2024

Holistic Assessment of Counseling Self-Efficacy Development among Counselors in Training from a Regression Model

Shu-Ching Wang
Minnesota State University, Mankato

Holistic Assessment of Counseling Self-Efficacy Development among Counselors in Training from a Regression Model

---

By

Shu-Ching Wang

A Dissertation Submitted in Partial Fulfillment of

the Requirements for the Degree of

Doctor of Education

In

Counselor Education and Supervision

Minnesota State University, Mankato

Mankato, Minnesota

May 2024

Holistic Assessment of Counseling Self-Efficacy Development among Counselor in Training

from a Regression Model

Shu-Ching Wang

This dissertation has been examined and approved by the following members of the student's

dissertation committee:

_____

Tracy Peed, Ph.D.

Chair

_____

Richard Auger, Ph.D.

Committee Member

_____

Kerry Diekmann, Ed.D.

Committee Member

_____

Ann Miller, Ph.D.

Committee Member

ACKNOWLEDGEMENT

In completing of my 2nd dissertation, I am aware that I could not have completed this project without help and assistance from many individuals. I would like to give a HUGE thanks to my loving husband, Dr. Yuh-Jen Guo: you have stayed by my side since I started studying for the doctoral degree in Counselor Education. You drove me back and forth between the St. Cloud and Mankato campuses, in countless sunny, cloudy, rainy, and SNOWY days. With you, I have perfect attendance throughout the program. Dr. Peed, my advisor and the chair of my dissertation committee: your guidance has helped me in shaping my dissertation study. Your patience in the process of dissertation writing is critical to my completion of the dissertation. Dr. Auger: your guidance and support throughout the program made my study enjoyable. Dr. Miller: your input in the instrument development process was critical. Dr. Diekmann: I appreciate your timely guidance that helped me in writing with cultural sensitivity.

My special thanks are due to Dr. Erin Eckenroad, Dr. Karli LaGrotte, and Mrs. Jeri Helton from the Student Counseling and Psychological Service (SCPS) at Auburn University. Who served on the expert panel for the first round of instrument development. Your input was crucial to the quality of the instrument that is for clinical supervisor's professional development.

Table of Contents

Holistic Assessment of Counseling Self-Efficacy Development among Counselor in Training from a Regression Model

Shu-Ching Wang

A Dissertation Submitted in Partial Fulfillment of

the Requirements for the Degree of

Doctor of Education in

Counselor Education and Supervision

Minnesota State University, Mankato

Mankato, Minnesota

2024

ABSTRACT

Supervision is an essential component in counselor education and training. Supervision helps Counselors-in-Training (CITs) evolve to fully functional counseling professionals. CITs start to receive supervision in practicum and internship. Throughout this experience, both clinical mental health and school counseling students work as a professional counselor with real clients, and their clinical practice will be supervised by a supervisor. After graduation, the graduates of clinical mental health counseling will receive years of post-graduate supervision, as required by state licensing boards, in order to obtain licensure. While the importance of supervision is irreplaceable in counseling, the factors that contribute to successful supervision outcomes, such as CIT self-efficacy is a prominent topic in the research of clinical supervision. Supervisor competency plays a vital role in the supervision relationship, which is associated closely with the success of supervision and the development of CITs' counseling self-efficacy. Self-efficacy comes from Bandura's social learning theory and has become an important measure for learning or counseling outcomes. CITs' training progress in supervision can be assessed through their counseling self-efficacy. Therefore, this study was designed to explore the relationship between supervisor competency and the counseling self-efficacy of CITs. An instrument, Psychotherapy Supervision Development Survey-Supervisee (PSDS-S), was revised to collect CITs' perceived supervisor competency and measure how much this perception contributes to their development of counseling self-efficacy. The outcomes revealed that the direct client contact hours and perceived supervisor competency contributed to 21.2% of the variance in counseling self-efficacy. The results indicate that CITs' counseling self-efficacy can be influenced by their perceived supervisor competency of their clinical supervisor. Counselor educators are informed by the results of the study, and it is critical for counselor educators to re-consider strategies of collaborating with competent site supervisors to ensure ideal development of CITs' counseling self-efficacy.

CHAPTER I

Introduction

The project of this dissertation research aims to explore the relationship between the development of CITs' counseling self-efficacy and the supervisor competency with a regression model. This project highlights the importance of including CITs' voice in clinical supervision for CITs' better development of counseling self-efficacy. The introduction chapter consists of several sections and summarizes the contents and process of this research. This chapter presents the background of the study, including previous studies and application of counseling self-efficacy in counselor education and training. Factors in relation to the development of counseling self-efficacy are introduced to include the definition of self-efficacy of Badura, the argument of the development of counseling self-efficacy, and its development during practicum and internship experiences. The literature review includes the influences of clinical supervision, supervisor competency, and supervisory relationship on the development of counseling self-efficacy. This introduction discusses the theoretical framework that inspires the research and guides the research design. Furthermore, this chapter details and explains the argument about the needs of a valid instrument to increase the understanding of the clinic supervisor's supervision competency via the lens of supervisees. The statement of the problem describes the issues relating to the current counselor training, and the purpose of the study reveals how this research may address these issues. The section of the definitions explains the terminologies to align perceptions and assumptions of readers and the researcher in order to facilitate the comprehension and interpretation of the study.

The research design and results of the research question will be lineated in a methods section. The chapter concludes with the delimitation and the limitation of the research design.

Background

Counseling self-efficacy was commonly held as an indicator for counselor development and training in literature (Barden & Greene, 2015; Ikonomopoulos et al., 2016; Mullen et al., 2015; Tang et al., 2004). Bandura (1994) defined self-efficacy as individual's judgement of their ability to achieve a given task. Scholars had used self-efficacy as a measure to assess development of trainees in professional fields, including counselors-in-training (CITs) development (Barden & Greene, 2015; Daniels & Larson, 2001; Leach et al., 1997; Mullen et al., 2015). Earlier research could not agree on the role of self-efficacy in counselor training. Larson et al. (1992) argued that models of counseling self-efficacy were developed and tested when exploring effective education and training for professional counselors; however, competing perceptions about counseling self-efficacy continue to emerge, and literature later focused on the role of clinical training and experience in the development of counseling self-efficacy (Mullen et al., 2015). Tang et al. (2004) contended that the clinical training and experiences of master's level counseling students is the breeding ground of their counseling competence and counseling self-efficacy.

Clinical exposure during practicum and internship experience has provided experiential learning (Dewey, 1986) and vicarious learning (Bandura, 1986; Tang et al., 2004) opportunities that led to CITs' higher confidence in counseling practice. This is

also known as enhanced counseling self-efficacy. Studies of the development of counseling self-efficacy in practicum and internship have remained a critical topic for counselor education and training (Ikonomopoulos et al., 2016; Mullen et al., 2015; Tang et al., 2004). Another critical role of counseling self-efficacy is its association with the development of CITs' competence. The constructs of self-efficacy and competence appear to overlap in measures of competence-related self-concept, such as physical appearance, academic performance, etc. (Tompkins, 2013). The promotion of self-efficacy involves the learning process where one's competence and ability are also fostered (Bandura & Schunk, 1981; Hughes et al., 2011; Tompkins, 2013). Therefore, the experiential learning of practicum and internship provides the necessary learning condition for the development of counseling self-efficacy and competence in becoming a well-trained counselor.

In addition to the practicum and internship training process, the quality of clinical supervision is perceived to be influential in the development of counseling self-efficacy during CITs' clinic exposure. Duncan et al. (2014) stressed that inadequate supervision cannot support the self-efficacy of school counselors. Tang (2020) also emphasized that clinical supervision is an effective intervention in enhancing school counselors' counseling self-efficacy. Therefore, the study of clinical supervision is crucial as the research outcomes may lead to better understanding of CITs' development of counseling self-efficacy.

Clinical Supervision

Researchers have strongly supported the critical role and unique function of supervision in strengthening the well-being and training of the mental health professions (DiMino & Risler, 2012; Watkins, 1993, 2013). O'Byrne and Rosenberg (1998) described clinical supervision as an "acculturation" (p. 37) process in which experienced professionals skillfully and intentionally guide a novice professional into the world of the counseling profession and its cultural context. Magnuson et al. (2001) supported the irreplaceable nature of supervision but, with concerns on the implementation of supervision, and stated if "counselors without adequate preparation assume responsibility for supervising trainees, they may inadvertently portray supervision as a superficial requirement and miss the opportunity to adequately prepare individual members of the next generation of counselors" (p. 214). This statement illustrates the importance of supervision for the future of the professional counseling.

The quality of supervision makes an impression on novice professionals, and its quality determines either the positive or negative lasting consequences for both the novice counselors and mental health professions (Magnuson et al., 2001). Therefore, it is inevitable to discuss the critical role of supervisors, who assume a large responsibility for delivering a high-quality supervision. Researchers asserted that supervisors bear the unique responsibility towards the development of their supervisees' counseling self-efficacy, and supervisors should strategically provide necessary guidance and challenges for optimal development of counseling self-efficacy (Bernard & Goodyear, 2014; Whitman & Jacob, 1998). It is clear that supervisors occupy the core of clinical

supervision which may significantly impact the quality of supervision and the development of counseling self-efficacy.

The Impact of Supervision on Counseling Self-Efficacy

There are many possible factors that may influence counseling self-efficacy (Larson et al., 1992). For example, counselor training (Johnson et al., 1989), course work (Johnson et al., 1989; Watson, 1992), clinical experience (Melchert et al., 1996; Tang et al., 2004) and supervision (Cashwell & Dooley, 2001) are all possible contributing factors for counseling self-efficacy. In a study conducted by Johnson et al. (1989), the researchers found that the amount of training among practicum students affected CITs counseling self-efficacy.

The counseling training process educates and orients CITs to the mental health profession. Kozina et al. (2010) assessed CITs twice in an eight-week interval and found that the training progress over time delivered a significant effect on the development of counseling self-efficacy. A later study conducted by Mullen et al. (2015) concurred the outcomes of Kozina et al. (2010) study and reported that the length of time in training explained nearly 70% of the variance in development of counseling self-efficacy. Additionally, Mullen et al. (2015) also discovered that CITs had exhibited a significant increase on the development of counseling self-efficacy during practicum and internship. This finding establishes the critical role of supervision with its impact on counseling self-efficacy development. Melchert et al. (1996) and Tang et al. (2004) both concluded that the level of training, practicum or internship, and amount of counseling experience significantly influenced counseling self-efficacy. In agreement with the critical function

of clinical exposures in relation to development of counseling self-efficacy, Cashwell and Dooley (2001) explored how clinical supervision affected the development of counseling self-efficacy. The study compared two groups, one with regular clinical supervision and the other without such supervision and found that students with regular clinical supervision exhibited a significant development of counseling self-efficacy compared to those without regular supervision. Current literature has supported the significant effect of supervision on the development of counseling self-efficacy (Cashwell & Dooley, 2001; Kozina et al., 2010; Mullen et al., 2015; Tang et al., 2004).

Supervisor Credentials

Knowing the critical role played by clinical supervision, researchers have proposed that supervision should be a distinct field of study in counseling programs (Falender & Shafranske, 2017). Criteria and guidelines of supervision have been outlined by the Council for Accreditation of Counseling and Related Educational Programs (CACREP) and Association for Counselor Education and Supervision (ACES) in an attempt to create a systemic training framework for educating and training competent clinical supervisors (ACES, 2011; CACREP, 2016). To achieve the rigorous standards of training for high quality mental health professionals, professional licensure boards at the state level have contributed effort to establish criteria for competent supervisors. Field et al. (2019) organized and reported various credential requirements for clinical supervisors in 50 U.S. states and the District of Columbia (D.C.). This report indicated that being fully licensed as a professional counselor is required in all 50 states, 37 states demand

certain amounts of clinical experience (2-5 years), and thirty-two states require supervision education or training.

Supervision in Clinical Mental Health Counseling

Mental health providers are held accountable to have on-going clinical supervision by state-approved supervisors to maintain clinical competency (Hartley et al., 2002). State licensure laws set standards at the state level for the delivery of mental health services. The licensure laws govern the licensure criteria and process in each of the 50 states and the D.C. (Borders et al., 2014). The licensure laws also establish the criteria for supervision, which include frequency of supervision and the total hours (1,000-4,000) of post-graduate supervision for obtaining a full license (Henriksen et al., 2019). The requirements of supervisor credentials reflect the needs of safeguarding the quality of supervisors and length of supervision to ensure trainees are receiving proper supervision.

Supervision in School Counseling

Compared to the requirements of supervision and supervisor credentials in clinical mental health counseling, school counselors do not have established requirements on supervisor status through licensing entities, such as the state education board (Dollarhide & Miller, 2006). Walsh-Rock (2018) documented his participants' input when one individual mentioned that "non-clinically supervised counselors become isolated in their practice and lose the ability to be innovative school counselors" (p. 96). With the decisive impact of supervision on the counseling profession, researchers asserted that school counselors should continue their professional development under the guidance of

knowledgeable and experienced clinical supervisors for successful functioning in this complex yet unique profession (Bledsoe et al., 2019; Studer & Oberman, 2006). Although clinical supervision is an effective intervention in enhancing school counselors' counseling self-efficacy and implementing a comprehensive school counseling program (Tang, 2020), school counselors have no requirements for post-graduate supervision. Scholars have called for professional school counselors to face this challenge of lacking clinical supervision in order to establish a solid professional identity and become equipped with adequate knowledge and skills to face rising mental health issues among K-12 students (DeKruyf et. al, 2013; DeKruyf & Pehrsson, 2011; Merlin-Knoblich et al., 2018; Walsh-Rock, 2018).

Supervisor Competency and Counseling Self-Efficacy

When the counseling profession recognizes the critical role of supervision and relies on its functions in practicum and internship training processes, it is natural to attend to the different requirements of supervision and supervisor status between clinical mental health and school counseling. Morrison and Lent (2018) highlighted the inadequate knowledge and understanding of the relation between counseling self-efficacy development of CITs and clinical supervision but argued that clinical supervisors can be the counseling "self-efficacy-builders" (p. 519) of CITs. The critical influence of CITs' perceived supervisor competency of their clinical supervisors is significant on the development of counseling self-efficacy (Badura, 1977; Morrison & Lent, 2018). Ikonomopoulos et al. (2016) agreed with this viewpoint and also indicated concerns about the need for additional research to explore how the CITs' perceived supervisor

competency of their clinical supervisor affected their counseling self-efficacy (Ikonomopoulos et al., 2016; Morrison & Lent, 2018). Therefore, it is important to research on the relationship between CITs' perceived supervisor competency of their clinical supervisors and their development of counseling self-efficacy. The current study will enhance understanding of effects of supervision on counseling self-efficacy.

Additionally, it is important to investigate the effect of supervision on counseling self-efficacy. This is due to the fact that clinical supervision consists of an extensive time period during practicum and internship, where the development of CITs' counseling knowledge and skills occur through clinical training (CACREP, 2016). Clinical supervision is a practice that covers several vital contributing factors in counseling self-efficacy. Therefore, the critical roles of supervisors should be methodically examined in order to achieve the effectiveness of supervision on counseling self-efficacy. Because of the substantive influence of clinical supervision, the need for supervisor development and training arose to ask for supervisor competency of supervisors (Borders et al, 1991; Dye & Borders, 1990; Herlihy et al., 2002; Worthington, 2006). Thus, exploring the development of counseling self-efficacy of CITs has inevitably led to the study of supervisor development and supervisor competency. Social learning theory (Bandura, 1977) claimed that competency of a role model encourages learning behaviors; however, the relationship between supervisor competency and counseling self-efficacy has received minimal research attention. Studies that include CITs' perceived supervisor competency of their clinical supervisors on the development of counseling self-efficacy will add invaluable understanding into the framework of counseling self-efficacy.

Statement of the Problem

Counselor-training programs require CITs to step forward into the mental health world through supervised clinical experience during practicum and internship (CACREP, 2016). This very early experience of clinical supervision in a counselor training program generates a critical impression of the counseling profession and furthers the CITs' development of counseling self-efficacy and professionalism. Current literature agrees to the critical influences of factors in training process that significantly help CITs develop counseling self-efficacy; however, there is not enough research to identify a determining factor in studies of counseling self-efficacy (Larson et al., 1992). Furthermore, current research has lacked the exploration on the variable of CITs perceived supervisor competency of their clinical supervisors in studies of counseling self-efficacy (Ikonomopoulos et al., 2016; Morrison & Lent, 2018). With the critical role of competency in learning clearly stated in learning theory (Bandura, 1977), the current study is inspired by the social learning theory (Bandura, 1977) and is designed to research empirical evidence for the linkage between counseling self-efficacy of CITs and their perceived supervisor competency of their clinical supervisors. This study will contribute to the lack of research on factors relating to counseling self-efficacy. The outcomes are expected to contribute to a better understanding of the development of CITs' counseling self-efficacy and the critical role of supervisor competency.

Purpose of Study

The importance of counseling self-efficacy in counselor training continues to be a critical topic in the counseling field. Factors perceived as relevant to counseling self-

efficacy have been stated in previous sections, but current literature could not identify one determinant factor (Larson et al., 1992). This study will also investigate the relationship between CITs' perceived supervisor competency of clinical supervisors and their development of counseling self-efficacy.

Supervision is a lengthy process in counselor training, and its influence on CITs' development has been well documented (Bernard & Goodyear, 2014; Magnuson et al., 2001; Whitman & Jacob, 1998). However, competent supervisors are imperative in clinical supervision and counselor development (Falender & Shafranske, 2017). Realizing the importance of supervisor competency, this research project sets a purpose to investigate how much variance in CITs' counseling self-efficacy is accounted for by CITs' perceived supervisor competency of their clinical supervisors. Other factors examined in this study include Direct contact hours with their clients/students, CITs' supervisory relationship with their supervisors, and the existence of differences between counseling tracks (e.g., school counseling, clinical mental health counseling).

Currently, there were no instruments developed purposefully for assessing supervisor competency from the lens of supervisees. Therefore, the study was first to convert items of the Psychotherapy Supervisor Development Scale (PSDS) with wordings that enable supervisees to evaluate their perceived supervisor competency of their clinical supervisors. Watkins (1995) developed PSDS with the aim of generating empirical evidence to support the Supervisor Complexity Model (SCM) that was developed in 1990. The SCM is a four-stage model depicting the developmental process of supervisor competency via supervisor's self-reported ratings. The converted PSDS

enables supervisees to provide the ratings on supervisor competency they have experienced in the supervision dyad. To adjust the measure to meet this design, the language of original items in PSDS was modified or adjusted to meet the purpose of reporting perceived supervisor competency.

With the converted PSDS, the perceived supervisor competency of their clinical supervisors becomes available to be included in this study; thus, this study is focused on how much variance of CITs' counseling self-efficacy is accounted for by total direct client/student contact hours, supervisory relationship, track of study, and their perceived supervision competency of clinical supervisors.

