

HOPE SPRINGS: A PILOT STUDY ON THE EFFECT OF CHRISTIAN COGNITIVE
THERAPY FOR TREATMENT OF DEPRESSION AMONG ADULTS WITH DEMENTIA
OF THE ALZHEIMER'S TYPE

Gerald Nissley (East Texas Baptist University)

One Tiger Drive, Marshall, TX 75670

(717)580-0786

gnissley@etbu.edu

Paper submission – primary author willing to chair paper session

Abstract

Research Question

The research study incorporated a single-subject design to investigate the effect of a form of Christian Cognitive Therapy (CCT) for intervention for depressive symptoms among adults diagnosed with Dementia of the Alzheimer's Type (DAT). Research has provided affirmation of Christian Cognitive Therapy as an evidence-based approach for treating depression in populations not diagnosed with DAT, and further affirmation has been provided for the use of "secular" cognitive-behavioral techniques for emotional concerns among the elderly. However,

upon review of the literature, no studies were found investigating the effect of Christian Cognitive Therapy for depression among the elderly diagnosed with DAT.

Methodology

Participants were recruited from a nursing and rehabilitation center in South Texas. Both participants and their responsible parties were informed and consented to research. Inclusion criteria required participants to be diagnosed with Dementia of the Alzheimer's Type and a depressive disorder. Additionally, they were required to be residents of the nursing and rehabilitation center for at least one year continuously prior to the onset of the study, and they were required to be verbal. Exclusion criteria included the presence of comorbid psychotic disorders and involvement with hospice.

Each participant received a 45-minute individual session of Christian Cognitive Therapy twice per week. Each session followed a structured format for training meditational prayer, thought-stopping, reframing, time for processing. Each participant additionally received prompting using a structured protocol by certified nursing assistants for daily use of thought-stopping and prayer.

Assessment of dependent variable occurred through use of the Beck Depression Inventory – Fast Screen (BDI-FS) every two weeks. Multiple baseline across individuals was utilized with an integrated ABA format. During baseline and withdrawal phases, no CCT or prompting were administered. During the treatment phase, both CCT sessions and structured prompting were administered. Structured training for CCT sessions and prompting protocol was provided to clinicians and nursing assistants. Fidelity checks for both sessions and prompting protocols were completed as well. Accuracy checks of BDI-FS administration and scoring were also completed.

Results

Five individuals participated in all three conditions of the study. Ages ranged from 69 years to 87 years of age for participants ($M = 79.8$ years; $SD = 6.72$). Three of the participants were males and two were females. All were diagnosed with DAT and Depressive Disorder, Not Otherwise Specified. Of interest, available records suggested that all five participants received a depressive diagnosis subsequent to nursing home admission. Three of the participants identified their ethnicity as Caucasian (two males and one female), and two identified their ethnicity as Hispanic (one male and one female). All eleven participants were medicated in some form, based on review of orders, for depression and DAT. None of the participants were currently placed in the secure unit of the facility.

Visual inspection of the data shows that all five participants in the study showed level changes from baseline to intervention phases (Figure 1). Visual inspection from treatment to withdrawal phases showed more heterogeneous changes. In the case of one participant, there was no slope or level changes from treatment to withdrawal. For two of the participants, there was evidence of regression in the follow-up phase, but intensity of depression did not return to baseline levels. For a fourth individual, a return to baseline levels of depression occurred, and a fifth individual experiences unstable depression scores in the withdrawal stage, which made interpretation difficult. For two of the three participants that approached a return to baseline of depression score intensities, there was evidence of slope changes in the intervals of the withdrawal phase, suggesting some evidence of a diminishing maintenance effect.

Assessment of statistical significance of slope and level changes were done using Simulation Modeling Analysis (SMA) Version 9.9.28. This software is useful particularly for small-sample studies ($n < 30$) and particularly effective for statistical analyses for data derived

through single-subject design. Regarding comparison of baseline and treatment phases, statistically significant level changes were noted for all five participants; however, no statistically significant slope changes were identified (Figure 1). With regard to comparison of treatment and withdrawal phases, no evidence of statistically significant level changes were observed. However, statistically significant slope changes were observed for two of the five individuals, suggesting evidence of a return toward baseline in depression scores.

In addition to analysis of responsiveness to treatment, internal validity was promoted through fidelity checks for structure and scripting of the CCT sessions and the prompting protocols. The treatment provider of CCT was instructed on the treatment protocol and tested for mastery before providing CCT to participants. Checks were then completed 25 times (50%) during sessions with 96 percent fidelity for session protocols. With regard to prompting protocol, nursing assistants assigned to participants were taught protocol and tested for mastery. Twenty-five checks were performed, and 88% fidelity was observed. Accuracy checks for scoring of BDI-FS occurred in 33% of administrations, and agreement between observer and recorder was 96%.

