The Efficacy of a Peer Support Intervention Program for Patients with

Anxiety or Depression

Submitted by

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Chapter 1: Introduction to the Study

## Introduction

In recent years, mental health professionals have been discussing the use of peer support for clients with a variety of diagnoses. In particular, there has been some research emphasizing the use of peer support as treatment for anxiety and depression (Field, Diego, Delgado, & Medina, 2013). Despite these findings, however, there is still a lack of conclusive evidence of positive outcomes in individuals with anxiety or depression who participate in peer support programs. Although results of one meta-analysis indicated a positive relationship between peer support and positive outcomes such as increased hope, recovery, and empowerment, these findings were not consistent across studies and across different modes of peer support (Lloyd-Evans et al., 2014). Moreover, a meta-analysis of peer support in patients with depression revealed that although the intervention reduced symptoms of depression, these findings were not generalizable to primary care settings (Pfeiffer, Heisler, Piette, Rogers, &Valenstein, 2011). Therefore, despite some evidence of the efficacy of peer support, findings are not conclusive, and do not establish whether peer support is an appropriate intervention for individuals with anxiety or depression.

 The present research will determine whether two peer support programs in Smithtown, GA are effective in improving symptoms in individuals with anxiety or depression. It is expected that attendance of peer support programs for individuals with anxiety or depression would be associated by improved psychological outcomes. The present chapter will provide an overview of the study, including research questions, hypotheses, the significance of the study, rationale for methodology, and the nature of the study’s research design.

## Background of the Study

Mental illness affects an estimated 43.8 million Americans, or a total of 18.5 percent of the United States adult population (NIMH, 2013). At the same time, 3.3 million, or a total of 13.6 percent, of youths ages 12 to 17 receive mental health treatment within a specialized mental health setting (NIMH, 2013). The high prevalence rates of mental illness within the United States suggest that mental health is a huge issue within the country.

In particular, depression and anxiety are prevalent issues in the United States with important ramifications. According to the National Institute of Mental Health, nearly seven percent of people in the United States had a major depressive episode in 2013 (NIMH, 2013). The prevalence rate of depression was even higher among adolescents; 2.6 million youths ages 12 to 17, or 10.7 percent, had a major depressive episode. In fact, depression was such a huge issue for youth that exactly half of youth ages 12 to 17 who sought mental health treatment in 2013 were doing so because they were feeling depressed (NIMH, 2013). There are many comorbidities for depression, including suicide and substance abuse disorder (NIMH, 2013). Anxiety is a prevalent issue as well; in 2005, 18.1 percent of adults in the United States suffered from one or more types of anxiety disorders. Of these, 22.8 percent were classified as having a severe anxiety disorder (Kessler, Chiu, Demler, & Walters, 2005). The high prevalence rate of both depression and anxiety indicates that these disorders pose a serious mental health issue and must be addressed appropriately.

Of all the various interventions in the mental health field, peer support in particular has been championed as an innovative method of treating individuals with anxiety and depression. This unique intervention incorporates social activities in which participants provide psychological support to one another, thereby both learning positive social behaviors (Kaplan et al., 2012) and gaining a buffer for some of the negative psychological outcomes associated with mental illness (Faulkner & Basset, 2012). Moreover, there are often numerous barriers to community integration and social connectedness in individuals of any mental illness (Drake & Whitley, 2014), and these may be addressed via peer support as well.

Despite the call by mental health professionals for the development of innovative peer support groups (Faulker & Basset, 2012), there has been little evidence of a widespread and effective implementation of peer support groups. In particular, the positive effects of peer support in the severely mentally ill population are still unclear (Lloyd-Evans et al., 2014), especially in relation to depression and anxiety (Fuhr et al., 2014). While some studies found that peer support reduces depression (Pfeiffer et al., 2011) and anxiety (Field et al., 2014), others conclude that peer support interventions are only effective in increasing hope and quality of life (Fuhr et al., 2014).

Conceptual frameworks such as Social Action Theory and Cognitive Social Learning Theory explain the significance of peer support in benefiting patients with depression and anxiety (Strecher, De Vellis, Becker & Rosenstock, 2012). Stretcher attempts to describe the three overlapping instruments for probable beneficial effects. The analysis ascertains that peer support may reduce isolation, the level of stress, intensify sharing of health information as well as the provision of positive mentors. According to Solberg, Isham, Kottke, Magnan, Nelson … & Richards (2014), peer support groups exhibit similar characteristics as group therapy, including selflessness, cohesiveness, universality, copied positive behavior and giving hope. Also, peer support programs have the ability to empower patients to be active in their self-care.

