Universiteit Leiden
The Netherlands

Friends or foes ? : predictors of treatment outcome of cognitieve behavioral therapy for childhood anxiety disorders
Liber, J.M.

Citation

Liber, J. M. (2008, November 5). *Friends or foes ? : predictors of treatment outcome of cognitieve behavioral therapy for childhood anxiety disorders.* Retrieved from https://hdl.handle.net/1887/13259
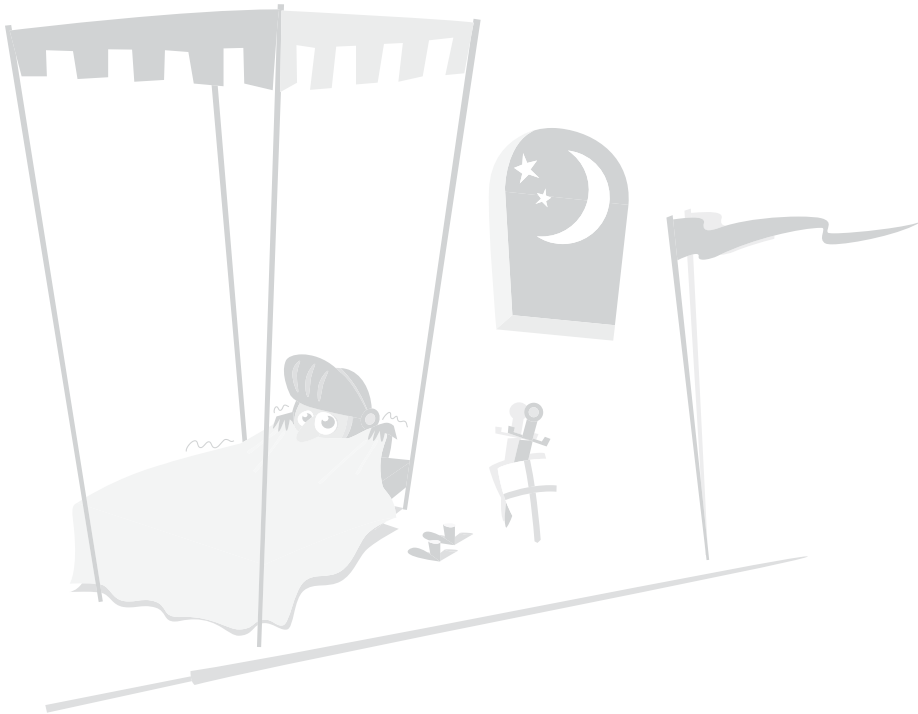
Note: To cite this publication please use the final published version (if applicable).

Summary

Introduction

The present dissertation had as its central focus the prediction of outcome of the treatment of childhood anxiety disorders. In the present study a selection of variables that were thought to have prognostic validity for successful cognitive behavioral treatment (CBT) outcome were explored in a population of children with anxiety disorders. Eligible for participation were children aged 8-12 years (n = 133) attending primary education and diagnosed with Separation Anxiety Disorder (SAD), Generalized Anxiety Disorder (GAD), Social Phobia (SOP) or Specific Phobia (SP). Participants were referred to the anxiety and depression outpatient clinic's of the Child and Adolescent Psychiatry Department, Leiden University Medical Center and Erasmus Medical Center, Sophia Children's Hospital in Rotterdam, in the Netherlands. Children were treated with a standardized and manualized CBT protocol.

   In Chapter 2 the impact of allocation to either individual CBT or group CBT was investigated for the randomized intent-to-treat sample (n = 127) and the randomized sample of treatment completers (n = 119). Chapter 3 investigated the impact of parenting and paternal internalizing symptoms for treatment recovery and reliable change for all treatment completers (n = 124). The prognostic value of these variables was separately assessed for mothers and fathers. This chapter also included a first description of the results in terms of statistically significant *and* clinically meaningful change. Social performance was also assessed for its prognostic value in the prediction of treatment outcome. Self-control, assertion, responsibility and cooperation were the social performance measures included in the analyses. As anxious children with Social Phobia were more likely to show social performance difficulties, the impact of this disorder on treatment recovery was also assessed as well as possible differences in social performance difficulties between anxious children with and without Social Phobia. The fifth chapter delineated the potential obstructive influence of comorbidity on treatment outcome in anxious children. The last chapter investigated the relative contribution of technical (therapist adherence to the treatment) and relationship variables (therapeutic alliance) for treatment outcome.

Findings

Chapter 2 showed no differences in treatment response for individual CBT (ICBT) or group CBT (GCBT). The percentages of children who were free of any anxiety disorder at post-treatment were 48% in the ICBT and 41% in the GCBT; 62% versus 54% were free of their primary disorder at post-treatment. Differences between the groups were non-significant for the intent-to-treat sample as well as the sample of treatment completers. Regression analyses with pre- and post-treatment observed scores did not show any significant differences between the groups.

   Parenting and parental factors that contributed significantly to the prediction of treatment outcome were maternal emotional warmth, paternal rejection, and anxiety and depressive symptoms. Predictors that remained significant after Bonferroni correction were self-

reported paternal depressive and anxiety symptoms and child-reported maternal emotional warmth. Predictors that were identified across informants (also including Bonferroni trends) were paternal self-reported rejection and depressive symptoms. A higher level of maternal emotional warmth was associated with a less favorable treatment outcome. Higher levels of paternal rejection, anxiety and depressive symptoms were consistently associated with a less favorable treatment outcome.

