revised

Identification and Treatment of Anxious Youth - Revised

Please answer the following questions to the best of your ability. When answering them, please consider your experience since _____ (month) of 2010.

Date: _____

Name: _____

Title: _____

Type of work setting: _____

Length of time at current position: _____(months)

Have you changed jobs/positions since ending the study? YES NO

If yes, how many times? _____

Treatment of Anxious Youth

1. During this last year, what has your average child/adolescent caseload been per week? _____
2. What percentage of your average weekly child/adolescent caseload involves anxious youth between the ages of 7 and 17? _____%
3. Of the anxious youth you treated, what percentage did you treat with CBT? _____%
4. Of the anxious youth you treated, what percentage did you treat with the Coping Cat? _____%

   If youth were treated with the Coping Cat, please specify:

a) What percentage of these youth completed the full 14-18-session program?

_____%

5. For all the cases you treated using the Coping Cat, how many sessions did youth complete of the Coping Cat treatment?

Minimum: _____ Maximum: _____ Average: _____

6. For all the cases you treated using CBT (and not specifically the Coping Cat), how many sessions did youth complete of the treatment?

Minimum: _____ Maximum: _____ Average: _____

7. Rate how extensively, on average, the following components of CBT for youth anxiety were used with all anxious youth you treated:

a. Identification and management of somatic arousal

0	1	2	3	4	5	6
No use		Some use		Considerable use		Extensive use

b. Identification of anxious thoughts/self-talk and cognitive restructuring/changing self-talk

0	1	2	3	4	5	6
No use		Some use		Considerable use		Extensive use

c. Problem-solving

0	1	2	3	4	5	6
No use		Some use		Considerable use		Extensive use

d. Imaginal exposures

0	1	2	3	4	5	6
No use		Some use		Considerable use		Extensive use

e. Behavioral exposures

0	1	2	3	4	5	6
No use		Some use		Considerable use		Extensive use

f. Positive reinforcement

0	1	2	3	4	5	6
No use		Some use		Considerable use		Extensive use

8. Did you attempt to complete CBT for youth anxiety (including the Coping Cat) with an anxious youth, but were unable to do so?

   Circle: YES NO

9. If youth did not complete CBT (including the Coping Cat), I would like to hear the reasons. Please indicate whether any of the following was a reason for prematurely ending CBT/Coping Cat.

   a. The child abruptly ended treatment without reason.
      Circle: YES NO

   b. The child did not like the treatment
      Circle: YES NO

   c. The treatment was too many sessions
      Circle: YES NO

   d. The sessions were too long
      Circle: YES NO

   e. The child did not respond to treatment
      Circle: YES NO

   f. The treatment was not developmentally appropriate
      Circle: YES NO

   g. I did not feel competent in delivering the treatment
      Circle: YES NO

h. Comorbid issues became the target of treatment
Circle: YES NO

i. I lacked the proper supervision to help guide me in implementing the treatment
Circle: YES NO

j. Other_____
_____
Circle: YES NO

10. Of these, which was the main reason for prematurely ending CBT/Coping Cat?

Circle: a b c d e f g h I j

11. During this year, what percentage of anxious youth did you treat with another treatment modality? _____%

12. In cases in which you did NOT use CBT to treat an anxious youth, please rate how extensively you used the following types of services?

a. Peer support/group intervention

0	1	2	3	4	5	6
No use		Some use		Considerable use		Extensive use

b. Supportive therapy

0	1	2	3	4	5	6
No use		Some use		Considerable use		Extensive use

c. Play therapy

0	1	2	3	4	5	6
No use		Some use		Considerable use		Extensive use

d. Relaxation/deep breathing (without other cognitive-behavioral components)

0	1	2	3	4	5	6
No use		Some use		Considerable use		Extensive use

e. Family therapy

0	1	2	3	4	5	6
No use		Some use		Considerable use		Extensive use

f. Other

_____

0	1	2	3	4	5	6
No use		Some use		Considerable use		Extensive use

13. Please rate the extent to each of the following served as a barrier in the use or implementation of CBT/Coping Cat with your anxious child clients since _____ (month) of 2010:

a.) I had doubts regarding the usefulness of the treatment

0	1	2	3	4	5	6
Not at all		Somewhat		Considerably		Extensively

b.) The treatment was too involved, requiring too many resources

0	1	2	3	4	5	6
Not at all		Somewhat		Considerably		Extensively

c.) The treatment was inappropriate for my clientele

0	1	2	3	4	5	6
Not at all		Somewhat		Considerably		Extensively

d.) I did not have support from my organization

0	1	2	3	4	5	6
Not at all		Somewhat		Considerably		Extensively

e.) I lacked confidence in my ability to deliver the treatment effectively

0	1	2	3	4	5	6
Not at all		Somewhat		Considerably		Extensively

f.) Supervision on CBT/Coping Cat was not available

0	1	2	3	4	5	6
Not at all		Somewhat		Considerably		Extensively

e.) The reimbursement structure for my practice prevented me from delivering the treatment as intended