Despite the established benefits of peer support, there is limited support for the intervention’s effectiveness in reducing symptoms of mental illness. In particular, the positive effects of peer support in the severely mentally ill population are still unclear (Lloyd-Evans et al., 2014), especially in relation to depression and anxiety (Fuhr et al., 2014). While some studies found that peer support reduces depression (Pfeiffer et al., 2011) and anxiety (Field et al., 2014), others conclude that peer support interventions are only effective in increasing hope and quality of life symptoms (Fuhr et al., 2014). Moreover, one study found that administering peer support interventions to individuals with postpartum depression may actually have a negative impact by lowering self-confidence (Fleming, Klein, & Corter, 2012).

In light of the lack of clarity surrounding the effectiveness of peer support interventions for individuals with anxiety or depression, it is necessary to conduct further research on the topic. Further randomized trials would be preferable in order to better understand how peer support interventions might be beneficial to individuals with anxiety or depression (Lloyd-Evans et al., 2014).

## Problem Statement

It is not known if, or to what extent, there is a correlation between the attendance of a peer support intervention and the reduction of anxiety, as measured by the Beck Anxiety Inventory (BAI), in a mental health center in Smithtown, GA. It is also not known if, and to what extent, there is a correlation between the attendance of peer support intervention and the reduction of depression as measured by the Beck Depression Inventory (BDI) in a mental health center in Smithtown, GA. According to empirical findings, peer support may improve psychological outcomes in patients with anxiety and depression (Field et al, 2013; Pfeiffer et al., 2011). However, these findings are inconclusive, and do not determine whether peer support is an appropriate method for treating anxiety or depression (Lloyd-Evans et al., 2014). Moreover, the severity of the social implications of anxiety or depression (Drake & Whitley, 2014) provides further reason to investigate how peer support and might be effective in improving anxiety or depression.

## Purpose of the Study

The purpose of this quantitative correlational study is to determine what relationship, if any, exists between the frequency of participation in a peer support intervention and improvements in anxiety and depression for patients in two mental health centers in Smithtown, GA. Participation will be measured by attendance of the peer support intervention for three weeks, at a rate of twice weekly. Anxiety and depression of the participants will be measured by the Beck Anxiety Inventory (BAI) and the Beck Depression Inventory (BDI), respectively.

In order to determine the effectiveness of the peer support interventions, within-group quantitative analysis will be conducted. Specifically, the relationship between the number of hours of participation within a peer support group and participants’ depression outcomes will be determined. Similarly, the relationship between the number of hours of participation within a peer support group and participants’ depression outcomes will be determined. The independent variable, therefore, is ‘participation within a peer support intervention’ while the dependent variables are ‘anxiety’ and ‘depression’.

## Research Question(s) and Hypotheses

The following research questions have been identified based on the problem statement: It is not known, if and or what extent there is a predictive relationship between participation within peer support interventions and reductions in anxiety and depression as measured by Beck Anxiety Inventory (BAI) and Beck Depression Inventory (BDI), respectively, two mental health centers in Smithtown, GA.

R1: What, if any, is the relationship between participation in apeer support intervention at a mental health center in Smithtown, GA, and anxiety?

H10. There is no significant relationship between participation in apeer support intervention at a mental health center in Smithtown, GA, and anxiety.

H1. There is a significant relationship between participation in apeer support intervention at a mental health center in Smithtown, GA, and anxiety.

R2: What, if any, is the relationship between participation in apeer support intervention at a mental health center in Smithtown, GA, and depression?

H20. There is no significant relationship between participation in apeer support intervention at a mental health center in Smithtown, GA, and depression.

H2. There is a significant relationship between participation in apeer support intervention at a mental health center in Smithtown, GA, and depression.

The above research questions address the problem statement in the following ways. Specifically, it is not known if and to what extent there is a causal relationship between participation within peer support interventions and reductions in anxiety and depression. Therefore, the above research questions address if and to what extent participation within a peer support program is predictive of reductions in anxiety, and if and to what extent participation within a peer support program is predictive of a reduction in depression, in a clinical sample.