The instruments used in this study included Counseling Self-Estimate Inventory (COSE) to assess counselor self-efficacy, converted PSDS for assessing CITs perceived supervisor competency of their clinical supervisors, and Short Version of the Supervisory Relationship Questionnaire (S-SRQ) for operationalizing supervisory relationships. A demographic questionnaire was used to assess factors such as gender, ethnicity, total direct student/client contact hours, and study tracks. Multiple regression statistical procedures were employed to analyze how much variance of counseling self-efficacy of CITs is accounted for by four predictor variables: track of study, total direct client/student contact hours, supervisory relationship, and perceived supervision competency of clinical supervisor by CITs.

Before applying for permission to conduct the study from the Institutional Review Board (IRB) of Minnesota State University at Mankato, all necessary documents, including information letter, demographic questionnaire, S-SRQ, COSE and the

converted PSDS were digitally re-created on the university's Qualtrics system. After receiving approval from the IRB (see Appendix A), the recruitment of participants was initiated. A list of email contacts of clinical coordinators in charge of clinical experience of practicum and internship was generated from the websites of CACREP-accredited Counselor Education programs. The selection of counselor education programs was planned to include at least one Counselor Education program from each state for the recruitment purpose. A link to the Qualtrics of this study was included in email contacts that request coordinators' assistance in participants recruitment.

Conceptual Framework

The research was inspired by social learning and social cognitive theory, both developed by Albert Bandura. Bandura published social learning theory in the 1960s and further developed it to social cognitive theory in the 1990s (Bandura, 1977, 1986, 1999). Bandura argued that learning is not simply the function of reinforcement and punishment as proposed by behavioral approach, and he advocated the position stating that learning is facilitated by cognition. His research in learning established the social learning theory, which claims learning occurs through observing, modeling, and imitating. Bandura (1999) later argued that the personal agency with intentionality takes active control of behaviors through processes of observation, retention, production, and motivation. He claimed that self-efficacy has great determinant in individual's motivation because self-efficacy is the "belief in one's capacities to organize and execute the course of action required to produce given attainments" (Bandura, 1999, p. 3) and "the belief about their

capacity to produce designated level of performance that exercise influence over events that affect their lives (Bandura, 1994, p. 1). Bandura's social learning and social cognitive learning theory can be adopted to describe the CITs learning process in their experience of practicum, internship, and clinical supervision (Peed, 2017).

Social Learning and Supervision

To realize the relationship between social learning and supervision, it is important to understand that social learning theory described learning as intentionally observing a role model's behavior and later copying the behavior. Badura (1977) noted that characteristics of a role model are higher status, competence, and authority. During the learning process in clinical supervision, CITs very well perceive their clinical supervisor as a role model. Clinical supervision is evaluative in nature (ACA, 2014; Barnett & Molzon, 2014; Bernard & Goodyear, 2014; Ellis, 2010; Falender, Shafranske, & Ofek, 2014;). Undoubtedly, clinical supervisors are perceived to be in a higher position with greater authority. While learning from a role model, it is important that the role model demonstrate their competency to assist learners' acquiring of skills. Therefore, the perceived supervisor competency by CITs will influence the willingness of CITs in learning processes and learning outcomes; thus, affecting the development of self-efficacy.

Factors for Counseling Self-Efficacy

Counseling self-efficacy is often used to measure the learning outcomes of CITs in their training programs (Ikonomopoulos et al., 2016; Mullen et al., 2015; Tang et al., 2004). Bandura (1994) indicated that sources of self-efficacy are mastery, vicarious

learning, persuasion, and emotional arousal. With many factors cited as sources of counseling self-efficacy in the literature, it is necessary to examine these variables and understand how these variables are related to CITs' counseling self-efficacy. Adopting social learning and social cognitive theories as the guiding conceptual framework, the study was interested in exploring the factors associated with CITs counseling self-efficacy development.

Methodology

In this section, the quantitative research method used in this study will be explained. The measurements and research hypotheses were included to present an overview of the research design and methodology. The research question of the study was to explore CITs' development of counseling self-efficacy. A regression model with four predictors was proposed to holistically examine CITs' development of counseling self-efficacy. The four predictors in the regression model were the track of study (school or clinical mental health counseling), Direct client/student contact hours, supervisory relationship, and CITs' perceived supervisor competency of their clinical supervisor. Proper selections f instruments for assessing these predictors and the CITs' development of counseling self-efficacy were conducted; COSE was selected to assess CITS' development of counseling self-efficacy, S-SRQ was used to assess supervisory relationship, and more important, PSDS-S was developed for the purpose of collecting information about CITs' perceived supervisor competency of their clinical supervisor.

Information about these instruments and the research question of the study are to explained in the following section.

Conversion of PSDS

The PSDS was published in 1995 by Watkins et al. to find empirical support for the Supervision Complexity Model (SCM) that was developed by Watkins in 1993. Since the initial validation study of PSDS in 1995, more validation studies for its structures and psychometrics have been conducted to generate good empirical support for PSDS (Baker et al., 2002; Barkar, 2014; Hillman et al., 1998; Watkins et al., 1995). With the intention of discovering supervisees' perspectives of their perceived supervisor competency of their clinical supervisors, the PSDS will be converted with wordings that meet the purpose of collecting information about supervisor competency from CITs lens.

The item rewording process has involved an expert-panel that consists of one Licensed Professional Counselor-Supervisor (LPC-S), one Licensed Professional Counselor (LPC), and two intern-psychologists. There were three focus groups planned for the conversion of PSDS. One was with the LPC and the LPC-S, one was with the two intern-psychologists, and the third one included all four panel members to finalize the survey (see Appendix B).

Research Question

The study includes the following research question:

1. How much variance of counseling self-efficacy is accounted for by track of study, total direct client/student contact hours, supervisory relationship, and CITs perceived supervisor competency of their clinical supervisors?

$\hat{y} = \beta_0 + \beta_1 x_1 + \beta_2 x_2 + \ldots + \beta_k x_k$

$\hat{y}$: The estimated counseling self-efficacy

β_0: The constant of the regression equation

β_k: A coefficient of a predictor

x_k: The value of a predictor variable

Null Hypothesis:

There is no significant amount of variance in counseling self-efficacy accounted by total direct client/student contact hours, track of study, supervisory relationship, and CITs perceived supervisor competency of clinic supervisor.

H_0: $\beta_k = 0$

Alternative Hypothesis:

There is significant amount of variance in counseling self-efficacy accounted for by total direct client/student contact hours, track of study, supervisory relationship, and CITs perceived supervisor competency of clinic supervisor.

H_A: $\beta_k \neq 0$

Significance of Study

This study provides an innovative approach in the research of counseling self-efficacy and supervisor competency. This study examines the development of counseling self-efficacy as a result of relationship with CITs' perceived supervisor competency. In the current literature on CITs' development of counseling self-efficacy, CITs' voice was not included in research to discuss the influences of supervisor competency, and there is no instrument or survey developed to assess supervisor competency through CITs'

perception of their clinical supervisors. The use of the converted PSDS-S became the first attempt to examine supervisor competency from the perception of CITs, and this attempt contribute to the research of CITs' perception of supervisor competency. The current study also included CITs' perceived supervisor competency of their clinical supervisors into the exploration of their development of counseling self-efficacy. Understanding the supervisor competency from supervisees' perspectives and its relationship to CITs' counseling self-efficacy development became the unique feature of this study, and the outcomes contribute to research of counselor training and education.

The Significance of PSDS

Watkins (1995) stated that the quality of research results has relied on the quality of instruments. Walfish et al. (2012) and Watkins (1995) argued that the self-reflected information is considered subjective and can be contaminated by so-called "self-perceived bias" or social desirability. However, limited resources are available in the literature for measuring factors in clinical supervision. Watkins (2014) indicated limited progress made in clinical supervision in various aspects, including training, practice, and measurement development. Milne and James (2002) contended that the psychometric properties of supervisor competency assessment from supervisees are critical for research findings and the advancement of the knowledge base on supervisor competency. Bernard and Goodyear (2014) voiced their long-standing concerns about the inadequacy of psychometrically sound measurements for clinical supervision study.

On the other hand, Barnes and Moon (2006) noted that most instruments assessing supervision can add to research and the advancement of supervisor training.

Hamilton et al. (2022) held a similar position to argue that both subjectively perceived competency and objective-perceived or actual supervisory effectiveness from either supervisor or supervisee in a dyadic supervisory environment are necessary to better understand the dynamics. Researchers have discussed that assessing supervisor competency should use additional resources outside of self-reported evaluations by the supervisors and consider the merits of the evaluation provided by the supervisees (Barnes & Moon, 2006; Martino et al., 2009). Therefore, this study intended to respond to the call of studying supervisees' perceptions and adopted an innovative approach to convert a sound instrument, the PSDS, for the purpose of assessing supervisor competency through supervisees' perceptions. The converted PSDS was used to achieve this purpose, and it became a significant move to further the study of supervisor competency and counseling self-efficacy.

The Significance of Research Outcomes

This study was designed to explore the extent to which supervisees' evaluation of supervisor's supervisor competency influences CITs' development of counseling self-efficacy. The contributions from the outcomes of this study included the understanding on the significance of variables in the development of counseling self-efficacy, such as track of study, direct client/student contact hours, supervisory relationship, and CITs perceived supervisor competency of their clinical supervisor.

The outcomes also provided useful information for researchers and counselor educators to re-assess the significant function of supervisor competency in counselor training and the development of counseling self-efficacy. With the information from the

perceptions of supervisees, the research outcomes contribute to pedagogical practice of counselor education in more effective training of practicum and internship students. The inclusion of supervisees' voice into supervision practice not only expands understanding of CITs' counseling self-efficacy, but also provides an objective reflection on supervisor competency that allows supervisors in training to calibrate their supervisory practice and accelerate their supervisor competency development. This study also elicited future studies that focus more on counseling self-efficacy and the received impacts from supervisor competency and the quality of supervision.

Delimitations

Inclusion of diversity and difference is the new achievement of supervision study in the 21st century (Watkins, 1995). However, these aspects do not take significant weight in this study. The study was intentionally collecting information regarding diversity and difference of clinical supervisors and supervisees using a demographic questionnaire. However, with the focus of the current study, the diversity and difference factors were not integrated into the validation study or the counseling self-efficacy study. Future studies are recommended to explore further about how factors of diversity and differences have affected the development of counselor self-efficacy or supervisee's perceived supervision competency of their clinical supervisors.

CITs' perceived supervisor competency of their clinical supervisors is included in this study; it is assessed by the converted PSDS. Although the original PSDS was well studied and its psychometrics were supported by empirical evidence, the converted PSDS in this study has not gone through similar validation process but will become a future

study. Future studies are highly recommended to develop instruments for assessing the critical construct of supervisee's perceived supervisor competency of their clinical supervisors in a supervision dyad environment and improve the understanding of the development of counseling self-efficacy.

Limitations

Several limitations emerged due to the design and methods of this research. This study utilized an online survey for data collection, which has inherent shortcomings such as the truthfulness, social desirability, and return rate.

A modified paper and pencil data collection was added to meet the estimated sample size for a desired statistical power of 0.80. Different data collection methods create various level of trust in participants; thus, affect their attitudes towards the study and the way they respond to questions (Dillman, Phelps, et al., 2009). With the multiple data collecting methods, a potential for internal reliability of the study is to be expected.

The use of multiple surveys in a study may increase the survey fatigue or participant attrition, which could impact the interpretation of the outcomes. As a quantitative study, the use of online recruitment of research participants limits the generalizability of outcomes due to the representativeness of participants on the population. The limitation of generalizability may narrow the interpretation of outcomes. The use of a converted instrument could limit the use of research results due to limited empirical support to a converted version. Readers should be aware of these limitations and become cautious when generalizing the results beyond the scope of this research.

Focus of the Study

The scope of this study explored factors that influence counseling self-efficacy of CITs. Counseling self-efficacy was used as one critical indicator when measuring the effectiveness of pedagogical implementations of counselor education programs. Previous literature has suggested there is critical professional growth during clinical exposure of counselors-in-training, namely, the practicum and internship experiences (Akos & Scarborough, 2004; Goodyear & Bernard, 1998; Hoffman, 2001; Larson et al., 1992; Mullen et al., 2015; Tang, 2020). During the critical growth period of practicum and internship, the unique role and function of clinical supervisors is closely associated with clinical and professional development of CITs (Kozina et al., 2010; Mullen et al., 2015). Researchers and counselor educators have focused on the supervisors' supervisor competency through training and education (DeKruyf et al, 2013; Dollarhide & Miller, 2006; Falender & Shafranske, 2004, 2017; Herlihy et al., 2002; Magnuson et al., 2001; Milne & James, 2002; Peed, 2017), and there is abundant research on counseling self-efficacy of CITs (Barnes, 2004; Cashwell & Dooley, 2001; Kozina et al., 2010; Mullen et al., 2015; Tang et al., 2004). However, supervisor competency and counseling self-efficacy of CITs were often studied as two separate topics with limited research efforts invested in learning about the association between supervisor competency and counseling self-efficacy of CITs. The scope of this study was aimed to examine this association between supervisor competency and counseling self-efficacy. This research took a different direction to explore the supervisor competency from supervisees' perspectives

and examined the connection between supervisees' perceptions of supervisor competency and measure of counseling self-efficacy of CITs.

Definition of Terms

It is vital to define terminologies used in this study to facilitate the comprehension and interpretation of the study and reports. The terminologies used in this study are to be presented below.

Clinical Supervision. Bernard and Goodyear (2014) provided their version of the definition of clinical supervision as

> an intervention provided by a more senior member of a profession to a more junior member or members of that same profession. This relationship is evaluative; extends over time; and has the simultaneous purposes of enhancing the professional functioning of the more junior person(s), monitoring the quality of professional services offered to the clients that she/he, or they see, and serving as a gatekeeper for those who are to enter the profession (p. 8).

Counselor in Training (CIT). CIT in this study is defined as students in Masters-level Counselor Education programs who are enrolled in a practicum or internship class.

Counseling Self-efficacy. This is the judgement of CITs' self-perceived ability to perform counseling successfully (Cashwell & Dooley, 2001). It is operationalized using COSE.

Supervisory Relationship. Holloway (1995) perceived supervisory relationship to consist of elements within the interpersonal relationship between supervisor and

supervisee, phase of the relationship, and supervisory contract. This study adopts the above narrative to define the term "supervisory relationship" as operationalized with the S-SRQ (Cliffe et al., 2014).

Supervisor competency. In this study supervisor competency is measured using the converted PSDS, which approaches this construct from the lens of supervisees. The definition of supervisor competency adopts Kavanagh's (2011) definition of "A competency emphasis requires clarification of the nature and theoretical grounding of competencies, and of the most effective methods to train and assess them, including an evaluation of problem-based learning approaches and of optimal modes of supervision" (p. 65).

Practicum Students.

> Practicum students have weekly interaction with supervisors that averages one hour per week of individual and/or triadic supervision throughout the practicum by (1) a counselor education program faculty member, (2) a student supervisor who is under the supervision of a counselor education program faculty member, or (3) a site supervisor who is working in consultation on a regular schedule with a counselor education program faculty member in accordance with the supervision agreement. (Section three, H, CACREP, 2022).

Internship Students.

> Internship students have weekly interaction with supervisors that averages one hour per week of individual and/or triadic supervision throughout the internship, provided by (1) the site supervisor, (2) counselor education program faculty, or

(3) a student supervisor who is under the supervision of a counselor education program faculty member. (Section three, L, CACREP, 2022).

Direct Client and Student Contact Hours. This is a variable included in the multiple regression model of this study. This variable intended to collect information about the actual total contact hours of individual counseling and group therapy provided by individual practicum or internship students by the time of participating in this study (CACREP 2024).

Summary

The introduction chapter started with presenting the topic of interest and explored the background of the topic. In this section, the discussions included the counseling self-efficacy development of CITs, definition of counseling self-efficacy and its importance, and the critical roles of clinical training in practicum and internship. The statement of problem described the influence of clinical supervisors on the counseling self-efficacy of CITs. It was asserted that currently there is a lack of instruments to capture viewpoints from the lens of supervisees in a clinical supervision process. Following the statement of problem, the purpose of study presented the intentions of this study to answer the issues mentioned in the statement of problem. This study includes a research design that intended to use converted PSDS to capture supervisees' perceptions of clinical supervision. The study also collects counseling self-efficacy with COSE and factors in supervision using S-SRQ. The data will be analyzed to explore the amount of variance of CITs' counseling self-efficacy that is explained by perceived supervisor competency of their clinical supervisors, supervisory relationship, track of study, and the total direct

client/student contact hours. The significance of study explained the expected impacts brought by the outcomes of this study. The outcomes of the study strive to bring new directions to understanding counseling self-efficacy and supervisor competency and inspire future research on this topic. The current study also includes limitations. In the limitation section, potential items of limitations were proposed and discussed in order to help readers properly utilize the outcomes of this study. In the scope of the study, the main focus of research domains was discussed in order to assist readers understanding the perimeter where this study intended to explore. A section including definition of terms was provided to operationalize the professional terms that will be used in this research. The structure of this chapter aimed to provide a framework that explained the operation and design of this research.

CHAPTTER II

Literature Review

This literature review chapter explores the definitions and concepts of self-efficacy and clinical supervision. The chapter includes the impact of clinical supervision on the training and competency of mental health professionals. Guidelines related to clinical supervision provided by various major professional organizations, training of clinical supervisors, clinical supervisor's competency, and their qualifications will also be discussed. Finally, counselors in training (CIT)s' counseling self-efficacy and its development are another focus in this literature review.

Clinical Supervision

Clinical supervision is considered an essential component in training mental health professionals. Clinical supervision is perceived internationally (Bernard & Goodyear, 2014; Inman et al., 2014) as the mechanism for both the continuation and betterment of mental health professions; many scholars along the development of clinical supervision have attested the viewpoint through their research and publications (Barnett & Molzon, 2014; Bernard & Goodyear, 2014; Falender, Shafranske, & Falicov, 2014; Falender, Shafranske, & Ofek, 2014; Milne, 2007; Watkins, 1995, 2014, 2018). Watkins (2018) defined clinical supervision as "the single most powerful contributor to therapist competence development and practice excellence" (p. 521). During clinical supervision, supervisors provide supervisees with the essence of the profession from their years of practice; they strategically assist their supervisees realizing immediate objectives and prepare them to be ready for more complex practice (Barnett et al., 2014; Carrol, 2010;

Falender, Shafranske, & Ofek, 2014). Clinical supervision plays a role to safeguard the competencies and professionalism of mental health professions and, in the process, upholds the ethical responsibility towards the welfare of clients who indirectly participated in the clinical supervisory practice (Barnett, 2011; Barnett et al., 2007; Bernard & Goodyear, 2014; Falender, 2014; Falender, Shafranske, & Falicov, 2014; Falender, Shafranske, & Ofek, 2014; Reiser & Milne, 2014). Barnett and Molzon (2014) indicated that the ultimate objective of supervision is to transition professional knowledge and skills from supervisors to their supervisees and to prepare their readiness for their continuous exploration in professional development. Recognizing its fundamental impact, clinical supervision is required in CACREP standards for practicum and internship training (CACREP, 2016); post-degree supervision also becomes one of the required criteria for state licensure of professional counselors to further finesse their professional skills and knowledge and reinforce their professional identity after graduation (Keller-Dupree et al., 2020).