0	1	2	3	4	5	6
Not at all		Somewhat		Considerably		Extensively

f.) Other:

_____

0	1	2	3	4	5	6
Not at all		Somewhat		Considerably		Extensively

14. Please rate the extent to each of the following served to facilitate the use or implementation of CBT/Coping Cat with your anxious child clients since _____ (month) of 2010:

a.) My beliefs in the usefulness of CBT/Coping Cat for anxious youth

0	1	2	3	4	5	6
Not at all		Somewhat		Considerably		Extensively

b.) I received further training and/or kept up with the literature on CBT for youth anxiety

0	1	2	3	4	5	6
Not at all		Somewhat		Considerably		Extensively

c.) My clients were appropriate candidates for the treatment

0	1	2	3	4	5	6
Not at all		Somewhat		Considerably		Extensively

d.) My organization supported my use of CBT/Coping Cat

0	1	2	3	4	5	6
Not at all		Somewhat		Considerably		Extensively

e.) I was confident in my ability to deliver the treatment effectively

0	1	2	3	4	5	6
Not at all		Somewhat		Considerably		Extensively

f.) I received supervision on the use of CBT/Coping Cat

0	1	2	3	4	5	6
Not at all		Somewhat		Considerably		Extensively

e.) Delivering CBT/Coping Cat as intended was feasible at my work setting

0	1	2	3	4	5	6
Not at all		Somewhat		Considerably		Extensively

f.) Other:

_____

0	1	2	3	4	5	6
Not at all		Somewhat		Considerably		Extensively

Identification and Treatment of Anxious Youth – Qualitative Questions

These questions are intended to help us to learn more about how you are using CBT with your clients since your training 2 years ago. We would like to know what is working well, and what is not working as well. In addition, we would like to know about any modifications that you may have made to CBT to fit the needs of your clients or to the needs of your practice. When answering these questions, please consider your experience since the fall of 2009.

Attitudes towards CBT

1. Can you describe how your thoughts about CBT changed from before you were trained until the end of training?

2. Can you describe how your thoughts about CBT changed from the time that you finished the training program until now?

3. Did you have any concerns about CBT, and has this changed?

4. Did the way that you work with your clients change from before you got the CBT training? (probe—how? What do you do differently? Can you give an example?)

5. What do you think the most helpful aspects of CBT are? The least? (Probe: tell me more about it.)

6. What are the things that make it easier for you to use CBT? What makes it more challenging? (if they say clients, ask them for some description of what specifically makes it hard to use it?, eg., what types of things makes them not capable of using it?)

7. What do you feel you would need to be able to keep using it (or what would need to change for you to use it more)?

Treatment of Anxious Youth

8. Since your CBT training, have you integrated CBT with what you were doing before? If so, how? Can you give examples of times you did this/or how you integrate? What makes/made you decide to do it that way?

9. What issues do you use CBT to address? What are you less likely to use CBT to address?

10. Can you tell me about a time CBT worked well with one of your clients? Describe the client. What was the issue you were working on, and what did you do? What difference did you see?

11. How about a time when CBT didn't seem to work so well? Describe the client. What was the issue you were working on, and what did you do? What happened after you tried this? What did you do next?

12. Do you work with the following clients:

    - History of trauma?
    - Clients with multiple stressors?
    - Clients with multiple diagnoses?
    - Clients from minority cultures/backgrounds?

    If so, please describe how well you think CBT works with each population. (probe: tell me more about it. examples? What might need to be done to improve outcomes with these clients?)

13. How are the structured elements of CBT working in your practice (e.g., agenda, homework)? How about the cognitive part (e.g., examining thoughts)? The behavioral aspects (e.g. exposure)? (give examples to illustrate what they say about each? Probe for Info about works well and what doesn't.)

14. Have you done anything (else) to modify the way you do CBT to meet the needs or address the issues that are common to the population that you typically see? Can you give examples?

<u>Barriers/Facilitators and Contextual Variables</u>

15. What types of policies, procedures, or characteristics of your agency make it easier or more difficult to use CBT?

16. Does management support your use of CBT? How? (or how do you know they don't support it?) What else could/should they do to support the use of CBT?

<u>Consultation</u>

17. What was most helpful about consultation? Would you have preferred a different type of consultation (e.g. more/less individual feedback, no recording, more/less role-playing)?