## Advancing Scientific Knowledge

The present research advances scientific knowledge on the topic of peer support and interventions for individuals with anxiety and depression. Peer support interventions have demonstrated to be effective for various psychological issues, including depression and anxiety (Field et al., 2013). However, meta-analyses of the effectiveness of peer support interventions resulted in inconclusive findings (Lloyd-Evans et al., 2014), especially regarding outcomes related to depression and anxiety (Fuhr et al., 2014). Therefore, the present study seeks to advance scientific knowledge by adding to existing literature on peer support interventions for individuals diagnosed with anxiety or depression. Specifically, the present research will add scientific data to the effectiveness of peer support interventions with regard to reducing anxiety and depression in participants.

Moreover, the present study advances scientific knowledge in theories of social learning and social behavior. In particular, the present research advances knowledge of Cognitive Social Learning theory, in which positive social interactions allow individuals to observe and thereby learn healthy behaviors and attitudes from others (Kaplan, Salzer, & Brusilovskiy, 2012). It is proposed that the positive social interactions that arise from peer support programs will facilitate the learning of positive behaviors and attitudes. With regard to depression and anxiety, it is likely that individuals with anxiety or depression will learn positive coping mechanisms and thereby engage in the reduction of depression and anxiety (Strecher et al., 2012).

Furthermore, the present research advances knowledge of Social Action Theory by conceptualizing anxiety and depression as functions of social interdependence and social interaction processes (Lloyd-Evans, et al., 2014). In other words, individuals diagnosed with anxiety or depression are presumed to be more likely to increase anxiety-and depression-promoting behaviors when they are in the company of anxious and depressed peers (Fleming, Klein & Corter, 2012). In the present study, these individuals are provided with opportunities to interact with healthy members of the community via peer support groups, with the expectation that a reduction in anxiety or depression would occur following the intervention as a result of the positive social interactions. Therefore, the present research advances knowledge of Social Action Theory by understanding peer interventions as facilitating positive social interactions.

## Significance of the Study

The study findings seek to contribute to the existing literature on both individuals diagnosed with anxiety and depression, and peer support interventions, by investigating whether peer support programs are effective in reducing anxiety or depression. Since the literature emphasizes the social implications of anxiety or depression (Drake & Whitely, 2014), the current study attempts to determine whether targeting social factors such as peer support can improve those negative outcomes. Furthermore, the present study is based upon research that has demonstrated a link between a lack of social support and anxiety and depression (Santini, Koyanagi, Tyrovolas, & Haro, 2015). There have been numerous other studies on the effectiveness of peer support for anxiety and those with depression (Lloyd-Evans et al., 2015), which further provides basis within the literature for the present study. In this way, the present study fits well into the existing body of literature on the topic.

The specific issue that the present study will address is whether peer support is effective for individuals with anxiety and for individuals with depression. Recent studies have found that peer support may be effective in reducing anxiety or depression in certain populations. Field et al. (2013) found that when prenatally depressed women were administered a peer support intervention, both anxiety and depression were significantly reduced. The present study will add to this research by investigating whether the same holds true for mutual support groups for adults with anxiety or depression at a mental health center. Moreover, the present study will add to research that supports an interpersonal model of depression, such as that of Takeshima and Tanaka-Matsumi (2015), by further establishing the link between social interactions and anxiety and depression.

Despite the evidence that peer support is beneficial to certain groups, there is still a lack of empirical basis for the notion that peer support is effective in mental health services. In their review of the literature on peer support for mental health services, Repper and Carter (2011) concluded that while some benefit for participants and peer support workers were seen in various different studies, overall there is only evidence of the potential of peer support to be effective with regard to recovery. Moreover, Repper and Carter (2011) acknowledge that there are many limitations to existing evidence on the topic, and accentuate the need for further randomized trials that are of satisfactory quality.

The present study attempts to fill the gap within the literature by investigating the effectiveness of peer support interventions for individuals with anxiety and for individuals with depression. Study findings will have important implications for the mental health field. First, the study findings will either validate or invalidate the recent push toward increased prevalence of peer support opportunities for individuals with mental illness (Faulkner & Basset, 2012). Additionally, the study findings will shed further light on the contradictions in the literature regarding the efficacy of peer support interventions for individuals diagnosed with anxiety or depression (Lloyd-Evans et al., 2014). Should study results indicate that there is a significant relationship between peer support interventions and improvements in anxiety or depression, the present research will contribute to existing literature by providing empirical evidence for the use of peer support interventions for individuals with anxiety or depression.

## Rationale for Methodology

The present study will utilize a quantitative correlational research methodology in order to determine the relationship between participation in peer support intervention and improvements in anxiety and depression. The correlational design will be important in determining the effect of participation in peer support interventions on anxiety and depression (Ogula, 2013). Since the research questions focus on comparing relationships between two or more variables, a quantitative correlational methodology was appropriate for this study (Ogula, 2013).