Clinical supervision assumes the mission of advancing the quality of mental health professionals. Watkins (1995) described clinical supervision as a teaching and learning process, through which mental health trainees and practitioners "can learn about the art and craft of psychotherapy" (p. 568). Bernard and Goodyear (2014) echoed the notion of Rodenhauser (1992) that clinical supervision is an essential component in training and perfecting many branches of psychotherapy and mental health counseling professionals. Clinical supervision provides a unique and pivotal opportunity for counseling students to translate classroom knowledge into lived experience, from

articulating knowledge on lifeless paper to implementing skills on breathing warm body (Diambra & Studer, 2010). Evidently, clinical supervisors do not only guide the professional development of supervisees in their professional knowledge and skills, but also safeguard the quality of the profession and serve as a gatekeeper (Falender, 2014; Falender, Shafranske, & Ofek, 2014, Falender et al., 2017; Watkins, 1995). More specifically, by performing a "quality-control, quality-assurance function" (Watkins, 1995, p.568). Indeed, with the support and guidance of a clinical supervisor, mental health trainees continue to enrich their counseling knowledge and improve their clinical skills, and eventually transition into competent mental health professionals (Barnett & Molzon, 2014).

Clinical supervision is perceived critical for not only skill refinement, but also for the continuation of professional development. The requirements for post-graduation clinical supervision are different between school counseling and clinical mental health counseling (Shallcross, 2013). The clinical mental health counselors typically receive lengthy post-graduate clinical supervision to further their professional development. Henderson et al. (2016) conducted a study to provide an outlook for post-graduate clinical supervision requirements for newly graduated counseling interns before receiving licensure for practice. They found inconsistent clinical supervision requirements across 50 states, ranging from one to four years with the commonly observed 3000 service hours. However, school counselors have no post-graduate requirement for clinical supervision. Moving forward, professional school counselors will have to face this challenge of clinical supervision in order to establish a solid professionalism and be

equipped with proper knowledge and skills to face the rising mental health issues among K-12 students (DeKruyf et al., 2013; DeKruyf & Pehrsson, 2011; Merlin-Knoblich et al., 2018; Walsh-Rock, 2018).

Clinical supervision has received an increasing volume of attention due to amplified research projects and publications that have worked in concert to further study the construct and the practice and function of clinical supervision (Watkins, 2018). After decades of efforts, researchers and scholars have made significant progress regarding clinical supervision. Watkins (2014) has mentioned progress being made in many fronts, such as setting standards, establishing manuals, training of clinical supervisors, and practicing of clinical supervision. Bernard and Goodyear (2014) reported researchers' findings and publications of clinical supervision have focused on effects of supervision on involved clients, interactions between supervisor and supervisee, supervisee's counseling competence, and supervisor's personal quality and other factors that affect the clinical supervision process. While recognizing great achievements, scholars like Reiser and Milne (2014) and other researchers including Falender et al. (2004) and Stoltenberg (2005) considered that supervision is still in its early stages of research and called for additional intellectual investments for future research.

Clinical Supervision Guidelines

The Council for Accreditation of Counseling and Related Education Programs (CACREP) is the crucial organization that standardizes the training and supervision for master's and doctoral students in counseling training programs. CACREP-accredited counselor education programs are the dominant sources on educating and training of

doctoral and master's counselors. While celebrating its 40th anniversary in 2021-2022 school year, CACREP has accredited more than 900 doctoral and master's counseling programs across the nation (CACREP, 2022). To maintain the quality of counselor training and operations of accredited training programs, CACREP has established a standardized and comprehensive program evaluation process for training programs seeking accreditation. The 2016 CACREP Standards outline criteria and qualifications for relevant training in counseling programs, and its section two and three are especially important to the discussion of clinical supervision. For example, in section two, CACREP lists the counseling curriculum requirements for clinical supervision training and section three includes the obligations of clinical supervision in practicum and internship practice.

Section two of the CACREP Standards (CACREP, 2016) defined fundamental knowledge of counseling education for master's programs in eight core areas, which should be assessed and practiced in practicum and internship under clinical supervision. Section three of Professional Practice shifts attention to the practical training of counseling students in practicum and internship which "provides for the application of theory and the development of counseling skills under supervision" (CACREP, 2016, pp. 14-15). Reiser and Milne (2014) claimed the critical function and responsibility of clinical supervision to students in training and their potential clients. Researchers contended that clinical supervisors are not only functioning as mentors of their supervisees and facilitating their integration of professional knowledge and clinical skills, but also safeguards for the welfare of clients, thus maintaining the basic ethical duty of do

no harm practice (Barnett & Molzon, 2014). Therefore, CACREP identifies important criteria and qualifications for clinical supervisors, who are competent to lead students through clinical practice and promote their professional development as a professional counselor.

CACREP provided a list of criteria for site supervisors who conduct clinical supervision during practicum and internship. These criteria include:

> (1) a minimum of a master's degree, preferably in counseling, or a related profession; (2) relevant certifications and/or licenses; (3) a minimum of two years of pertinent professional experience in the specialty area in which the student is enrolled; (4) knowledge of the program's expectations, requirements, and evaluation procedures for students; and (5) relevant training in counseling supervision" (CACREP, 2016, p. 15).

In addition to regulating the criteria of site-supervisors, the CACREP (2016) also addresses the roles and responsibilities of counselor educators in clinical supervision, where counselor educators collaborate with qualified site-supervisors and take actions in providing "orientation, assistance, consultation, and professional development opportunities" (CACREP, 2016, p. 15) to partnered site-supervisors. The supervision provided by counselor educators may ensure the ethical practice of practicum and internship experiences and promote the learning and development potentials of students under clinical supervision in practicum and internship.

Following the action of CACREP, many leading professional organizations, such as Association for Counselor Education and Supervision (ACES), American School

Counselor Association (ASCA), and American Mental Health Counselors Association (AMHCA), have taken actions to strengthen and improve the quality of clinical supervision for practicum and internship students.

ACES is the leading organization of counselor education and counselor training, and has devoted significant effort in the development of educational preparation and clinical training of future counselor educators and counselors. With the vision of best practice in counselor education and supervision, ACES invested a significant effort to craft a blueprint for providing a thoughtful direction to the contents in the domain of supervision (ACES, 2016). ACES advocates for counselor educators to receive proper training in supervision. As a division of American Counselor Association (ACA), ACES members are comprised of counselors, counselor educators, and supervisors to pursue high quality pedagogy in educating and training the next generation of counselors. ACES addresses proper educational standards and clinical training and supervision to answer the call from its members requesting more detailed guidance in supervision (ACES, 2011). The ACES Task Force for Best Practice in Clinical Supervision was assembled and published a report (ACES, 2011) to provide essential guidelines for supervision practice. This action promotes the professional practice and enhances the quality of clinical supervision. Noteworthy, this report provides separate definitions of clinical supervision, administrative supervision, and program supervision (ACES, 2011). Each type of supervision was well defined in the scope of practice and the purposes of different types of supervision. There are 12 areas of supervision practice covered in this task force report. These areas range from the supervision implementation, formats, logistics, to the

training and competencies of supervisors. Among the 12 areas, section 7-b focuses on the competency of supervisors and states that "the supervisor provides supervision only for those supervisees and clients for whom the supervisor has adequate training and experience" (ACES, 2011, p.10); section 11 addresses the supervisor's qualification and highlights formal training in supervision that requires clinical supervisors to be competent in providing clinical supervision and abide by state licensure requirements for supervisors.

ASCA is the main model used among school counselors in the United States. ASCA is not only dedicated to serving school counselors but has expanded to establish structure and professional identity within professional school counseling. This leadership in professional school counseling provides guidelines and criteria needed for training school counseling students/interns, preparing school counseling programs, and developing school counselor educators and supervisors. The ASCA Ethical Standards for School Counselors has stated that the document "serve as a guide for the ethical practices of all school counselors, supervisors/directors of school counseling programs and school counselor educators regardless of level, area, population served or membership in this professional association." (ASCA, 2016, p. 1). It regulates the professional conducts and defines the responsibilities in trainees, educators, certified school counselors, and supervisors (ASCA, 2022).

Since its establishment in 1952, ASCA has advocated for the roles of school counselors, for their services that empower K-12 students and guide students to their full potential, and maximized development in schooling, career, home life, and personal

development locally and globally (ASCA, 2020). Bearing the responsibilities and duties on student success, ASCA provides guidelines to regulate the training and practice of school counselors. The current ASCA Ethical Standards for School Counselor (ASCA, 2016) keeps this honorable tradition and functions as the ultimate voice in directing both the ethical conduct of school counselors and ensuring the highest standards of the School Counseling profession.

The ASCA School Counselor Professional Standards and Competencies (2016) is a critical document for the school counseling profession; it lays the ground rules and details for developing essential mindsets and behaviors of school counselors. Professional School Counselors (PSCs) follow its directives and conduct their professional duties and fulfill their professional responsibilities to meet the needs of pre-K–12 students (ASCA, 2016; Tang, 2020). The paramount goal of professional standards and competencies aims at developing and properly operating comprehensive school counseling programs on pre-K-12 campuses. This goal expects the PSCs to effectively deliver services to meet students' needs in academic achievement, career planning and social/emotional development (Tang, 2020).

Regarding supervision, the ASCA (2016) issued the *Counseling Competencies* to put forth a set of competency standards that guide supervisors in supervising trainees in accordance with the ASCA National Model (Standard III-B-4d). The ASCA (2016) *Ethical Standards for School Counselors* also addresses issues relevant to supervision and provides guidelines in standard A-6-e, encouraging school counseling supervisors to obtain proper training and become capable supervisors for school counseling interns.

Although it seems that ASCA has encouraged professional school counselors to seek professional development in supervision, they have not detailed the training requirements or criteria and qualification for being competent school counseling on-site supervisors.

AMHCA, the sister organization for clinical mental health counselors, recently revised its AMHCA Standards for the Practice of Clinical Mental Health Counseling (AMHCA, 2020). In this document, section III specifically addresses the "Faculty and Supervisor Standards" to regulate the qualifications of those who will be the foundation of training and developing clinical mental health counselors (AMHCA, 2020, p. 4). The section III-B illustrates the minimum qualifications of clinical supervisors with 24 continuing education hours in "theory and practice of clinical supervision" (2020, p. 5) and further provides itemized areas for *Knowledge* and *Skills* that should be developed and possessed by clinical supervisors.

Many professional organizations notice the importance of clinical supervision in training and clinical practice. The critical role of clinical supervisors should be regulated to ensure the training quality and students' clinical practice for professional development.

Training Clinical Supervisors

Counseling supervision has moved through an early stage of development, when there were no clear criteria of clinical supervisors, their qualifications, and required training, and has arrived in a new stage where the current trend requires clinical supervisors to become licensed, certified, or endorsed by the state licensing boards (Nate & Haddock, 2014). During the early stage of clinical supervisor credentialing, counselors did not need any formal or informal supervision training, and they were

eligible to serve as a supervisor once they accumulated a certain amount of clinical counseling experiences (Crook-Lyon et al., 2011). Previous literature has found that supervisors from early stages often lack formal education in supervision (Fall & Sutton, 2003). Peake et al. (2002) recognized that significant responsibility of clinical supervisors yet was surprised knowing only roughly one-fifth of clinical supervisors received any formal training or education in supervision.

Research conducted by Rapisarda et al. (2011) indicates that doctoral students can establish the supervisory skills just through the supervision course and training in a counselor education program. Currently, the training criteria of CACREP-accredited Counselor Education and Supervision doctoral study have included the supervision course and training (CACREP, 2016). However, there is not a consistent academic and skill training required for supervisors who might hold a master's level counseling degree without supervision training or education (Nate & Haddock, 2014). With such a discrepancy in requirements for supervisors, a counselor's experience or seniority does not predict their ability to supervise effectively (Leddick & Bernard, 1980; Worthington, 2006). Researchers have been promoting the importance of formal training of clinical supervision. Herlihy et al. (2002) asserted that, without formal training and education, it is inevitable to have incompetent clinical supervisors even with years of clinical experiences. Milne and James (2002) also found the correlation between the inadequacy of supervisory competencies with inadequate formal training. Falender and Shafranske (2004) discussed that a large proportion of clinical supervisors practice without specialized education, training, or supervision. Herlihy et al. (2002) further addressed

this concern and stated that supervisee's professional development can be compromised when supervisors do not receive formal training or education of supervision.

Previous researchers (Dollarhide & Miller, 2006; Magnuson et al., 2001;) had concerns on inadequate supervision education and training that led to inadequate supervisor competency and damaged supervisees' professional development. Magnuson et al. (2001) and Dollarhide and Miller (2006) emphasized that well-educated clinical supervisors are imperative to not only the advancement of the clinical supervision profession but also the ideal professional development of supervisees. Knowing that supervision education and training were critical to the development of competent supervisors, there is a lack of standardized curriculum for supervisor training, and education programs and state licensing boards allow a variety of training courses or workshops to be used for supervision training purpose (Milnes et al., 2011; Reiser & Milne, 2014). Therefore, scholars continued to call for the necessity on the establishment of the specified training and standards for counseling supervisors to ensure supervisory competencies (Borders et al., 1991; Dye & Borders, 1990; Falander et al., 2017; Higgins et al., 2013; Milne et al., 2011).

Advancement of Clinical Supervision

Watkins is a researcher and scholar who made clinical supervision his primary research interest. He edited a handbook of clinical supervision in 1997 and co-edited a handbook for clinical supervision with Derek Milne in 2014, while conducting many research projects and published numerous articles about the clinical supervision. With his expertise and compassion for clinical supervision, Watkins documented decades of

development in the field clinical supervision and provided his vision of the future advancement of clinical supervision. Watkin's articles published in 1995, 1998, and 2014 have encapsulated yet lineated the development of clinical supervision; he has chronicled the footprints and milestones achieved by clinical supervision scholars along their exploration of its practice.

Watkins (1995), in his article titled *Psychotherapy Supervision in 1990s: Some Observations and Reflections*, marked ten aspects of achievement after a collective effort of scholars of the previous 20 years. The ten aspects can be explained by three categories: nature of clinical supervision, clinical supervision practice, and research of clinical supervision. Watkins (1995) asserted the nature of clinical supervision is an "esteemed service" (p. 569). He claimed that many mental health professionals are engaging in clinical supervision because they perceived it as a relevant component of professional practice and the formation of professional identity. Professional identity development is instilled in the close and frequent interactions between clinical supervisors and their supervisees. A supportive supervisory relationship can be therapeutic at times; however, some supervisee internal issues can unavoidably emerge and be resolved in a clinical supervision process; thus, Watkins reminded all involved in clinical supervision should distinguish between clinical supervision and psychotherapy. He further contended that clinical supervision is a "unique service" (Watkins, 1995, p. 570) with its own knowledge base, structure, and delivery.

Supervision Theories

Watkins (1995) remained unsatisfied with the development of supervisory theoretical orientation, the systemic approach to clinical supervisor training. Ellis (2010) promoted the importance of theory or theorizing clinical supervision; he claimed that theory or theorizing clinical supervision paves the way for effective supervisory practice because it "bridge[s] the science and practice of supervision" (p. 98). Milne et al. (2008) contended that theory development was one of major hurdles that hinders the advancement of clinical supervision. Watkins elaborated on the regard of the practice of clinical supervision and noted that the developmental nature of the clinical supervision model has posited to take over the long-practiced psychotherapy-based supervision model. The psychotherapeutic-based supervision has been consistently aligned with the branches of counseling or psychotherapy and dominated the practice of clinical supervision for decades. With time, such a practice was unable to deal with emerging issues from clinical supervision practice, thus, it renders a space for the developmental paradigm to root in the field of clinical supervision practice. The focus on establishing models for clinical supervision was aimed to increase the quality of clinical supervision. To assure the quality of clinical supervision, guidelines can be helpful to not only improve the quality of clinical supervision but also prevent harmful consequences.

Watkins (1997) conducted a series of studies on the practice of clinical supervision to discover valuable elements of clinical supervision. He summarized elements for effective clinical supervision from empirical studies and emphasized elements like being supportive, empathetic, and respectful when engaging in supervisory

activities were critical for an effective clinical supervision. He added that providing timely feedback with clarity and fostering autonomy by encouraging supervisee to self-reflect and self-examine can also be beneficial. Watkins (1997) also noticed counterproductive practice was reported. To avoid harmful practice and improve its quality, a concrete framework that aligns clinical supervision practice becomes critical in upholding the integrity of clinical supervision (Pearson, 2004).

Lastly, Watkins was pleased with the increasing investment of research efforts on studying clinical supervision. This increase of scholarly activities on supervision has been evidenced by the elevating level of exploration and examination of clinical supervision from researchers and mental health practitioners. He expressed his support for the inclusion of quality and variety of research questions, research designs, and statistical procedures to solicit answers for comprehensive understanding of clinical supervision practice. He encouraged the inclusion of multicultural variables for the betterment and advancement of the practice to be "informed, sensitive, and effective" (Watkins, 1995, p. 577).

Proper Supervisor Training

In addition, the article titled *Psychotherapy Supervision in 21st Century*, Watkins (1998), as the subtitle stated, provided his perspective on possibilities of clinical supervision. In the article, Watkins first reiterated the critical and unique function of clinical supervision in training the coming generation of mental health professionals, then presented ten needs for the advancement of clinical supervision. These ten needs can be consolidated into two areas: clinical supervision practice and research. Watkins

acknowledged a holistic development of clinical supervision in theory, clinical practice, and research engagement before he elaborated on the ten needs for the future endeavor of clinical supervision.

Proper training of clinical supervision is beneficial for all involved in clinical supervision processes, including the supervisor, supervisee, and the client, "a triadic affair" (Watkins, 2018, p. 89). From Watkins' perspective of practicing clinical supervision, he stressed on the establishment of supervision manuals, standards, and training in how to supervise. The establishments of supervision manuals and standards provide a guide for clinical supervision practice; he asserted that the benefits from such an establishment are consequential, which is not only impacting supervisor training and clinical practice but also guiding research efforts. Indeed, training of clinical supervisors is a concern (Watkins, 1998). He argued the necessity of such training and said, "we would never dream of turning untrained therapists loose on needy patients, so why would we turn untrained supervisors loose on those untrained therapists who help those needy patients" (Watkins, 1997; p.604). With proper training, Watkins contended that the supervisor will be able to expect and handle issues that arise in the process, the supervisee will be better served and become more competent professionals, and the interest of clients involved in the process will be safeguarded.