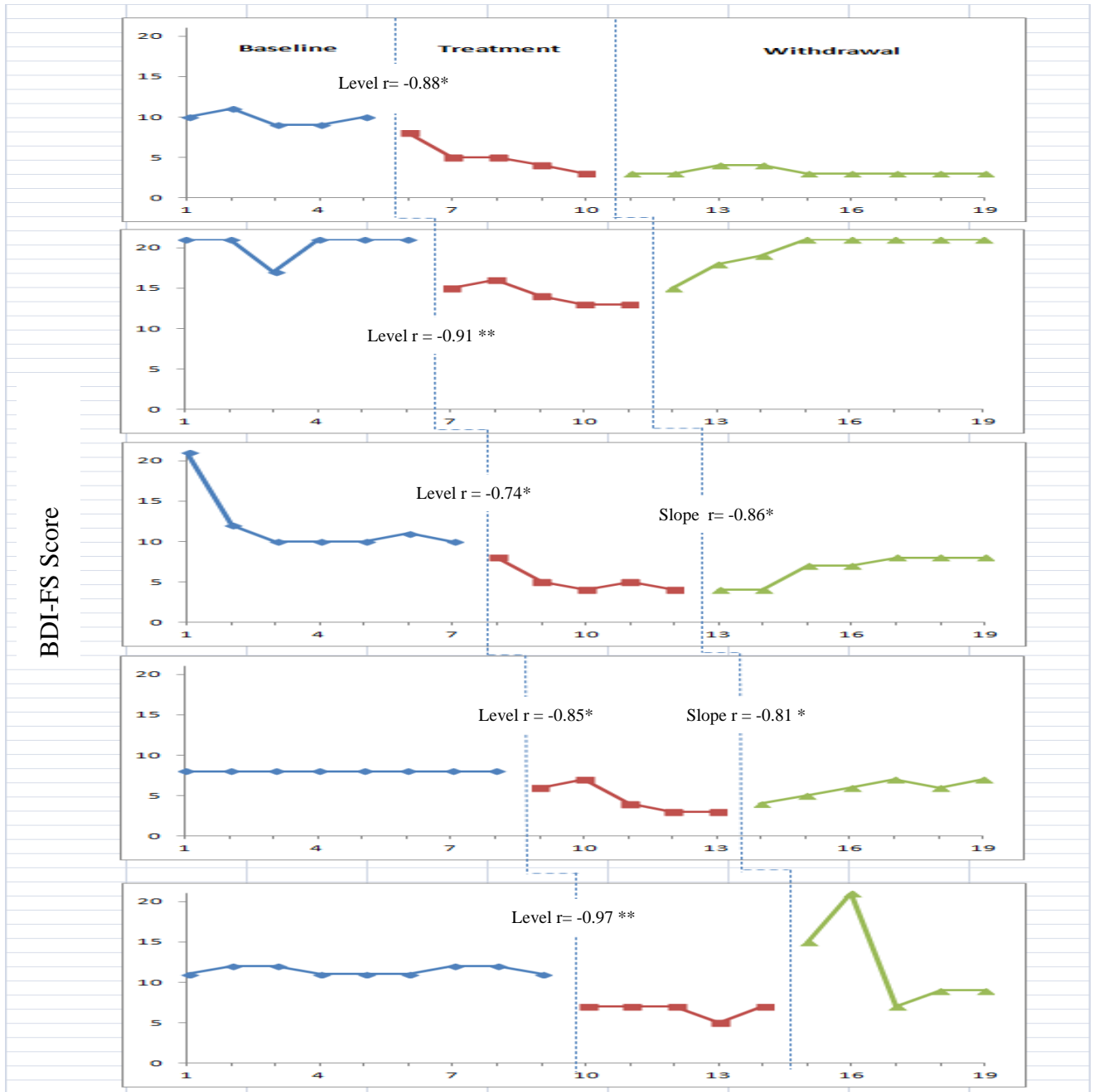
Interpretation

Both visual and statistical inspection of the data suggested that the adapted version of CCT used in this study – including therapy sessions and structured prompting – was effective in reducing depression scale scores. In turn, findings additionally suggested heterogeneous effects following active treatment phase for depression scores among participants, with most common response being a relative return to baseline. Such findings offer further support for additional

research into the use of CCT interventions with depressed individuals with DAT and promise for the further use of protective factors of spirituality and religiosity for support of this population.

Tables/Figures

Figure 1



Two-Week Intervals

* = $p < .05$ ** = $p < .01$