According to Nachmias (2013), quantitative research is important in measuring operationalized variables and obtaining quantitative data. Furthermore, quantitative research allows for the manipulation of data in order to conduct statistical analysis such as correlational analysis. Since the current study utilizes variables that are able to be operationalized, and the investigation is concerned with quantitatively measuring those variables, quantitative research is the optimal type of research methodology for the current study. Furthermore, since correlational analysis is involved, quantitative data is required (Nachmias, 2013).

## Nature of the Research Design for the Study

**Research Design.** The research design for the study will utilize a quantitative correlational design. Specifically, anxiety will be quantitatively measured using the Beck Anxiety Inventory, a well-validated and reliable scale of anxiety (Beck, Steer, & Garbin, 1988). Similarly, depression will be measured utilizing the Beck Depression Inventory, a scale of depression that is valid and reliable as well (Beck, Epstein, Brown, & Steer, 1988).

A quantitative study will be employed as it is most appropriate for the present study. Specifically, the variables being measured – depression and anxiety, in particular – are interval-level variables, and therefore must be measured quantitatively. Furthermore, the present study will investigate the change that occurs in variables between different time-points, or the relationships between within-group means. In order to conduct the necessary statistical analyses for these questions, quantitative data must be used.

Specifically, correlational and regression analyses are the most appropriate method of quantitative analysis for the present study. Correlational and regression analyses will be used to address the research questions by establishing whether, and to what extent a predictive relationship exists between participation in a peer support intervention and improvements in anxiety and depression. Furthermore, correlational analyses will determine relationships between level of perceived peer support, participation in peer support intervention groups, anxiety, and depression (Ogula, 2013). Correlational analyses are used to establish whether there is a relationship between variables, as well as what the natures of those relationships are. Therefore, correlational analyses are most appropriate for the present study (Ogula, 2013).

**Sample.** The sample size in this study was limited to only approximately 30 participants. The sample population for this study will consist of individuals recruited from a peer support mental health program in Smithtown, GA. The sample will represent the clinical population within the State of Georgia.

 Participants will consist of a similar number of males and females and will range between the ages of 18 and 65. Demographic questionnaires will establish exclusion criteria, which will include (a) individuals under the age of 18, (b) individuals over the age of 65, and (c) individuals who have previously participated in a peer support intervention. Only individuals who have never attended a peer support program before will be eligible to participate in the study.

In order to obtain a sample for the present study, convenience sampling methods will be used. In order to recruit the sample, the investigators of the present study will contact the peer support professionals who direct the peer support programs in each mental health facility in order to obtain the contact information of patients who have expressed interest in the peer support programs. The researcher’s peer support professional will then contact all of those patients, and invite them to participate in the study. Patients interested in hearing more about the study will be asked to attend an informational session, where potential participants will meet with the research investigators and be debriefed as to the nature of the study.

Patients who agree to participate within the study will be assured of their confidentiality throughout the study, as well as their right to withdraw from the study at any time without any recourse or punishment. Participants will be assured that their peer support professionals will not be aware of who participates within the study and who does not. Participants will be asked to sign informed consent forms prior to ending the informational session.

Data collection will occur on the last day of a three-week period within a peer support intervention. During the data collection period, participants will be administered the survey, consisting of a demographic questionnaire and measures of anxiety and depression. Once the data collection period is completed, participants will be provided with the researchers’ phone numbers and invited to contact the researchers at any point in time with questions, or to hear the collective results of the study.

## Definition of Terms

Throughout the present study, several terms related to peer support and anxiety and depression are used. The following terms were used operationally in this study:

Peer Support***.***An intervention that uses positive social support to provide a culture of health and ability (Ong, Martineau, Lloyd & Robbins, 2011). According to the NHS Confederation, the primary goal of peer support is to enable people in similar situations to both provide and receive help, as well as to support and empower one another (Repper, 2013). Peer support interventions include mutual support groups, which view peer support as positively impacting both the peer support workers and the patients; peer support services, in which therapeutic support is conceptualized as being uni-directional; and peer mental health service providers, i.e., interventions utilizing employees trained to provide standard care to individuals with mental illness (Lloyd-Evans et al., 2014).

Cognitive Social Learning Theory***.***Cognitive Social Learning Theory conceptualizes peer interactions as positive learning mechanisms due to social modeling and social learning processes. Current literature on peer support indicates that positive interactions with others may effectively improve treatment for individuals with anxiety or depression, thereby supporting Cognitive Social Learning Theory (Kaplan et al., 2012).