Research Efforts on Clinical Supervision

Regarding the research efforts invested in clinical supervision, Watkins emphasized the need for high quality measurements because "research is only as good as the measurement tools and procedures that are used for assessment and evaluation"

(Watkins,1998, p. 94). Empirical evidence to link clinical supervision practice to client outcome or moderating variables, more rigorous research design and involve multi-methods, multi-rater, behavioral, and longitudinal design are all in need for more researchers' attention while advancing clinical supervision towards excellence. Reiser et al. (2014) continued the claim and called for more empirical study to provide evidence for accountability of clinical supervision. Watkins (1998, 2014) also stressed on the needs for research effort on promoting multicultural understanding and diversity perspectives. Follow-up and replication of research activities were less visible in clinical supervision. Such absences can adversely affect the influence of theories or empirically strengthen previous findings.

Watkins (2014) published an article and discussed his observations of clinical supervision in the new millennium. In this review, he emphasized his delight for the global attention directed towards the practice and study of clinical supervision. He organized his articulation of clinical supervision from four areas: supervision training and practice, measurement, differences and diversity, and research. In the writing, he made direct comparison and contrast of clinical supervision between the 1990s and what it was after entering the new millennium.

Supervision Training and Competency

Watkins (1995) had voiced his encouragement on establishing standards and provisions of clinical supervisor training opportunities in 1990s. He vocalized the critical influence from both establishments of practice standards and educational provisions on the development of clinical supervision. After decades of collective efforts of clinical

supervision scholars and practitioners, in the new century, Watkins observed a great leap on these fronts with the competency movement and described it as "never has a singular shift had such a rapid, and all-pervasive impact on the entirety of the supervision enterprise" and with "razor-sharp focus" (Watkins, 2014, p. 254) marching onto the global stage. Watkins (2014) observed supervision competency frameworks had been developed in several countries that included three essential domains, knowledge, skills/abilities, and attitudes, of clinical supervision. Although discrepancies among the three frameworks existed, they addressed six shared competencies; these competencies were consistent with the finding of the systemic analysis of core competencies of clinical supervision of Olds and Hawkins (2014), including:

> (a) knowledge about/understanding of supervision models, methods, and intervention.
>
> (b) knowledge about/skill in attending matters of ethical, legal, and professional concerns.
>
> (c) knowledge about/skill in managing supervision relationship process.
>
> (d) knowledge about/skill in conducting supervisory assessment and evaluation.
>
> (e) knowledge about/skill in fostering attention to differences and diversity.
>
> (f) openness to or utilization of a self-reflective, self-assessment stance in supervision. (Watkins, 2014, p. 254)

The demand for accountability was a pivotal development for clinical supervisor education and training (Watkins, 2014). There was a long-standing assumption which

equates supervisor competency to clinical practice experiences. The willingness to believe the notion that an experienced clinical mental health practitioner can automatically become a competent clinical supervisor is dismissed in the 21st century. With the recognition of essential supervisory competencies and the organization for a systemic approach to cultivate supervisor competency, assessment and evaluation through each level of training of supervisor education and training became the answer to the demand for accountability (Falender & Shafranske, 2012).

Measurement in Clinical Supervision

The lack of quality measurements for clinical supervision study is a long-standing concern (Bernard & Goodyear, 2014). Researchers and scholars of clinical supervision have continuously stated the need for high quality measurements. Watkins (1995) stressed this need and mentioned that the quality of measurements has a determinant effect on the confidence of research outcome. Without quality, sound measurements, research outcomes are open for doubts and questions (Pedhazur & Schmelkin, 2013; Watkins, 2014). Watkins (2013) noted that many researchers used author-made instruments or modified existing instruments through conveniently replacing wordings on existing instruments. Even though the number of research publications are increasing, Watkins (2013) pointed out the misapplied phenomenon about measurements in the field of clinical supervision research. Watkins (2014) was convinced that neither author-made nor modified approach may employ measurements with poor or no psychometric merits, and he believed poorly constructed measurements were not able to generate quality data.

Without quality data, the research quality has been questioned and outcomes lost its lasting worthiness.

There has been advancement made in this pressing topic. More psychometrically rich measurements were published over the last decade. In his 1995 review, Watkins was able to name only two sound measurements: Role Conflict and Role Ambiguity Inventory by Olk and Friedlander (1992) and Relationship Inventory (Schact et al., 1988). Researchers have become hopeful as more quality measurements have hit the research in the field, such as the Supervisory Relationship Questionnaire (Palomo et al., 2010), the Supervisory Relationship Measure (Pearce et al., 2013), and the Supervision: Adherence and Guidance Evaluation (Reiser & Milne, 2014). He also mentioned advancement in this front from other fields, such as nursing and social work. Overall, Watkins felt encouraged with the trend of measurement development.

Difference and Diversity in Clinical Supervision

Diversity is a challenging topic in the field of mental health. Watkins (2014) contended that diversity in clinical supervision did not receive its fair share of attention as it has been minimally researched. Recently, the landscape of clinical supervision has improved on diversity in clinical supervision (Falander et al., 2014; Kemer et al., 2022; Watkins, 2014). The need for discussion of difference and diversity has been increasing in volume. Knowledge and awareness on this aspect have been woven into the fabric of clinical supervision competency structure. Watkins (2014) identified three prominent observations for multicultural competent supervisors; a competent clinical supervisor needs to commit to strengthening awareness and knowledge, creating a supervisory

environment to grow competent mental health practitioners, and making multicultural conversation a constant in the supervision process. Further, Watkins recognized the complex nature of multicultural issue and indicated it is indispensable for the advancement of clinical supervision.

Research of Clinical Supervision

Research is an essential tool that establishes empirical foundation for the vigorous development of clinical supervision (Falender & Shafranske, 2017; Milne et al., 2012; Watkins, 1998, 2014). He assessed the strength of clinical supervision from various aspects, such as training and practice, measurement, differences, and diversity, and described research of clinical supervision as limited or deficient. He cited the stagnation of research and limited progress that had been made in the last couple decades and said, "most supervision research needs that were pressing in the 1990s remain every bit as pressing in the 2010s" (Watkins, 2014, p. 264).

Clinical supervision has been perceived as an effective pedagogical practice and a valuable asset to the training of competent mental health professionals (Holloway & Neufeldt, 1995; Watkins, 2017, 2018). This has indirectly improved the quality of service to benefit client's mental health (Falender & Shafranske, 2012; Milne, 2008, 2009) despite the absence of empirical support (Ellis & Ladany, 1997; Reiser & Milne, 2014). Scholars acknowledged the complex nature of clinical supervision and challenges for a vigorous research design (Falander, 2017; Hill & Knox, 2013; Watkins, 2018). Reiser and Milne (2014) were troubled by the lack of empirical foundation and conducted a literature review in an attempt of filling the gap. They summarized a collection of

review articles for clinical supervision and echoed Watkin's conclusion; they stated that research of clinical supervision was plagued by methodical fidelity concerns. Watkins (2014) recognized that the scope of investment is significant in expanding the landscape of research from inclusion of multi-rater, multi-year research design, increasing sample size, and collection of client-outcome or action data. All mentioned above are challenges for average researchers, thus, affect the advancement of research productivity and quality (Bernard & Goodyear, 2014; Watkins, 2014). After recognizing areas for improvement on the aspect of research, Watkins (2014) provided some encouraging developments in the research front of clinical supervision, such as the use of psychometrically-sound measurement tools for research, holistic and structural evaluation of supervisor training, and embracing of methodological pluralism. The advancements in clinical supervision research are essential for the students in training.

Supervisor Competency

Clinical supervision has its critical function in transforming a counseling student to a competent mental health professional (Nate & Haddock, 2014; Watkins & Scaturo, 2013). Watkins and Scaturo (2013) described it as the essential to not only extending the existence but also the betterment of various mental health professions (Falender & Shafranske, 2004; Ladany & Bradley, 2011). Effective clinical supervision is a vital component to future therapist development (Watkins, 2018). This encourages professional growth of mental health trainees (Bernard & Goodyear, 2014; Border, 2014; Watkins & Milne, 2014; Watkins, 2018). The topic of clinical supervision has attracted more attention in the recent decades (Falender & Shafranske, 2004; Watkins, 2014, 2017,

2018) and experts and practitioners have held tremendous amount and serious discussions regarding the topic (Falender & Shafranske, 2004; Watkins, 2014). Indeed, research findings provided evidence for enhancing supervisee growth in areas like self-awareness, treatment knowledge and approaches, self-efficacy, and therapeutic relationship (Goodyear & Guzzardo, 2000; Hill & Knox, 2013; Inman et al., 2014; Wilson et al., 2016). However, research findings warn the field of the negative impact that hindered the development of mental health trainees that stemmed from supervision malpractice (Bang & Goodyear, 2014; Friedlander, 2015; Gray et al., 2001; Ramos-Sánchez et al., 2002; Watkins & Scaturo, 2013). As evidenced by research findings, clinical supervision does not automatically warrant desirable outcomes; attention should be directed towards the quality of clinic supervision and necessary supervisor competency to safeguard trainee's professional competency development (Borders, 2014; Falender & Shafranske, 2017; Watkins, 1997).

The supervisory process involves more than just a supervisor and a supervisee. Supervision is triadic in structure (Barnett, 2007). Although discussions of clinical supervision have been focused on the supervisee and the supervisor, we should not lose sight of the other critical participant in the process. Akos and Scarborough (2004) emphasized that the context of a clinical supervision consists of three parties: a supervisee, a supervisor, and the client with the inter-relationships among them. Stoltenberg (2005) implied that clients' mental process in concert with the supervisees' professional development should be a topic during supervision. The welfare of the three parties in a supervisory process are intertwined and mutually connected (Akos &

Scarborough, 2004; Barnett & Molzon, 2014; Falender & Shafranske, 2004). Under the context of those involved and benefited in the supervision, supervisors have to be skillful in managing and facilitating the development of all involved in the supervision process (Falender & Shafranske, 2017).

Lamprecht and Pitre (2018) indicated that an effective supervisory practice requires the supervisors to have the expertise and knowledge about supervisees' readiness in professional development and emotional aspects. Akos and Scarborough (2004) proposed that standardized clinical supervisor competency through formal training and education should be in place to strengthen supervisors' professional knowledge, skills, and values for supervisory practice. Falender et al. (2004) also contended that a required specialty training is necessary for competent supervisors to engage in effective supervisory practice. Additionally, Reiser and Milne (2014) voiced their support for standardizing supervisory training for the preparation of manualizing and standardizing the supervisor training.

Supervisors bear the responsibility of facilitating supervisees' development. The expertise in supervisees' developmental needs is essential for supervisor competency. Lamprecht and Pitre (2018) added that clinical supervisors should be able to implement proper strategies to encourage and support supervisees' further exploration in mental health profession (Stoltenburg, 2005). With the focus of supervisor competency and training among scholars, the topics of supervisor competency and competency training have not yet received desired attention and effort that are invested in discovering of measures to improve supervisor competency (Granello et al., 2008; Kühne et al., 2019).

Granello et al. (2008) researched the need for additional influential factors, such as supervision training or experience in conducting supervision may enrich supervisors' expertise. Stevens et al. (1998) also answered this question of supervisor competency and concluded that intentional competency training rather than supervision experience was crucial to supervisor competency in a study of 60 supervisors. Vidlak's (2002) study included 99 participants in a study about supervisor competency and its development. The study found that the structured supervisor training is more influential in supervisor competence than simply supervision experiences. A similar result has been reported from the conclusion of a qualitative study of supervisor development (Baker et al., 2002).

Measuring Supervisor Competency

In the past few decades, theories about clinical supervision have been researched. The social role or process method was similar to Bernard's (1997) discrimination model of supervision that identified three role functions, teacher, counselor, and consultant, of clinical supervisors. The social role approach of clinical supervision emphasized on the needs of supervisees that called for various functions of supervisors to meet needs of supervisee. Psychotherapy-based models were supervision models grounded in psychotherapy (Bernard & Goodyear, 2005; Watkins, 1995) and shared similar terminology, even framework with the psychotherapy it is based on (Smith, 2009). This category of clinical supervision models conducted supervision via specific theoretical lens of a psychotherapy. Developmental approaches of clinical supervision had attracted a wave of attention from researchers of the field (Stoltenberg, 2005); this group of

practice perceived the clinical supervisor as a facilitator who encouraged the professional growth of supervisee in a supervisory process.

Discussion about clinical supervisor's development was congregated in a consensus that supervisor's professional growth is developmental; supervisors develop and enhance supervisory practice through enriched knowledge and practical experiences (Barker & Hunsley, 2013; Hess, 1987; Stoltenberg et al., 1994). However, these schools of thought remain conceptive with limited empirical support.

Watkins et al. (1995) claimed lack of empirical data to depict supervisor's supervision competency development. Research and study about supervisor's supervision competency development relied heavily on supervisor's self-reflected information. Self-reflection can facilitate growth of knowledge (Vygotsky, 1986); however, it is subjective in nature and may not capture the reality. Nelson et al. (2008) suggested a complimentary inclusion of objective measures of supervisor's competency can be constructive and add to the training process of supervisors. In addition, Efstation et al. (1990) contended the importance of including perceptions of both supervisor and supervisee about each other in the supervision process is necessary for a comprehensive understanding of the dyadic nature of clinical supervision.

It is also essential to understand the knowledge and competency of practicum and internship students and their ability to rate the supervisor's supervision competency. In fact, this practice has been adopted by some well-established researchers of clinical supervision. Palomo et al. (2010) and Cliffe et al. (2014) included the measure of Indices of Supervision Outcome in their validation study and asked their supervisee-participants

to rate their perceptions of their supervisor's supervisor competency to assess the predictive validity of scores produced by these two rigorous instruments, namely SRQ and S-SRQ. Williams (1994) developed the Supervision Feedback Form (SFF) for supervisor training purpose. In that study, supervisees were asked to provide feedback to their supervisors about their personal experiences and supervisors' performance in supervision. According to Williams (1994), the participants reported that the feedback from their supervisee was helpful in not only helping the supervisor being aware of their strengths but also recognizing areas for improvement, and building confidence. Milne and James (2002) conducted their study of supervisor training and evaluation of their supervisor's performance after each supervision session with SFF to study the supervisees' evaluation of supervisors.

Supervisory relationships often consist of one supervisor and one supervisee who are informants of the dynamic in this dyadic process and inevitably their understanding and perception of the supervisory process are critical to research projects about clinical supervision. There were research projects aimed at finding alignments of perceptions between the two in a supervisory context. Henry et al. (2004) explored agreements on perceived supervisory topics between supervisor and supervisee in supervision; they reported an agreement between the two parties on critical topics deliberated in supervision, but differences were found regarding the focus of discussion. Evidently, supervisors and supervisees have different priorities while engaged in supervision. They implied the extent of agreement between the two involved individuals in a supervisory context may influence the outcome of supervisory experiences for both supervisees and

supervisors. Since differences exist, it is reasonable to include information from both parties to enrich the data base as Hamilton et al. (2022) contended that collecting data from one of the supervisory dyads may impede the progress of comprehending the practice of clinical supervision. Barnes and Moon (2006) contended the needs of including an objective measure along supervisor's self-reflection of supervisory competencies can better capture the development of supervisor competency beyond a self-reflected/reported observation. Indeed, self-report type of data have their own set of concerns, such as social desirability (Watkins, 1995) and "self-perceived bias" (Walfish et al., 2012, p. 639) that impede a true reflection of the reality; thus, a measure that compliments such a practice becomes necessary. In a dyadic environment like clinical supervision, inclusion of inputs from both involved will increase the significant impact of supervision outcomes (Martino et al., 2009). Hamilton et al. (2022) contended the inconsistency between "perceived competency and actual effectiveness" (p.114) that originated from data providers and ways of data collection; Gonsalvez et al. (2017) articulated differences among supervisory satisfaction, effectiveness, and competency and called for developing instruments that assess clinical supervision from various aspects of its practice and including perceptions from involved individuals, including supervisees. They developed The Supervision Evaluation and Supervisory Competences Scale (SE-SC) with their contention in mind; the SE-SC is for both the dyad to use to capture more information in a supervisory practice for better understanding of supervisor's competency.

Supervisory Relationship

Supervisee development and supervisor competency have become two important topics in the study of clinical supervision; the study of effective supervision has not stopped searching for other answers (Kavanagh et al., 2002). Although there are ample discussions about the characteristics of supervisors, such as competency, pedagogical practice, and supervision models, researchers have identified the decisive influence of optimal supervisory relationship on a successful supervision and the professional development of supervisees (Deihl, 2009; Ellis & Ladany, 1997; Watkins, 2018, 2018; Watkins & Scaturo, 2013). Supervisory relationship, rather than supervisor competency or theoretical practice, has earned support from many researchers and mental health professionals for its positive influence on CITs becoming mental health professionals (Goodyear, 2014; Holloway & Neufeldt, 1995; Inman et al., 2014; Watkins, 2014). The supervisory relationship is "medium and message" (Watkins & Scaturo, 2013, p. 85) that encourages professional growth of supervisees. Ellis (2010) asserted that positive supervisory relationship reduced the anxiety of supervisees. Supervisees are more willing to accept and comply with any pedagogical strategies used in the supervisory process when the quality of supervisory relationship is able to mitigate their anxiety in supervision (Ellis, 2010). Ellis (2010) further concluded that the supervisory working alliance is the focus when discussing supervisory relationship, which is the dominant indicator of satisfactory supervisory relationship. On the other hand, Ladany et al. (1999) contended that positive supervisory relationship is the preventive factor in averting negative factors that imped supervisees' professional development. When supervisees

are shielded by positive supervisory relationship, supervisees are more motivated to overcome their perceived failures and persist in their growth of professionalism (Ladany et al., 1999).

Clinical supervisory relationship is complex and may result in negative practice and undesired outcomes (Ellis et al., 2014). Bernard and Goodyear (2014) pointed out the existence of the power structure in a supervisory relationship where the supervisor is in higher position in the supervisory hierarchy. In a supervisor-supervisee relationship, supervisors serve as the evaluator and hold a higher power than their supervisees (Bernard & Goodyear, 2014). While supervisors focus on the developmental process of supervisees, they are held accountable for evaluating a supervisee (Ellis, 2010; Falender, Shafranske, & Falicov, 2014). The powerful position of evaluator and the accompanying authority to determine a supervisee's entrance to the counseling profession becomes the duty of gatekeeping (American Counseling Association [ACA], 2014; Barnett & Molzon, 2014; Ellis, 2010). The ACA ethical codes clearly place a heavy responsibility on supervisors to be in charge of supervisees' evaluation, remediation, and endorsement of supervisees' professional career (ACA, 2014). While a strong supervisory relationship will be able to reduce the anxiety towards supervisor's power and supervision process, a number of studies turned to the investigation of unsuccessful supervisory relationship that carries a potential to negatively impact supervisees and their clients (Ellis et al., 2014). Thus, while the counseling profession shows an increase of interest in supervisor competency and training, it is necessary to include the topic of supervisory relationship in the research effort for effective supervision.

Practicum and internship are considered the premier clinical training for CITs (Akos & Scarborough, 2004, Goodyear & Bernard, 1998; Hoffman, 2001). Practicum and internship deliver real-world clinical experiences before counseling students complete their training and head to employment and credentialing (Holcomb-McCoy & Johnston, 2008). This clinical experience is a critical component in counselor training, and it enhances the processing and integration of previously learned knowledge and skills (Akos & Scarborough, 2004; Hoffman, 2001). Detailed criteria for practicum and internship were detailed in the Professional Practice section of CACREP standards (CACREP, 2016), which indicates the importance of such training that supports the need in diversity training for students. In order to better train counseling students, this clinical experience of practicum and internship has to be effective and provide essential experience for students' professional development (Akos & Scarborough, 2004; Besler et al., 2018).