Investigation of social performance (assertion, responsibility, cooperation and self-control) as a predictor of treatment outcome showed a significant prognostic value for this variable. The strongest and most consistent predictors for treatment success were the performance measures assertion and self-control. Results were consistent across mothers and fathers. Moreover, father reported self-control was significantly related with Reliable Change, suggesting that higher levels of self-control are related to greater Reliable Change in child-reported anxiety symptoms. At pre-treatment, the levels of social performance in children with an anxiety disorder were significant below the levels of social performance of a normative population. Anxious children with Social Phobia showed even more impaired levels of assertion, cooperation and responsibility compared to anxiety disordered children without SOP, though the presence or absence of SOP did not impact on the likelihood to recover from anxiety.

Comorbidity was defined (1) as the absence or presence of comorbid disorders (total comorbidity) and (2) as the absence or presence of a co-occurring disorder other than anxiety. In order to differentiate between the effects of comorbidity and severity a composite severity measure was calculated reflecting increased symptom levels. The findings revealed a significant prognostic value for severity and for children with a co-occurring disorder other than anxiety (other comorbidity group). Children in the 'other comorbidity group' were less likely to recover from the treatment as were children who suffered from more severe symptom levels. Children in the 'other comorbidity group' also showed less Reliable Change in self-reported anxiety symptoms but greater change in self-reported depressive and negative affectivity symptoms.

Analyses of relational and technical process-variables revealed a relation between child-therapist alliance and reliable change in child-reported anxiety symptoms. Adherence was not related to Reliable Change. Furthermore, a stronger early alliance was related to a better early treatment adherence in the ICBT condition, and a similar relation was found in the ICBT condition for late alliance and adherence. In the GCBT condition, these relations were not found. Children in the ICBT condition with a strong alliance were more likely to be diagnosis free at the end of treatment compared to children with a strong alliance in the GCBT condition. It should be noted that the results with regard to the prognostic value of alliance and adherence were modest and inconsistent.

Discussion and Implications

In Chapter 7 we presented our main conclusions and a discussion of the findings. We concluded that ICBT and GCBT appear equally effective in reducing elevated levels of anxiety in anxiety disordered children. This finding indicates that children, parents and therapists might select a treatment format based on pragmatic considerations such as preference or waiting lists. Parental indices pointed to a so far underestimated role for fathers in the prediction of treatment outcome. Paternal anxiety and depressive symptoms and paternal rejection significantly contributed to the prediction of treatment outcome, across outcome measures and various methods of analyses. Child-reported maternal emotional warmth also predicted treatment outcome, but recent advances in understanding informant discrepancies suggest that children's report of family interaction processes may be biased by personal characteristics. Research into the paternal role in therapeutic processes and for triadic interactions in children with anxiety disorders might be helpful to improve our understanding of the potential role fathers may play in enhancing treatment outcomes. Engaging fathers in the pre-treatment assessment might enhance our capacity to predict treatment outcome.

Prognostic value for treatment recovery was found for various aspects of social performance (e.g. self-control, assertion, responsibility and cooperation); the strongest and most consistent aspects of social performance were self-control and assertion. Self-control appeared a key prognostic indices in the prediction of CBT outcome for childhood anxiety disorders. A diminished sense of self-control was found to predict treatment failure. Additionally, assertive children were more likely to show post-treatment recovery. Furthermore, the social performance levels of the anxious children were significant below the levels of social performance of children in a normal population, the social performance of anxious children with Social Phobia was even more impaired compared to anxious children without Social Phobia, with exception of self-control. Self-control may be generally affected in children with psychopathology, we do not know yet however in what way self-control interferes with the therapeutic process. With regard to assertion we hypothesized that assertive behaviour might facilitate the generalization of newly learned skills to others settings than the treatment setting.

Anxious children with a comorbid condition other than anxiety were less likely to recover from anxiety disorders compared to children with one or more anxiety disorders but no comorbid conditions. Severity predicted a less favourable outcome as well. Especially with regard to the impact of 'other comorbidity' we suggested that the co-occurrence of non-anxiety disorders interfere with anxiety treatment. Enhanced understanding of the actual mechanisms that either facilitate or hinder the therapeutic process appear worthy for adapting treatment strategies. One promising study into the tailoring of treatments to childrens individual needs was put forward as a possible solution to the current choice between either offering children various treatment protocols simultaneously or obliging them to follow protocols succinctly in case anxious children suffer from a comorbid condition other than anxiety.

Technical and relationship variables only marginally contributed to the prediction of treatment outcome. Some of our findings showed that children in the ICBT condition with a strong alliance were more likely to be diagnosis free at the end of treatment compared to children with a strong alliance in the GCBT condition. Analyses were complicated however by a successful implementation of the treatment and a successful bonding of the therapists with their clients; the levels of adherence and alliance were generally high with low variance thus resulting in low power to detect any prognostic value of these variables.

The present study delineated predictors of CBT outcome, which are currently poorly understood for childhood anxiety disorders. A strength of the present study is the multi-informant perspective on outcome including clinician, parental and child data, and the inclusion of fathers in the parental perspective. Furthermore, the present study included a large sample of clinically referred and treated children which leads to appropriate numbers that allow more sophisticated statistical analyses. Outcome was defined not only in terms of statistical significance, but also in terms of clinically meaningful change. There are also some limitations to the present study that bear comment. The present study did not include a placebo condition nor did it include specific mediator/ moderator analyses. Furthermore, by addressing 'for whom' the treatment worked it ignored part of the bigger picture; namely '*what* works for whom'. Solely identifying predictors (or risk factors) might tempt us to suggest that we ought to address these risk factors and adapt treatments accordingly, but this could lead us to overlook the mechanism through which the risk factor works.