Social Action Theory***.***Social Action Theory states that social influencing factors within the environment predict behavior. In other words, behavior is a function of an individual’s social environment (Hunkeler et al., 2011).

## Assumptions, Limitations, Delimitations

The following assumptions are present in this study:

1. It is assumed that survey participants in this study will not be not deceptive with their answers, and that the participants will answer questions honestly and to the best of their ability. This is assumed based on the fact that participants will willingly take part in the study.
2. It is assumed that peer support interventions within this study are an accurate representation of mutual support peer support interventions used nationally. According to a meta-analysis by Lloyd-Evans et al. (2014), mutual support interventions were one of the three most commonly used peer support interventions. Moreover, the peer support interventions used within this study contain all of the primary components of peer support interventions listed by Ong et al. (2011).

The following limitations are present in this study:

1. The sample size in this study is limited to only approximately 30 participants. The sample population for this study will consist of 15 individuals diagnosed with anxiety and 15 individuals diagnosed with depression from two different peer support mental health programs in Smithtown, GA. The sample will represent the clinical population within Georgia. The cause for the small sample size is due to the small size of the peer support groups and the limited amount of time available to conduct the study, so that only one round of participants within the intervention was able to be used for the study.
2. Study findings are limited in generalizability due to the specific demographic sample used within the research. Since the ethnic and racial composition of the study sample was not matched to that of the entire United States, study findings can only be generalized to the population in Smithtown, NC.
3. The scope of the study is limited to using existing peer support groups to provide the intervention due to lack of funding. Without the necessary funding, peer support interventions could not be provided to participants by the study investigators; rather, existing peer support groups were used to provide the intervention within the study.
4. The scope of analysis is limited to correlational and regression analyses due to statistical model constraints. Therefore, true causal relationships cannot be determined from the data within this study.

The following delimitations are present in this study:

1. The scope of this study is delimited to only two mental health centers in a small city in Georgia, limiting the demographic sample. This delimitation is a result of the researcher’s demographic location, which is in Smithtown, GA, and the researcher’s inability to access other demographic samples.
2. The present study is delimited to include only individuals with anxiety and depression, and to exclude individuals with alternate diagnoses. This delimitation is due to the fact that the present study intends to fill the gap in the literature related to whether peer support is effective or ineffective in reducing anxiety and depression (Lloyd-Evans et al., 2014).
3. The present study is delimited to include only a specific mental health population in Smithtown, GA. Therefore, it is anticipated that study results may not be generalizable to other populations.

## Summary and Organization of the Remainder of the Study

Chapter 1 provided an introduction to the present study and discussed the rationale for and significance of the present research. Specifically, the present research is intended to investigate the efficacy of a peer support program for individuals with anxiety or depression in a mental health center in Smithtown, GA. Due to the lack of conclusive data in literature related to positive outcomes of peer support for individuals with anxiety or depression (Lloyd-Evans et al., 2014), the present study will contribute to existing literature on peer support by determining the effect of participation in a peer support intervention on anxiety and depression. Furthermore, the present study will expand theoretical conceptualizations of peer support as proposed by Cognitive Social Learning Theory (Kaplan et al., 2012) and Social Action Theory (Telch & Telch, 2012).

The rationale for methodology and nature of research design were discussed as well. Specifically, the present study will investigate whether there is a predictive relationship between participation in a peer support intervention and improvements in anxiety and depression, as measured by the Beck Anxiety Inventory and the Beck Depression Inventory, respectively. The study will utilize a quantitative correlational research design to enable the statistical analysis necessary in order to address the study’s research questions (Nachmias, 2013). Definition of terms were discussed, and assumptions, limitations, and delimitations of the study were presented as well.

Chapter 2 will present a review of current research on the centrality of the dissertation literature review in research preparation. Chapter 3 will describe the methodology, research design, and procedures for this investigation. Chapter 4 details how the data was analyzed and provides both a written and graphic summary of the results. Chapter 5 is an interpretation and discussion of the results, as it relates to the existing body of research related to the dissertation topic.

The timeline for this investigation is as follows:

November 2015: The dissertation proposal will be reviewed and completed.

December 2015: All materials necessary to begin the study, including survey materials, IRB approval, and informed consent, will have been obtained.

January 2016: Data collection will begin.

February 2016: Data collection will be completed. Statistical analysis of data will begin.

*Remaining Chapters not included in this sample.*

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