Practicum and internship have become a required training process for CACREP-accredited counseling programs. In addition to training curricula, the CACREP standards list practicum and internship in section 3, Professional Practice (CACREP, 2016, pp. 14-16), where CACREP described the criteria and requirements of settings and supervision during the clinical practice process. In the Professional Practice section, CACREP standards (2016) indicate that practicum and internship aim to prepare counseling trainees to learn "application of theory" and "development of counseling skills" when they practice under clinical supervision (p. 14). A clear definition of supervisor qualification is included in CACREP standards (2016) where tasks and roles of university

supervisors and site-supervisors are portrayed. Such careful design in the standards were supported by many counselor educators and scholars for the importance of the roles that practicum and internship play in counselor training (Crespi, 2002 Hoffman, 2001; Jackson et al., 2002;). Jackson et al. (2002) considered practicum and internship as the first step that CITs take into the professional world; Hoffman (2001) thought it as the most critical stage of the entire training process; and Crespi (2002) believed in the significant educational and professional worthiness and promoted for an extended clinical experience for school counselors-in-training. Clinical practice opportunities provided through practicum and internship furthered counselor preparation before their graduation. Both practicum and internship require clinical supervision provided by site and faculty supervisors (CACREP, 2016). With the safeguard of supervisors on campus and on-site, students are exposed to possible difficulties and challenges in the real counseling practice (Besler et al., 2018). The clinical supervision in practicum and internship fundamentally accelerates counselor development processes through the forging of competency through enhanced counseling self-efficacy (Besler et al., 2018).

Self-Efficacy

Self-efficacy has been defined as “people's beliefs about their capabilities to produce designated levels of performance” (Bandura, 1994, p. 1). Self-efficacy describes the expectation of individuals in relation to their behavioral outcomes within interested domains, and individuals’ emotion and commitment to grow in a specific domain greatly depend on the influences of perceived level of self-efficacy in the focused aspect, especially when behavioral outcomes are not consistent with original expectation

(Bandura, 1994; Barnes, 2004; Cashwell & Dooley, 2001). Self-efficacy affects individuals' choices during difficult time such as processing the interpretation of setbacks, emotional reactions to setbacks, and choices of behavioral responses to a pivotal moment (Badura, 1994). Additionally, individuals with high self-efficacy will not internalize failures; instead, they are more likely to problem-solving as they perceive setbacks are recoverable after additional physical and/or cognitive investments to acquire necessary skills or knowledge. Bandura believed high level of self-efficacy can empower individual's mental capacity and reduce emotional threats. Bandura (1994) also indicated that self-efficacy is achieved and can be enhanced through four sources: mastery experiences, vicarious experiences from observed others, social persuasion, and modify individual's emotional and behavioral patterns when reacting to challenging situations.

CITs' Self-Efficacy in Practicum and Internship

Practicum and internship mark the critical steps for CITs' clinical advancement (Akos & Scarborough, 2004; Goodyear & Bernard, 1998; Hoffman, 2001) and add the real-world clinical experiences prior to the graduation of CITs and their employment and credentialing (Holcomb-McCoy & Johnston, 2008). During this critical component of counselor training, the essential clinical experiences are learned and enhance the processing and integration of previously learned knowledge and skills (Akos & Scarborough, 2004; Hoffman, 2001). Gibson et al. (2010) conducted qualitative research of grounded theory to construct a model of professional counselor identity development. The research study involved 43 CITs from school counseling and marriage, family, and couples counseling (MFC) programs. CITs participated in seven focus groups through

their practicum and internship time. The researchers reported that CITs continuously and restlessly worked on professional development during the practicum or internship work.

Self-efficacy in counselor education has been applied to the study of self-efficacy in how confident CITs are when practicing counseling (Cashwell & Dooley, 2001). Furthermore, Barnes (2004) viewed CITs' self-efficacy as a "subjective assessment of competency in counseling" (p. 56). Tang et al. (2004) reported positive correlation between CITs' counseling self-efficacy and completed course work and hours of internship. Additionally, Mullen et al. (2015) conducted a longitudinal study that collected data in three different development points of CITs: the new student orientation, clinical practicum orientation and the finally the internship group supervision meetings. The study included a cohort of 179 counseling students throughout the entire course of their counselor training. The research found that CITs consistently developed counseling self-efficacy from the beginning of the program study until the end of internship. However, there are significant increases of self-efficacy at stages from the new student orientation to clinical practicum orientation, from new student orientation to the final internship group supervision meeting, and from clinical practicum orientation to the final internship group supervision meeting. Kozina et al. (2010) attempted to explore how counseling self-efficacy developed in relation of time. They applied repeated measure design and collected several data points throughout their study. The study found significant improvement on the micro skills subscale of COSE but no other subscales, although improvement trends were presented on process, difficult, and cultural subscales. The literature supports the notion that CITs make consistent and continual progress in

counselor training with the increase of both professional development and self-efficacy (Gibson et al., 2010; Mullen et al., 2015).

The clinical experience and practice provided through practicum and internship widens the scope for CITs. It was observable that the level of competency and counseling self-efficacy have gained a critical improvement towards the expectations of professional counseling (Besler et al., 2018). Witnessing the amplified discussion about this phenomenon, Stoltenberg (2005) believes clinical supervision is also essential to facilitate such an achievement. During students' clinical experience, clinical supervision forms a relationship that supports and encourages students' developmental process in many ways, like relieving their stress, normalizing their new experience, and peer learning (Besler et al., 2018). Supervision models also depict strategies and processes that lead to students' development of competency (Rigazio-DiGilio, 1994). In another study, Woodside et al. (2007) conducted qualitative research to learn about experiences of CITs during their practicum. They reported that CITs struggled through self-doubt and eventually realized their growth in counseling self-efficacy through the use of knowledge and skills learned in their training process. Cashwell and Dooley (2001) studied CIT's self-efficacy development in relation to clinical supervision and chose Counseling Self-Estimate Inventory (COSE) to operationalize counseling self-efficacy and found a significant impact of clinical supervision on the development of counseling self-efficacy.

Researchers have repeatedly emphasized that inadequate supervision cannot support counseling self-efficacy of school counselors (Duncan et al., 2014). Tang (2020) contended that clinical supervision is an effective intervention in enhancing school

counselors' counseling self-efficacy for implementing a comprehensive school counseling program since such programming is considered best practice in school counseling. It was evident that CITs develop and enhance their counseling self-efficacy through experiential learning and support of their clinical supervisors (Belser et al., 2018; Cashwell & Dooley, 2001).

Summary

This chapter has introduced the critical impact of clinical supervision to counselor development and the thriving of the counseling profession. Such an elaboration sets the groundwork for the further exploration about how perceived supervisor's competency influences self-efficacy of counselors-in-training. In this literature review, the development of clinical supervision was explored. Additionally, the development of clinical supervisors, including the knowledge and skills, competencies, professional organization guidelines, were explained. The function of clinical supervision in relation to CITs development, knowledge, skills, and professional identity, was lineated. Due to the different professional responsibilities between the clinical mental health counselor and school counselor, the researcher synthesized arguments for school counselors to demonstrate their clinical competency and strengthen their practice in providing clinical services to K-12 students. The following chapter will include information on the research design and related information to explore the very issue of perceived supervisor competency in relation to counseling self-efficacy of CITs.

CHAPTER III

Methodology

In this section, the research method and design will be discussed. The introduction includes the eligibility of participants and the process of recruitment. A critical component of this section is to discuss the selection of instruments. The quality of instruments and their psychometrics are presented to justify the adoption of these instruments. The discussion of research method will continue with the research procedures that highlight the steps and process used to conduct this study. The method section will also include a discussion of the research questions and statistical analyses.

Participants

This study was designed to investigate supervisee's counseling self-efficacy and its relationships with CITs' perceived supervisor competency, supervisory relationship, track of study, and total direct client/student contact hours among counseling students in both clinical mental health and school counseling. The eligibility of participants included master's level clinical mental health or school counseling students who are enrolled in practicum or internship class. The participants were recruited via online survey through Qualtrics and paper-and-pencil survey on campuses. Online survey was disseminated through the listserv of counselor educators (CESNet-l) and the emails to a list of directors in CACREP-accredited programs. Both procedures were approved by the Institutional Review Board (IRB), and the names of directors were obtained from the information published on program webpages. The use of CESNet-L was also approved by the listserv administrator. The online survey link was sent to listserv and emailed to program

directors to ask for assistance by sending this link to their practicum and internship students. The university IRB also approved the use of paper-and pencil survey in order to recruit enough participants. Several counselor educators agreed to send the paper-and-pencil survey to practicum and internship students on their campuses. A total of 49 participants agreed to participate and successfully complete the survey.

Instruments

There are several instruments selected for collecting data in this study including COSE to assess the CITs development of counseling self-efficacy, S-SRQ for measuring supervisory relationship, and PSDS-S to measure CITs' perceived supervisor competency of their clinical supervisor. These instruments will be discussed in the following section about their formats and psychometric merits.

Counseling Self-Estimate Inventory (COSE)

The Counseling Self-Estimate Inventory (COSE) was developed by Larson et al. (1992). The COSE is designed to assess the self-efficacy of novice counselors and trainees as well as the confidence of using micro skills. After the inception of COSE, many studies had been conducted by the development team to refine this instrument. The length of COSE was expanded from its original version of 14 items to 67 items, but its current and finalized edition contains 37 items with six-point Likert type scale. The scale ranges from the strongly disagree (1) to strongly agree (6). Through a Factor Analysis, the COSE was reported to measure the self-efficacy consisting of five skill domains: (a) use of micro skills (12 items); (b) attending to counseling process (10 items); (c) dealing with difficult client behaviors (7 items); (d) behaving in a culturally competent manner (4

items); and (e) being aware of one's values (4 items) (Larson et al., 1992). The higher scores indicate greater counseling self-efficacy and confidence. Positive psychometrics were reported on a .93 of internal consistency reliability coefficient on the full scale, .87 on the test-retest reliability coefficient (Larson et al., 1992). The convergent validity was evidenced by its high correlation with the Problem-Solving Inventory which assesses individual's problem-solving behaviors and capacity and Tennessee Self Concept Scale that assesses self-concepts; the divergent validity with a low correlation with Social Desirability Scale, Self-criticism Scale, GRE, undergrad GPA, and Myers-Briggs Type Indicator. Based on previous literature, the COSE appears to be a reliable instrument for this study.

CITs' self-efficacy was researched among several studies and included accountability/effectiveness of counselor training/education (Larson et al., 1992; Lent et al., 2003) and issues related to clinical supervision (Cashwell & Dooley, 2001). COSE was one of earliest measures that operationalize counseling self-efficacy. Kozina et al. (2010) claimed two strong instruments measuring counseling self-efficacy which included Counselor Activity Self-Efficacy Scale (CASES) and COSE. Larson and Daniels (1998) finally decided on COSE for their study because of its psychometric properties and items that reflect the theoretical concept of self-efficacy. The quality of COSE was further evidenced by becoming a widely used measure for counseling self-efficacy (Larson & Daniels, 1998). The support of COSE appears to increase (Kozina et al., 2010) despite its early development in 1992. Thus, COSE will be used to

operationalize CITs' rating of their counseling self-efficacy and be the criterion variable for testing the counselor self-efficacy model.

Short Version of Supervisory Relationship Questionnaire (S-SRQ)

S-SRQ was another instrument used in this study. The Original version of SRQ was developed in 2010 by Palomo et al. (2010). The foundation of the SRQ was the Beinart's model (2004) of supervisory working alliance, which highlighted boundaries, trust, support, respect, commitment, and sensitivities to the needs of supervisee for effective collaboration. Palomo et al. (2010) conducted qualitative research to enrich the Beinart's model and tested the model empirically. Survey items were created and included 111 items for the initial validation study and then a final amount of sixty-seven items remained in the final version of SRQ. Strong psychometrics were reported, including construct validity, convergent validity, divergent validity, predictive validity, and face validity along with a test-retest reliability. The internal consistency and test-retest reliability were conducted to demonstrate the reliability quality. The results of the study found Cronbach's alpha of .98. Additionally, test-retest reliability was .97 with average of 29.6 days interval. Divergent validity was conducted by computing correlations between the global scale and each of its subscale, and no significance was found. Predictive validity was computed for its correlation with the supervision outcome that was operationalized with the Indices of Supervision (IoS) outcome. As a result, SRQ score was able to account for 83% variance of supervision outcome.

Despite the reputable quality of SRQ, Cliffe et al. (2014) argued that the SRQ with 67 items may be too long and have impeded its adaptation in supervisor training and

research practice. Thus, there was a study conducted that included a shorten version of SRQ. Cliffe et al. (2014) replicated Palomo's validation study for S-SRQ, which eventually included 18 items with the following psychometrics. The reliability coefficient was .96 and test-retest reliability was .94 with two to four-week interval. Convergent validity was demonstrated by the strong correlations with Working Alliance Inventory- Trainee (WAI-T, r = .92), SRQ (r = .95), and strong negative correlation with the Conflict subscale (r = -.68) and Ambiguity subscale (r = -.73) of the Role Ambiguity Inventory (RCRA). Divergent validity included an insignificant correlation with Short-scale Eysenck Personality Questionnaire Revised (EPQ-R). Predictive validity was also present with predicting 85% variance of Supervisory Satisfaction Questionnaire (SSQ) and 77% variance measured by Indices of Supervision Outcome (IoS).

Psychotherapy Supervisor Development Scale (PSDS)

PSDS was designed for supervisors-in-training to monitor their own development of supervisory self-efficacy with strong psychometrics. In the past few decades, previous research of clinical supervisor's development has found that supervisor's professional growth is developmental. Prior literature shows that supervisors develop and enhance supervisory practice through enriched knowledge and practical experiences (Barker & Hunsley, 2013; Hess, 1987; Stoltenberg et al., 1994). Watkins (1990) had contributed to the dialogue and developed Supervisor Complexity Model (SCM) in 1990. Watkins proposed a four-stage model to depict the developmental process of supervisor competency (Watkins, 1990). The four stages include:

1. Role Shock that featured with identity confusion and struggling with boundary set-up in supervisory environment;
2. Role Recovery that featured with more realistic understanding of what it means to be a supervisor;
3. Role Consolidation that is the perception of sincere dedication to supervisee's growth and conceive themselves with adequate experience and knowledge to function as a supervisor;
4. Role Mastery that features high confidence, strong competency, and consistent effectiveness in supervision practice.

Due to the lack of empirical evidence to support conceptualization of supervision issues, Watkins et al. (1995) developed the Psychotherapy Supervisor Development Scale (PSDS) to collect data and provide empirical evidence to answer calls from critics on lack of empirical evidence in the published studies of supervisor development, and providing evidence to support and validate the SCM. The PSDS contains an 18 seven-point Likert type scale items (i.e., 1 indicating never and 7 indicating always consistent with the statement). The measure is designed for supervisors to self-report the rating on these items. The total score indicates the levels of supervisory self-efficacy. For the original validation study of the PSDS, Watkins et al. (1995) recruited 335 expert supervisors who were members of American Psychological Association's Division of Psychotherapy. The study found Cronbach's Alpha .93 on the internal consistency of reliability and the construct validity via its factor analysis demonstrated a four-factor model of

Competence/effectiveness, Identity/commitment, Self-awareness, and Sincerity in supervisory role.

Baker et al. (2002) conducted a study that compared the supervisor competency between two groups of supervisor-in-training, a group of 12 doctoral students taking a 15-week supervision practicum and a group of seven doctoral students prior to taking supervision practicum. The PSDS was utilized as the measure in this study. The study confirmed that PSDS is sensitive to supervisor's growth in training when trained supervisors could score higher on PSDS. Barnes and Moon (2006) initially questioned the use of PSDS with counseling supervisors due to the sampling of only American Psychological Association (APA) psychotherapists in the original validation study. Barnes and Moon (2006) argued that the philosophical difference between counseling and APA psychotherapy. More specifically, counseling posits a developmental model and is preventive in nature when APA psychotherapy embraces medical model and inclines to provide reactive intervention to individuals' problems; these discrepancies might result in different process of supervisor development. Barnes and Moon (2006) collected data from counseling supervisors to answer their arguments which provided support to the application of PSDS in counseling supervisors. Researchers found that a consistent developmental process exists for supervisors of counselors and psychotherapists. The PSDS is considered to be appropriate and will be modified for this study.

Conversion of Psychotherapy Supervisor Development Scale (PSDS)

Efstation et al. (1990) asserted the needs of an instrument that to provide insight into supervisees' perception of supervisor competency. This research modified an existing instrument to meet the needs of this study design and assessed supervisor competency from the lens of supervisees. The current study modified the Psychotherapy Supervisor Development Scale (PSDS), to collect information of supervisor's supervisor competency from supervisee's perspective. With the converted PSDS, additional information from the clinical supervision dyad were collected. Thus, the voice of supervisees were heard in clinical supervision and clinical supervisors can receive objective, critical input from their supervisee to calibrate their supervision practice, which could lead to enhanced clinical supervision outcomes.

Procedures of the Conversion of PSDS

Instead of requiring supervisors to evaluate their own supervisor competency, the converted PSDS aims to have counseling students rate their perception of their clinical supervisor's supervisor competency. The language of items included in PSDS are modified to supervisees perceptions regarding their supervisor's supervisor competency. The item revisions were modified by a Licensed Professional Counselor-Supervisor (LPC-S), one Licensed Professional Counselor (LPC), and two intern-psychologists. Three focus groups were conducted with four panel members: the first group with two counselors (an LPC and an LPC-S), the second group with the two intern-psychologists, and the last group with all four panel members. The survey items were reworded after the first two focus groups. The four members of the expert-panel met in the final group

to review and verify the reworded items. This revision was sent for review and revision by two counselor educators in Minnesota before finalizing the converted PSDS (Appendix B). The two counselor educators were a licensed professional clinical counselor-supervisor (LPCC-S) and a licensed school counselor (LSC) in Minnesota. The school counselor also holds a professional educator license (PEL) in Illinois as a K-12 school counselor.

As a result, for example, the original item of *"I consider the supervision that I provided to be helpful to my supervisee"* is modified to *"My supervisor provides helpful supervision to me*." This modification retains the structure and conceptual framework of the original PSDS and provides supervisees with the opportunity to rate their perceived supervisory competencies of their clinical supervisors.

Demographic Questionnaire

A demographic questionnaire (Appendix C) was designed to solicit information pertaining to the purpose of the current research from participants and to properly report the characteristics of the sample. Information gathered from this questionnaire included the following (a); participants' gender; (b) ethnicity; (c) age; (d) track of study (school counseling or clinical mental health); (e) level of study (Practicum or internship); (f) total number of direct client/student contact hours; (g) supervision hours; (h) number of supervision sessions with current clinic supervisor; (i) and information related to their supervisors, such as supervision credential, ethnicity, gender.

Research Question

How much variance of counseling self-efficacy is accounted by total direct client/student contact hours, supervisory relationship, track of study, and CITs perceived supervisor competency?

$\hat{y} = \beta_0 + \beta_1 x_1 + \beta_2 x_2 + \ldots + \beta_k x_k$

($\hat{y}$: The estimated counseling self-efficacy; β_0: The constant of the regression equation; β_k: a coefficient of a predictor; x_k: The value of a predictor variable)

Null Hypothesis:

There is no significant variance in counseling self-efficacy accounted for by total direct client/student contact hours, track of study, supervisory relationship, and CITs perceived supervisor competency of their clinical supervisor.

$H_0: \beta_k = 0$

Alternative Hypothesis:

There is a statistically significant amount of variance in counseling self-efficacy accounted for by total direct client/student contact hours, track of study, supervisory relationship, and CITs perceived supervisor competency of their clinical supervisor.

$H_A: \beta_k \neq 0$

Sample Size

In order to collect adequate sample size for meaningful and generalizable results, some concepts that relate to the decision making are necessary to be considered. The conditions of Alpha level or significance criterion, statistical power, effect size (ES), and

the sample size will be included in the research findings. Alpha level is used to avoid committing the Type I error, which wrongfully rejects the Null hypothesis (Cohen, 2013; Pedhazur & Schmelkin, 2013). Statistical power is the "probability that it will lead to the rejection of the Null hypothesis" (Cohen, 2013, p. 4). Statistical power is the function of Beta, which minimizes the occurrence of the Type II error and the Type II error indicates "failure to reject the Null hypothesis when it should be rejected" (Pedhazur & Schmelkin, 2013, p. 206). However, Cohen (2013) contended that large statistical power greater than .9 can lead to large sample sizes. When seeking a balance between the sample size and statistical power, it was proposed that researchers could maintain statistical power of .8 as a "desired power value" (Cohen, 2013, p. 56). Effect size (ES) is not a dichotomous indicator like hypothesis testing, rather it is the "degree to which the phenomenon is present in the population" (Cohen, 2013, p. 9). The ES describes the differences between means in a standardized score (Aiken & West, 1991). Cohen (2013) recommended the numbers of .2 as small, .5 as medium, and .8 as large for effect size.

Understanding the importance of sample size in the determination of meaningful analysis and research result, it is important to establish the criteria for alpha level, statistical power and ES. The sample size in this study is calculated using a priori power analysis with G*Power analysis (Faul et al., 2009). Following the suggestion of statistical power by Cohen (2013), the significance criterion alpha is set at .05, statistical power .80. The medium ES is used in the computation of an adequate sample size. The result suggests that the sample size of 30 is necessary for a multiple regression statistical procedure with four predictors to meet the desired statistical power (Appendix D). A

data set with at least 30 participants is set as a minimum for the sample size prior to the start of this research.

Statistical Procedure

This research question involved a continuous criterion variable, counseling self-efficacy assessed with COSE, and four predictors, including track of program, direct client/student contact hours, supervisory relationships (S-SRQ), and the converted PSDS that captures CIT's perceived supervisor competency of their clinic supervisors. Participants were expected to spend about 30 minutes to complete these instruments and questionnaire. After completion of data collection, the data were analyzed through the IBM Statistical Package for Social Sciences (IBM SPSS version 29 (IBM, 2022). The aim of the statistical analyses was to find the amount of the criterion variable variance that was accounted for by the four predictors. Multiple regression is known for its merits of simultaneously analyzing relationships between an outcome variable (dependent variable) and multiple criterion variables (predictors). It also can be used to explain or predict the outcome variable from its relationships with included criterion variables (Pedhazur & Schmelkin, 2013). Thus, multiple regression procedures were suitable for the purpose of this study and provided the answer to the research question. Multiple regression procedures require all included variables to be continuous. Categorical/nominal predicator (track of study) were dummy coded, school counseling track will be coded as 0 while the mental health track as 1, for the chosen statistical procedure.

Research Procedures

As requirements set by the Institutional Review Board (IRB) of Minnesota State University at Mankato, professional training with CITI was completed prior to conducting human subject research. An IRB application of this study, along with recruitment documents, were submitted to the board for review and approval. A quantitative research methodology was selected for its ability in data collection and analysis to answer the research question. A Qualtrics survey that was approved by the university IRB were used to collect data. All IRB approved documents, such as informed consent, demographic sheet, converted PSDS, S-SRQ, and COSE, were created on this online platform for data collection. Before potential participants provided their responses, they were presented with the informed consent, which facilitated participant's understanding of their rights in the research process, especially the voluntary participation and anonymous nature of personal data.

After the IRB approved this research project, the research started with recruitment of participants. To attain a Nationally diverse sample, at least one CACREP-accredited Counselor Education program was selected from each state for recruitment. Clinical Mental Health and School Counseling coordinators of selected Counselor Education programs were contacted to solicit their assistance in recruiting participants. After the completion of the contact list, the link to the Qualtrics survey of this study were included in email contacts to ask for coordinators' assistance to inform their eligible students about participating in this study.

After the initial email contact, two follow-up email contacts with seven-day intervals were planned for enhancing the outcome of data collection. After a round of data collection, a sample was collected; however, the sample size was not sufficient and less than the estimated from a priori power analysis. Due to the nature of low return rate on electronic survey (Dillman, Phelps, et al., 2009), the use of Tailored Design Method (Dillman et al., 2009; Pedhazur & Schmelkin, 2013) was adopted as supplemental methods of online recruitment. Dillman et al. (2009) explained six situations that data collection methods are to be modified, including questionnaire, individual questions, additional materials, contact style, incentives, and sample size. A modified IRB with a change of contact style, adding paper and pencil, for data collecting method was submitted for approval. After receiving the approval, a second round of data collection was executed in an attempt to satisfy and meet the estimated sample size with desirable statistical power of 0.80.

Summary

The section provided detailed information regarding the methodology of this study. This included the research design, eligibility of participants, counselor education program, and protocol of the study. This section also included decisions about the sample size and instrument selection. Finally, the research question and analytical approaches were also discussed. The analytical results will be presented in the next section.

CHAPTER IV

Results

This study was designed to research the research question: "how much variance of counseling self-efficacy is accounted by predictors of total direct client/student contact hours, supervisory relationship, track of study, and CITs perceived supervisor competency?" In this chapter, descriptions of participants, the sample, and the results of regression and essential statistical characteristics are reported and displayed in tables and figures. The purpose of this study aimed to explore the factors of counseling self-efficacy and the relationship between CITs' perceived supervisor competency and their development of counseling self-efficacy.

In order to collect data for this study, a survey was conducted which included several pre-selected self-report instruments including COSE, S-SRQ, PSDS-S, and demographics questionnaire which tracked the study and direct client contact hours. Once the data was collected, the data was analyzed through IBM SPSS Statistics for Windows version 29 (IBM, 2022). The purpose was to generate outcomes to answer the research question which included how much variance of CITs' development of counseling self-efficacy measured by COSE is accounted by a regression model including predictors of track of study, Direct contact hours, CITs' perceives supervision competency of their supervisor assessed by PSDS-S, and supervisory relationship operationalized by S-SRQ.

In the data analysis of the study, missing data were substituted with a mean of their respective variable. Outliers of the study were defined as two (2) standard deviation

from the mean. Scores that met the definition of outliers were excluded from further analysis. As a result, three scores of the Direct contact hours met the definition and these three cases were excluded from further analysis. Basic descriptive statistics were also discussed and included the mean (*M*) and standard deviation (*SD*).

Description of the Sample

A power analysis was conducted with G*Power (version 3.1.9.4) before the study to estimate the required sample size for this study. The power analysis result indicated that a sample size of N=30 was determined by G*Power as the minimal requirement of sample size for the execution of the research process. A-priori power analysis was based on parameters of alpha (α=.05), and a medium effect size set at .8. The final sample consisted of 49 participants and the sample size exceeded the G*Power estimation. This sample size included the removal of outliers based on the scores from the Direct contact hour variable, and the removal of outliers resulted in the exclusion of three cases from statistical analysis. The final sample size was 49 participants. The majority of participants were from Minnesota (51%) and Alabama (34.6%). The sample included eight participants (16.3%) from School Counseling track and forty-one (83.7%) from Clinical Mental Health Counseling track. Among the participants, there were more participants enrolled in a practicum class (75.5%) than in an internship class (24.5 %). In addition, forty-six participants (93.9%) reported receiving weekly supervision, two participants (4.1%) without weekly supervision, and one participant (2.0%) providing no answer to this question.

Regarding the accreditation status of participants' programs, there were forty-eight participants (98.0%) that were part of a CACREP-accredited program. Participants were also asked to identify their ethnicity. Thirty-three (67.3%) of the participants identify as Caucasian, 18.4% as African American, 8.2% as multi-racial ethnicity, 4.1% as Asian American, and 2.0% as no answer. The gender identity of participants was reported with 67.3% as female, 16.3% as male, 4.1% as cisgender-male, 6.1% as cisgender-female, 2.0% as Gender MOH, and 4.1% as no answer. The survey also asked the participants to identify their sexual identity. Of the sample, 87.8% reported as straight/heterosexual orientation, 4.1% as bisexual orientation, 6.1% as other/not answering, and 2.0% did not respond to this inquiry. Table 1 displays the demographic information of participants. Table 2 contains descriptive information of the sample which includes age, Direct contact hours, and supervision hours. The range of participants' ages are from 23 to 57 with a (M = 29.67, SD = 8.33). With the participants' reported Direct contact hours, the range of hours was from 21 to 300 with a (M= 110.99, SD = 76.18). Participants supervision hours ranged from 1 to 533 (M = 39.32, SD = 87.72.

Table 1

Demographic Description of Ethnicity, Gender, and Sexual Identity

		N	Percentage
Ethnicity			
	African American	9	18.4%
	Asian American	2	4.1%
	Caucasian	33	67.3%
	Multi-racial	4	8.2%
	Prefer not to respond	1	2.0%
Gender			
	Female	33	67.3%
	Male	8	16.3%
	Cisgender-female	3	6.1%
	Cisgender-male	2	4.1%
	Gender MOH	1	2.0%
	Chose not to answer	2	4.1%
Sexuality			
	Straight/heterosexual	43	87.8%
	Bisexual	2	4.1%
	Prefer not to respond	3	6.1%
	No answer	1	2.0%

Table 2

Descriptive Information of Age, and Contact and Supervision Hours

	Mean	Standard Deviation	Range
Age	29.67	8.33	23-57
Direct contact hours	110.99	76.18	21-300
Supervision hours	39.72	87.72	1-533

Variables

The study aimed to use a holistic perspective to assess the development of counseling self-efficacy of CITs. Therefore, the criterion variable of this study was the counseling self-efficacy of CITs. Four predictors were included in this study and tested for contribution in explaining the counseling self-efficacy of CITs. The four predictors chosen for the study include total direct client/student contact hours, the supervisory relationship, the program track of CITs, and the perceived supervisor competency by CITs.

Criterion Variable: Counseling self-efficacy of CITs

The criterion variable of counseling self-efficacy of CITs, was assessed with the Counseling Self-Estimate Inventory (COSE). The COSE was inspired by the construct of self-efficacy from the social cognitive theory of Bandura (Kozina et al., 2010; Larson & Daniel, 1998). The COSE consisted of 37 items to assess five skill domains. The COSE strong psychometric properties and the theoretical framework made this one of the most

used instruments in studying counseling self-efficacy (Larson & Daniel, 1998). Larson et. al (1992) reported the Cronbach's alpha (α=.93) for the internal consistency reliability coefficient on the full scale and *r* = .87 for the test-retest reliability coefficient. The internal consistency reliability coefficient of COSE for the sample of this study was Cronbach's alpha (α=.972).

Predictors

Four predictor variables were used in this study including the total direct client/student contact hours, the supervisory relationship, the program track of CITs, and perceived supervisor competency by CITs. The program track (school counseling and clinical mental health counseling) of CITs and the Direct contact hours were self-reported information. The program track is a categorical variable and the Direct contact hours is a continuous variable. The multiple regression analytical procedure is a continuous variable, the program track was dummy coded, school track was coded as 1 and clinical mental health counseling track was coded as 0.

The supervisory relationship and the perceived supervisor competency were assessed with PSDS-S. The supervisory relationship was assessed with the S-SRQ. The S-SRQ was published by Cliffe et al. (2014) as a shortened version of SRQ developed by Palomo et al. (2010). The S-SRQ included 18 items to assess supervisory relationship with similar psychometrics of the SRQ. The Cronbach's alpha (α=.96) was reported for the internal consistency of S-SRQ and *r*= .94 for the test-retest reliability coefficient with two-to-four-week interval. The internal consistency of the S-SRQ for the sample of this study was .97.

The perceived supervisor's competency variable was assessed with the PSDS-S. The PSDS-S was the modified PSDS developed by Watkins (1995). The author modified PSDS into PSDS-S, and PSDS-S mirrored the PSDS and asked questions from the perspectives of CITs. The internal consistency of the PSDS-S was calculated with Cronbach's alpha (α=.79).

Assessment of Assumptions

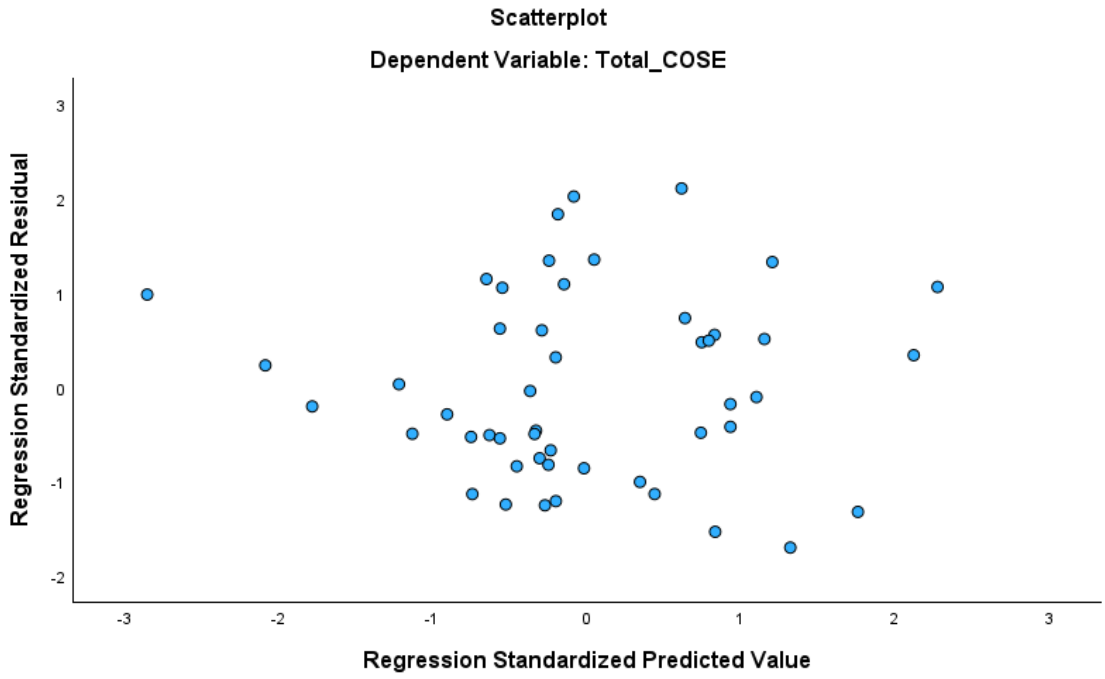
Osborn and Waters (2019) contended that multiple regression analysis is robust in sustaining the violation of assumptions. However, researchers also suggested major assumptions should become necessary steps to assess for violations. For example, the assumptions may include (a) Normality; (b) Linearity; (c) Reliability of measures; and (d) Assumption of multicollinearity. In the following paragraphs, each assumption would be examined in this study.

Assessment of normality assumption

Several measures were found to assess the assumption of normality in the literature (Osborn & Waters, 2019). In this study, the scatter plot and P-Plot were used to assess the normality assumption. The scatter plot was displayed in Figure A.

Figure A

Scatterplot of COSE



The scatter plot was conducted for the regression standardized residual and the predicted value. Figure A shows that scores were randomly positioned, and no pattern or cluster was identified. The data approximated normal distribution via visual inspection of the P-Plot.

In addition, The P-P plot of the dependent variable, COSE and the standardized residuals were obtained and displayed in Figure B.

Figure B

P-P Plot of COSE

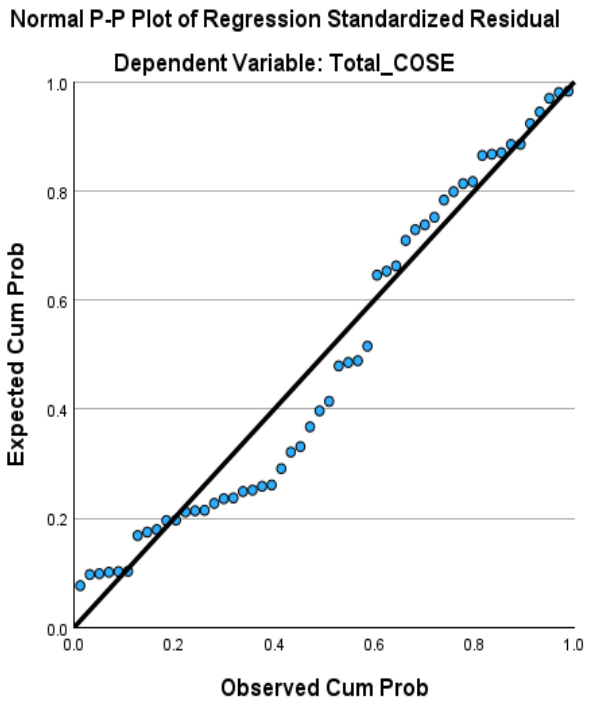


Figure B showed that the scores generally followed the diagonal line. This display of scores indicated that the assumptions of linearity, normality, and independent errors were not violated in this multiple regression analysis.

Linearity Assumption

A linear relationship is an important assumption for multiple regression (Osborn & Waters, 2019). Matrix graph and bi-variable correlation analysis were conducted to assess linearity assumption. The matrix graph was displayed in Figure C. The results from Bi-variable correlation analyses were presented in Table 3.

Figure C

Matrix Graph

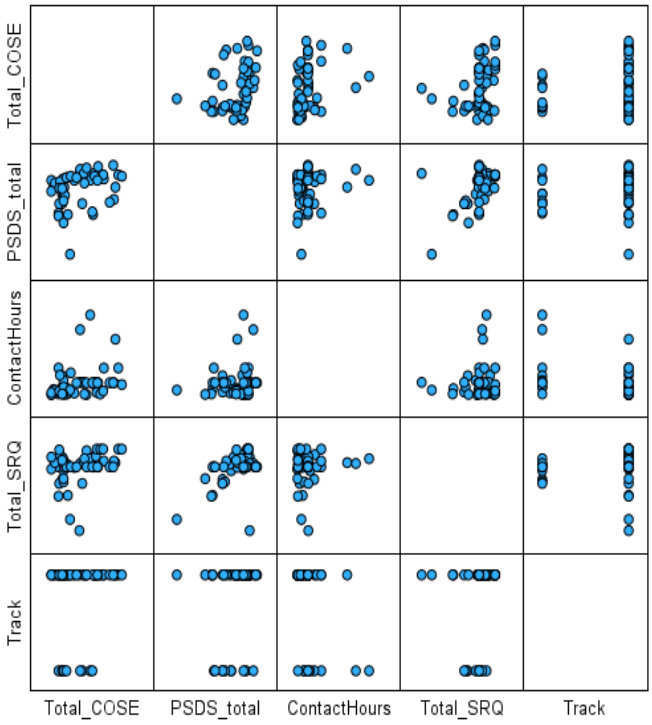


Table 3

Bi-Variate Correlation of Variables

	COSE	S-SRQ	PSDS-S	Contact hours	Track of study
COSE	1	0.264	0.326*	0.349*	0.216
S-SRQ		1	0.536**	0.081	0.105
PSDS-S			1	0.155	0.288*
Contact hours				1	-0.240
Track of study					1

As indicated by both the bi-variate correlation results and the Matrix graph, the track of study and the S-SRQ were significantly correlated with the dependent variable; therefore, both variables were excluded from further statistical procedure.

Assessment of Reliability Assumption

Osborn and Waters (2019) contended that the importance of reliable measure of variables was essential in multiple regression models in order to illustrate the relationships in the population. Researchers suggested that, with the careful selection of instruments to assess included variables, the reliability of selected instruments should be greater than .7 (Nunnally, 1978). In this study, there were three variables included in the final model testing. Among the three variables, the variable of the Direct contact hours was self-report from participants' factual conditions. There were instruments, COSE and PSDS-S, used to assess the other two variables that were included in the final model examination. The Cronback alpha internal consistency reliability of both instruments exceeded the criterion of .7 (COSE: α=.972; PSDS-S: α=.79).

Assessment Multicollinearity Assumption

Multicollinearity occurs when independent variables of a multiple regression model are highly correlated. The occurrence of multicollinearity threatens an objective interpretation on the unique contribution of a variable in a regression model. The Tolerance and Variable Inflation Factor (VIF) was used in this study to assess the multicollinearity assumption (see Table 4). The desirable criterion of tolerance should be greater than .2 (Menard, 2002) and less than 10 for VIF. The tolerance of the study was .994 with the VIF=1.006. Both measures were within the suggested values;

therefore, this outcome serves as evidence to indicate that the multicollinearity assumption was not violated.

Table 4

Coefficients of Regression analysis

	Unstandardized Coefficients		Standar-dized				
	B	Std. Error	Beta	t	Sig.	Tolerance	VIF
Constant	88.537	26.510		30340	0.002		
PSDS-S	0.653	0.284	0.301	2.297	0.26	0.994	1.006
Direct contact hours	.118	0.047	0.327	2.489	0.16	0.994	1.006

Results

Multiple regression is often used as a tool for exploring a relationship between criterion variables and a set of predictors (Cohen et al., 2002). This study utilized multiple regression to explore the relationship between the development of counseling self-efficacy among CITs and a set of predictor variables in order to research the amount of variance in counseling self-efficacy among CITs that can be explained by a set of variables. A standard multiple regression was used to answer the following research question: How much variance of counseling self-efficacy is accounted by predictors of total direct client/student contact hours, supervisory relationship, track of study, and CITs' perceived supervisor competency?

A series of bi-variate correlational analyses was conducted to assure the compliance of linearity assumption, which indicated the linear relationship between the criterion variable and a set of predictors (see Table 3). The results indicated significant relationships between total scores of PSDS-S (r = 0.326, p=0.010, see Figure D) and the total Direct contact hours (r = 0.310, p = 0.012, see Figure E) and the criterion variable (COSE).

Figure D

Correlation line: PSDS vs. COSE

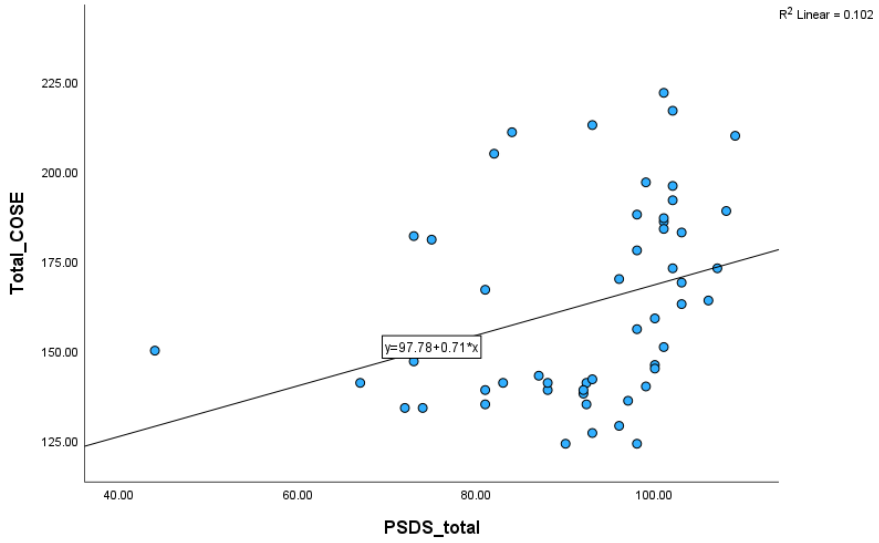
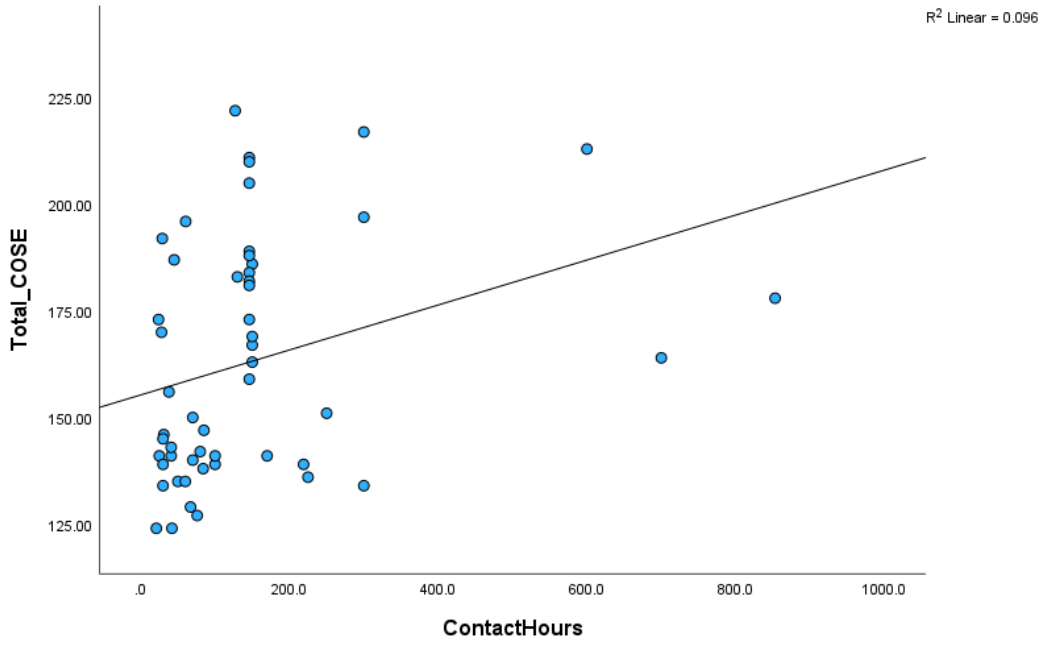


Figure E

Correlation line: Contact hours vs. COSE



There was a non-significant relationship between the track of study (r = .21, p = .13) and the supervisory relationship (r = .26, p = .06). Additionally, there was no evidence for concerns of collinearity as no correlation higher than .7 between the two final predictors (r = .155, p = .139).

The final regression model included the criterion variable of the counseling self-efficacy (COSE) and two predictors, the CITs' perceived supervisor competency (PSDS-S) and the total Direct contact hours. The analysis of Variance (ANOVA) was used to assess the significance of the model and the results were presented in Table 5. ANOVA results indicated a significant result of the model ($F(2,46) = 6.204$, p= 0.004).

Table 5

Result from ANOVA

Model	Sum of Square	df	F	Sig
Regression	7707.466	2	6.204	.004[b]
Residual	28575.636	46		
Total		48		

The standard multiple regression reported a R= 0.414 and R^2= 0.171 (Table 6). The model with two predictors was able to explain 17.1% of variance for the CITs' development of counseling self-efficacy.

Table 6

Multiple Regression Outcomes

Model	R	R^2	Adjusted R^2	Std. Error of the Estimate
Model 1*	0.461	.0.212	0.178	24.924

* Model 1 includes predictors of "Direct contact hours and PSDS-S

The co-efficient is presented in Table 7. The Unstandardized Beta (β) coefficient was .65 for the predictor of PSDS-S and .11 for the Direct contact hours. These values have been standardized for a comparison to become possible. The PSDS-S had a smaller standardized beta (β=.301) than Direct contact hours (β=.327). Therefore, the Direct contact hours were more influential to the overall development of counseling self-efficacy than PSDS-S. The Unstandardized Beta indicated how the change of one unit had an impact on the criterion variable. The Unstandardized Beta for the PSDS-S was

β=.65, which reflected that every one unit change in PSDS-S will affect .65 unit in the development of counseling self-efficacy of CITs. The Unstandardized Beta for Direct contact hours was 0.118 to indicate that a unit change in Direct contact hours will affect 0.118 unit change in the development of counseling Self-efficacy of CITs. The regression equation for the final model was: COSE=88.537 + (0.653(PSDS-S)) + (0.118(Direct contact hours)).

Table 7

Co-efficient

Co-efficient

	B	Standardized Beta	P Value
Constant	88.537		
PSDS-S	0.653	0.301	0.026
Direct contact hours	0.118	0.327	0.016

Effect Size

There is an increasing demand for researchers to report the effect sizes of their studies (Fidler et al., 2005). While the *p* value signals the statistical significance of a research result, the effect size indicates a practical significance of a study (Aiken & West, 1991). Cohen (2013) stated that effect size is the "degree to which the phenomenon is present in the population" (p. 9). Cohen (1992) recommended various types of effect size to be reported with different statistical procedures. The Cohen's f^2 was considered the appropriate indicator for the multiple regression analysis of this study (Cohen, 1992; Selya et al., 2012). According to Cohen (1988), the small, medium, and large effect sizes

can be reflected with f^2 = 0.02, 0.15, and 0.35 respectively. To calculate Cohen's f^2, its computation formula is $f^2 = \frac{R^2}{1-R^2}$. With this formula, the current study can report an effect size of f^2 = 0.269, which signals a medium effect size.

Conclusion

This chapter discussed the demographic information of the 49 participants after the exclusion of three outlier cases. The outlier cases met the outlier definition when their scores were two standard deviations away from the mean. Overall, a total of 49 participants were included in the multiple regression model analysis. The outcomes of the standardized multiple regression analysis were displayed and discussed based on the research question. The three instruments (the S-SRQ, COSE, and PSDS-S) that were used in the survey were discussed with their psychometrics, such as the reliability coefficients and Cronbach's alpha, to demonstrate the quality of research design and the selection of instruments. As a result, a regression model for CITs' development of counseling self-efficacy was established with two predictors, the Direct client/student contact hours and CITs' perceived supervisor competency of their clinical supervisor. Notably, the attempt of including supervisee's voice into the model is vital to understand supervisor competency, and it was included into the final regression model. Additionally, the PSDS-S that was created by the researcher to assess supervisee's perceived supervisor competency of their clinical supervisors has shown strong internal reliability. Overall, findings from this study provides additional information for a new

direction in educating and training of entry level counseling professionals and the new generation of clinical supervisors.

CHAPTER V

Discussion

Clinical supervision is a critical training component for counselor education programs and provisionally-licensed counselors in clinical mental health counseling (Bernard & Goodyear, 2014; Hartley et al., 2002; Magnuson et al., 2001). Researchers, such as DiMino and Risler (2012) and Watkins (2013), contended that clinical supervision is invaluable to the development of mental health professions and practitioners. With the inclusion of clinical supervision, the counselor education curriculum is able to progress in training and in supporting the professional development of CITs. Clinical supervision is a key component to stronger training outcomes for CITs.

Clinical supervision provides a supportive environment where CITs are acculturated into mental health professions under the guidance from senior and skilled professionals (O'Byrne & Rosenberg, 1998). In a supervision environment, CITs or supervisees are able to reflect on their counseling practice and process emotions through the support of the clinical supervisors. In clinical supervision process, CITs begin a journey in the field of counseling while continuing to develop the professional knowledge and skills under the guidance of supervisors. Clinical supervision creates an impactful influence on professional development of CITs (Magnuson et al., 2001). It is paramount to continue the research on clinical supervision for the advancement of mental health professions and improve the education for future generations of professional counselors. This study aimed to investigate the CITs' perceived supervisor competency and the

development of counseling self-efficacy in order to further understand the critical role of clinical supervision.

Counseling Self-Efficacy

While considering clinical supervision as a part of the training and learning process in counselor education, this research investigated the phenomenon of CITs' self-efficacy in the clinical supervision process. Self-efficacy is an essential way to measure learning outcomes. Bandura (1977) defined self-efficacy as a concept to describe a learner's own judgment and perception of their ability in achieving a given task. Researchers have used self-efficacy to evaluate the development of trainees, such as CITs, in their learning process (Barden & Greene, 2015; Daniels & Larson, 2001; Leach et al., 1997; Mullen et al., 2015).

CITs often start their supervision experience in practicum and internship. The practicum and internship trainings provide CITs the direct contact experiences with clients which includes both experiential and vicarious learning opportunities (Bandura, 1986; Dewey, 1986; Tang et al., 2004) to enhance the CITs' confidence in practicing counseling, namely counseling self-efficacy. Research has identified the critical role played by clinical supervision in practicum and internship (Ikonomopoulos et al., 2016; Mullen et al., 2015; Tang et al., 2004). With ongoing clinical supervision, CITs are able to acquire proper development of counseling self-efficacy (Cashwell & Dooley, 2001; Melchert et al., 1996; Tang et al., 2004). In addition to the critical role of clinical supervision, it is also essential to explore how clinical supervision contributes to CITs' development of counseling self-efficacy.

Supervisor Competency

The effectiveness of supervision serves the foundation for the professional development and CITs' counseling self-efficacy (Magnuson et al., 2001; Melchert et al., 1996; Tang et al., 2004). Magnuson et al. (2001) claimed that inadequately prepared counselors should not assume the role of a clinical supervisor and the supervision responsibility. Less qualified supervisors may not deliver effective clinical supervision to CITs or supervisees and potentially generate negative effects on CITs' development of counseling self-efficacy. To increase successful development among counseling professionals, it is also necessary to prepare clinical supervisors with supervisor competency. The aim of supervisor competency is to promote supervisors' abilities to overcome challenges in clinical supervision process and achieve the desired progress of supervisees in professional development and counseling self-efficacy (Bernard & Goodyear, 2014; Whitman & Jacob, 1998).

There are numerous national mental health associations with guidelines and criteria to define clinical supervision for training CITs (ACA, 2014; ACES, 2011; AMHCA, 2020; ASCA, 2016; CACREP, 2016). Furthermore, the clinical supervisor status and credentials are regulated by state licensing boards. A minimum of full license in professional counseling is required in all 50 states with other criteria, such as the additional two to five years of clinical experiences and the required supervision education or training, becoming mandatory in more than 30 states for a board-approved clinical supervisor (Field et al., 2019).

Clinical supervision is a fundamental component of professional counseling. With years of research on clinical supervision and required clinical supervisor credentials, it initiates the discussions for considering clinical supervision as a distinct professional field (Falender & Shafranske, 2017). Even with the demanded criteria in state licensing boards, scholars argued for an improved and structured approach to clinical supervision. Watkins (2018) emphasized that supervision manuals, standards, and supervisor training should be firmly established to promote supervisor competency while others called for the evaluation of supervisor's competency (Cliffe et al., 2014; Milne & James, 2002; Palomo et al., 2010; Williams, 1994). Therefore, it is clear that a systemic strategy for promoting supervisor competency is needed in addition to educational and training requirements listed by the state licensing boards. The study of supervisor competency becomes essential in the research of CITs' counseling self-efficacy and counselor training.

Current Study

The research question in this study investigated the amount of variance of CITs' development of counseling self-efficacy that was accounted for by four variables including, supervisory relationship, track of study, the total direct client/student contact hours, and CITs' perceived supervisor competency of their clinical supervisor. The study used regression model for the predictors in order to describe the development of CITs' counseling self-efficacy. Among these variables, the total direct client/student contact hours and track of study were self-reported information. Selected measures were applied to assess other variables. The PSDS-S was created from the Psychotherapy Supervisor

Development Scale (PSDS; Watkins et al., 1995) to measure supervisee's perceived supervisor competency of their clinical supervisor, the Counseling Self-Estimate inventory (COSE) was selected to assess CITs' development of counseling self-efficacy (Larson et al., 1992), and the Short Version of the Supervisory Relationship Questionnaire (S-SRQ) was used to operationalize supervisory relationships (Palomo et al., 2010). Statistical analyses were selected to achieve the goal of answering the research question.

Summary of Results

This study was conducted via online and paper-and-pencil surveys that included a sample of counseling students in either practicum or internship class. With the online survey, a list of directors of counseling programs was compiled with publicly available data on the directories of counseling programs in the United States. An email containing the information letter and the survey link was sent to the directors, and this email requested the directors to disseminate this survey link to their students in practicum and internship classes. The survey link was also pushed to counselor educators through the listserv of counselor education (CESNet-l). Counselor educators on CESNet-l received this request to assist the research process by disseminating the survey links to their students. Additionally, counselor educators used data collection process with the paper-and-pencil survey. With IRB approval, these surveys were collected on campuses where CITs enrolled in practicum or internship classes. A total of 52 CITs responded to the survey and completed the research process. After statistical analysis, a total number of 49 CITs were included in the study.

Among the 49 CITs included in this study, a large portion of these counseling students came from two states, Minnesota (49%) and Alabama (30.6%). The majority of CITs were enrolled in practicum classes (83.7%) and a small portion in internship classes (16.3%). Participants completed the demographic items, the revised Psychotherapy Supervisor Development Scale (PSDS-S), the Counseling Self-Estimate Inventory (COSE), and the Short Version of the Supervisory Relationship Questionnaire (S-SRQ). To assess CITs, these instruments measured the counseling self-efficacy (with COSE), supervisee's perceived supervisor competency (with PSDS-S), and supervisory relationship (with S-SRQ). The study included the four predictors including the total direct contact hours, the supervisory relationship, the CITs' track of study, and the CITs' perceived supervisor competency.

The study used statistical analyses to analyze the data. More specifically, the bi-variable correlational analysis was utilized to calculate the linear relationships between the criterion variable and the predictors for the compliance of linearity assumption (see Table 1). The bi-variable correlational analysis (see Table 3) found the following results: Total scores of PSDS-S (r =.326, p=.011) and the total direct client/student contact hours (r =.349, p =.007) and the criterion variable (Counseling self-efficacy indicated by COSE). Considering the linearity assumption of multiple regression, only the predictors with significant correlation coefficients were included in the final model for multiple regression analysis. The final regression model included predictors of total contact hours and perceived supervisor competency (PSDS-S). The supervisor relationship (S-SRQ) and track of study (clinical mental health or professional school counseling) were

excluded from the final model due to the insignificant correlation. The final model with the two predictors (i.e., the total client/student contact hours and the PSDS-S) explained 21.2% of the variance for counseling self-efficacy development of CITs. The effect size, f^2, of multiple regression was calculated to reveal a medium effect size of $f^2 = 0.269$.

Discussion of Outcomes

This study was designed to test a holistic model for CITs' counseling self-efficacy development. A proposed model was developed after a thorough literature review to investigate the relationship between CITs' perceived supervisor competency and the development of counseling self-efficacy. Variables that have supported CITs' counseling self-efficacy development were included into the model, including track of study, direct contact hours, supervisory relationship, and CITs' perceived supervisor competency of their clinical supervisors. However, significant relationships were not found between the counseling self-efficacy development and supervisory relationship, and counseling self-efficacy development and track of study.

Counseling Self-Efficacy Development and Supervisory Relationship

An insignificant correlation ($r = .264$, $p = .066$) was reported for CITs' development of counseling self-efficacy and the supervisory relationship. This finding was unexpected based on previous literature and findings. One possible answer that may explain this unexpected finding came from the sample size of this study. Cohen (1992) argued that there was a relationship between the sample size and the likelihood of rejecting a Null hypothesis when a larger sample size increased the probability of a rejection. The sample size of this study was 49, and a bigger sample size may change the

analysis outcome. Supervisory relationships have long been perceived as an important state for CITs and becoming a competent counselor (Deihl, 2009; Ellis & Ladany, 1997; Watkins, 2017, 2018; Watkins & Scaturo, 2013). Additionally, Watkins and Scaturo (2013) believed that the supervisory relationship is the "medium and message" (p. 85) that facilitates the growth and learning in the developmental process of competent counselors. With this unexpected discovery from this study, a further scrutiny for relations between variables proceeded. As a result, a significant relationship was found between S-SRQ and PSDS-S (r=.536, p=.001). An exploration in literature was engaged with the intention of explaining the unexpected finding of an insignificant relationship between CITs' development of counseling self-efficacy and supervisory relationship.

Watkins (2018) argued that clinical supervision is the "single most powerful contributor to therapist competency development and practice excellence" (p.1), and his viewpoint has been well supported by many scholars and researchers (Barnett & Molzon, 2014; Bernard & Goodyear, 2014; Rodenhauser, 1992; Watkins, 1995, 2014). Clinical supervision is an essential element in the educating and training for the next generation of counseling professionals. The quality of supervisory relationship between a supervisor and a supervisee is critical to a supervisee's development and attainment of professional knowledge and skills, and how supervisees behave in difficult situations. Besler et al. (2018) indicated that supervisory relationship is instrumental in clinical supervision for grounding uneasiness of CITs in the clinical practice. Therefore, supervisor competency becomes a crucial component of positive supervisory relationship. For example, Watkins (2014) listed six domains of supervisor competency including 1) knowledge of

supervision model, 2) legal and ethical concerns, 3) supervision relationship management, 4) supervisee assessment and evaluation, 5) difference and diversity, and 6) self-assessment. As an essential domain, supervision relationship may present a larger influence to counseling self-efficacy. The outcomes reported an insignificant finding of the relationship between CITs counseling self-efficacy and supervisory relationship. At the same time, there existed a significant relationship between the CITs' perceived supervision competency of their supervisor and supervisory relationship. It is reasonable to rationalize that CITs place more value on their supervisors' supervision competency. The competent supervisors also have better skills in forming positive supervisory relationship with the CITs.

COSE and Track of Study

The purpose of this study was to test a regression model for CITs' counseling self-efficacy development. The proposed regression model initially included four predictors for CITs' counseling self-efficacy development, and they were supervisory relationship, direct client or student contact hours, CITS' perceived supervisor competency of their clinical supervisor and the track of study. However, the track of study as a predictor did not meet the linearity assumption while demonstrating an insignificant correlation with CITs' counseling self-efficacy development assessed by COSE (r=.216, p=.137). Therefore, the track of study was excluded from further analysis after a preliminary bi-variate correlational study. The outcomes of this study indicated that the development of CITs' counseling self-efficacy was not significantly affected by track of study, professional school counseling and clinical mental health tracks. This

result actually lessened concerns from the literature about the quality of the clinical supervision for CITs in the school counseling track during their practicum and internship classes (Bledsoe et al., 2019; Duncan et al., 2014; Holstun et al., 2019; Studer & Oberman, 2006). Even with concerns of the lack of post-graduate supervision and clinical supervision (Bledsoe et al., 2019; DeKruyf et al., 2013; Walsh-Rock, 2018), CITs of the school counseling track, compared to their mental health counseling counterparts, acquired similar counseling self-efficacy under supervision in practicum and internship.

There was a discussion about clinical competency of school counselors in the literature. Holstun et al. (2019) studied 682 counseling students and reported that participants of school counseling tracks scored significantly lower than those from clinical mental health counseling tracks in helping relationships and group work. Other scholars have expressed concerns regarding school counselors' clinical focus and competency due to the demands on school counselors' roles and functions (ASCA, 2016; Brown et al., 2006; DeKruyf et al., 2013). In the literature, the lack of clinical supervision has been mentioned in the literature as a concern for school counselors (Borders, 2005; Borders & Usher, 1992; Chae, 2022; Page et al., 2001; Sutton & Page, 1994). Brott et al. (2016) indicated that school counselors continue to rely on the supervision received during internship due to lack of post-degree supervision. This notion marks the importance of clinical supervision in practicum and internship of school counselors. The results of this study did not conform these concerns of competency and learning of school counseling interns when the outcomes reported no significant difference on counseling self-efficacy between mental health and school counseling

CITs. However, school counseling students will need to seek methods to continue the counseling self-efficacy development after graduation.

Currently, CACREP-accredited counselor education programs are designed according to standards where both Clinical Mental Health and School Counseling programs follow the same guidelines of Learning Environment. Both tracks share the core training and curriculum standards. The similar training requirements are reflected in the new 2024 CACREP standards (2024), where it details the training requirements in the Academic Quality, Foundational Counseling Curriculum, and Professional Practice sections. The outcomes of this study did reflect the shared educational and training core in mental health and school counseling tracks with a report of no significant difference in counseling self-efficacy between mental health and school counseling CITs. Counselor educators can learn from the outcomes for future plans in enhancing supervisor competency of CITs' site supervisors.

Client Contact Hours

Contact hours are required component in practicum and internship (CACREP, 2024). CITs have to collect enough experiential hours in practicum and internship to satisfy the course requirements, and these hours have to contain certain client contact hours. CITs obtain client contact hours through direct service to clients (CACREP, 2024). During clinical supervision, the experience in contact hours becomes the focus in order to help CITs develop professional skills in counseling practice. Therefore, the Direct contact hours play a critical role in CITs' learning and development in practicum

and internship while CITs serve as a counselor under a qualified supervisor (Holloway & Neufeldt, 1995; Melchert et al., 1996; Tang et al., 2004; Worthington, 2006).

The bi-variable correlational analysis (see Table 3) found a significant correlation between COSE and the Total direct client/student contact hours (r =.349, p =.007). This finding is consistent with current literature and research of Bandura (Bandura, 1986), which indicates that the increase of client contact hours will enhance the counseling self-efficacy (Melchert et al., 1996; Tang et al., 2004). The finding also provides further rationale for the client contact hours of 40 and 240 in practicum and internship, which are mandated by CACREP (2016, 2024). It is clear that required client contact hours serve a critical role in the development of CITs' counseling self-efficacy. However, further investigation is needed to discover the ideal amount of direct contact hours for optimal development of CITs' counseling self-efficacy. The answer to this question may also support the rationale of the required direct contact hours enforced by CACREP.

CITs' Perceived Supervisor Competency

While supervisor competency has been studied for the education and training of clinical supervisors with data collected from clinical supervisors-in-training. This study was inspired by both the social learning and social cognitive theories and decided to explore supervisor competency from learners' perspectives; thus, CITs' perceived supervisor competency of their clinical supervisors was included in the initial regression model. At the time of this research, the instrument or tool for this type of measure was not available. Thus, the revised version of the PSDS, PSDS-S was used for the study.

Watkins et al. (1995) had developed the PSDS to assess supervisor competency development of clinical supervisors-in-training. The PSDS was praised for its theoretical foundation and it was respected for its psychometric properties (Baker et al., 2002; Barker & Hunsley, 2013; Barnes & Moon, 2006). PSDS was designed to monitor the clinical supervisor's supervisor competency development according to Wakins' Supervisor Complexity Model. The PSDS collects self-report information from supervisors-in-training in their development of becoming a clinical supervisor.

The use of PSDS has limitations. Researchers, including Walfish et al. (2012) and Watkins (1995), expressed concerns about self-perceived bias from self-report data. An additional concern came from the partial data collection where PSDS collects only the perspectives of supervisors but not supervisees' perspectives in a dyadic environment (Bernard & Goodyear, 2014). The exclusion of supervisees' voice makes the assessment of supervisor competency fall short of capturing the full information in clinical supervision practice. Thus, including the voice of supervisees became necessary in order to advance the research on the development of clinical supervisors (Milne & James, 2002).

With the understanding on the lack of investigating supervisees' perspectives of supervisors' supervisor competency, a search of proper instruments for this investigation was conducted. However, at the time of this study, there was no a sufficient instrument designed that allowed for supervisees to evaluate their clinical supervisor's supervision competency. In order to understand supervisees' perspectives in the supervision process, the PSDS-S was developed by the researcher to serve as the instrument for supervisees'

perspectives. The PSDS-S was converted from the PSDS (Watkis et al., 1995), in an attempt to mirror items from PSDS for the use with supervisees, and the intention of PSDS-S was to collect information from supervisees, and the supervisors-in-training can use the results from their supervisee and their own results from PSDS to understand their own supervision competency development. With this provision, supervisors-in-training can be more objectively informed about their own progress and inform supervision competency development. The PSDS-S mirrored the PSDS and consists of a total of 18 items. The reliability coefficient of internal consistency was calculated and α =.79 was reported for the sample of the study. The internal consistency reliability of .79 was decent for PSDS-S because it is the first instrument designed to assess perspectives of supervisor competency from a supervisee lens. The results indicated that CITs' supervisor competency had a significant correlation with counseling self-efficacy measured by COSE (r=.326, p=.011). Therefore PSDS-S was included in the regression model to assess CITs' counseling self-efficacy development. The results suggested that supervisor competency contributed significantly to CITs' development of counseling self-efficacy. This finding is important for counselor educators and clinical supervisors to effectively assess counseling self-efficacy of CITs. Evaluating how CITs view the competency of their supervisors is essential in counselor education and training.

Conclusion

Counseling self-efficacy of CITs is one indicator of the effectiveness of counselor education programs. Massive research efforts in the field of counseling have been

invested for a better understanding of counseling self-efficacy. These efforts have helped counselor educators to collect information and improve their academic programs. However, the research projects focusing on counseling self-efficacy of CITs often investigated a single factor and failed to provide a comprehensive view of the counseling self-efficacy of CITs. To achieve a comprehensive understanding of counseling self-efficacy, the study adopted a regression model in an attempt to holistically describe counseling self-efficacy. As a result, the final regression model included two predictors for counseling self-efficacy and they were total direct client/student contact hour and the CITs' perceived supervisor competency of their clinical supervisors. The final regression model was able to count for 21.2% variance of CITs' counseling self-efficacy.

Contributions to the Education and Training of Counselors

This study aimed to investigate the development of counseling self-efficacy among CITs through a regression model with four predictors, the total direct client/student contact hours, track of study, supervisory relationship, and CITs perceived supervisor competency of their clinical supervisor. These four predictors were perceived to have significant influence on CITs' development of counseling self-efficacy. As previously stated, the track of study and supervisory relationship did not meet the linearity assumption and were dropped from further analysis. As a result, the final regression model included two predictors which included the total direct client/student contact hours and CITs perceived supervisor competency of their clinical supervisor. With multiple regression analysis, the results indicated that the total client/student contact hours and CITs perceived supervisor competency of their clinical supervisor

demonstrated significant correlation with CITs' development of counseling self-efficacy and the final regression model with the two factors explained 21.2% of variance of counseling self-efficacy. The outcomes may provide counselor educators and supervisors with an increased understanding in the major factors of counseling self-efficacy.

Clinical components are required for Counselor Education programs with CACREP accreditation. Clinical components refer to practicum and internship classes, which CITs are required to practice and generate a specific amount of clinical hours to pass these classes. The correlation between total client/student contact hours and counseling self-efficacy is supported by the self-efficacy in Bandura's social learning theory. From Bandura's social learning theory and the concepts of self-efficacy, it is clear that increasing the time on practicing a specific behavior will improve self-efficacy for this behavior. Research findings of CITs' development of counseling self-efficacy (Mullen et al., 2015; Tang et al., 2004) also support a positive effect from the time of engaging in clinical experience in relation to CITs' development of counseling self-efficacy. The results of this study support the training requirement of practicum and internship due to a significant correlation between the total direct client/student contact hours and the CITs' development of counseling self-efficacy. With the clinical experiences and working on the total direct client/student contact hours as they experience practicum and internship classes, CITs are able to promote their counseling self-efficacy.

The study initially included a variable that was first studied in research of CITs' development of counseling self-efficacy. The CITs' perceived supervisor competency of

their clinical supervisors was included as an important factor in understanding counseling self-efficacy. The perceived supervisor competency was reported to have significant correlation with the CITs' development of counseling self-efficacy (r =.326, p=.010) and passed the linearity assumption test. This factor was included further in the multiple regression analysis. The outcome opened a new perspective for counselor education programs and counselor educators. The requirements on clinical supervisors' credentials and training have been described in CACREP standards and established through licensing boards, and these regulations may be the criteria for measuring a supervisor's competency. However, this finding precisely pointed out the effect of the clinical supervision on the CITs' development of counseling self-efficacy. CITs need the guidance of their clinical supervisors and demonstrate better learning outcomes in developing counseling self-efficacy with well-perceived competent clinical supervisors. Clinical supervisors are also evaluated through CITs' perceptions of the supervisor competency. Therefore, counselor educators will be more effective in serving CITs by finding not only the qualified clinical supervisors, but also promote the discussion on supervisor competency among CITs and their clinical supervisors. Counselor educators may want to develop necessary training or curriculum in order to help supervisors achieve better supervisor competency and assist CITs evaluating supervisor competency. The use of multiple viewpoints in evaluating supervisor competency will achieve a holistic view of supervisor competency.

The Contribution to the Education and Training of Clinical Supervisors

Clinical supervision plays an essential component in the education and training of CITs; it is a required component in practicum, internship and post-graduation supervision. Thus, the quality of supervisors and training of clinical supervisors becomes essential in the development of counseling professionals. In the past decades, the promotion of supervisor training and credentials reflected the increasing requirements of supervisor competency. Compared to the counterparts of clinical supervisors serving in post-master supervision, the clinical supervisors for CITs in practicum and internship have not been regulated in the widely accepted training standards of CACREP (2016, 2024). With the importance of supervisor competency in CITs counseling self-efficacy development, future exploration may want to examine the methods to enhance supervisor competency of clinical supervisors in practicum and internship.

Clinical supervision as a curriculum element is listed in the CACREP Standards (2024). In its Section 6: Doctoral Standards Counselor Education and Supervision, a list of 12 guidelines for the supervision curriculum clearly reflects the importance of a systematic education and training of qualified clinical supervisors. These trained supervisors will likely become counselor educators who teach in counseling programs, especially in practicum and internship classes while some may serve as clinical supervisors in the field of professional counseling or K-12 schools (CACREP, 2024; Falender & Shafranske, 2012; Watkins, 1995). However, unlike post-master's clinical supervisors, the clinical supervisors for practicum and internship may not be regulated strictly. More attention should be given to clinical supervisors of school counseling CITs

since clinical supervisors in school counseling are not regulated by any entity. Literature indicates that a majority of clinical supervisors of school counseling felt unprepared for their roles (Uellendahl & Tenenbaum, 2015; Wambu & Myers, 2019). The results of this study did report a similar development of counseling self-efficacy in both mental health and school counseling CITs. The outcomes are encouraging but should inform a future discussion in the development of supervisor competency of school counseling practicum and internship supervisors.

Most discussions of clinical supervisor competency focused on objective measures (i.e., the number of clinical experiences, education and training) and often lack how clinical supervisors can communicate supervisor competency with their supervisees. It is important for CITs to understand the competency of supervisors in order to pursue an effective learning experience and the development of counseling self-efficacy. Counselor educators may assist supervisors and CITs to overcome this deficit with training and curriculum that help both supervisors and CITs understand how they should perceive and develop supervisor competency.

Clinical supervision research continues to develop after decades of efforts and investment of researchers and practitioners. Supervision models, development of curriculum, and workshops become available in the education and training of clinical supervisors. Measures for the development of supervisor competency were also available in the training of clinical supervisors. However, these measures were self-reported information with potential bias. The development of PSDS-S within this study that collects information from the perspectives of the recipient of clinical supervision can

provide an objective input into the training of clinical supervisors. Further development of such a measure of supervisor competency may contribute to the development of supervisor competency and training of supervisors.

The Contribution to the Education and Training of CITs

Practicum and internship are considered a critical process for CITs to experience the professional work of a counselor (Akos & Scarborough, 2004; Belser et al., 2018; Goodyear & Bernard, 1998; Hoffman, 2001; Jackson et al., 2002). Clinical supervisors assume the responsibility to closely monitor CITs' progress in practicum and internship. In Section 4: Professional Practice of the CACREP 2024 standards, the parameters of practicum and internship were clearly defined as well as the qualification of clinical supervisors (CACREP, 2024). Both site and faculty clinical supervisors work to facilitate the development of CITs' professional identity. Identity development can be accelerated with the effective clinical supervision where supervisors facilitate the growth of professional knowledge and counseling self-efficacy (Besler et al., 2018). To achieve optimal supervision, supervisor competency of clinical supervisors plays a fundamental role in the effectiveness of education and training in counselor education programs. The results of this study provided exploratory evidence on the exploration of supervisor competency by including the critical perspectives of CITs' voice, which reflected their perceptions of supervisor competency through their education and training to become a professional counselor. This additional understanding of supervisor competency provided by CITs' perceptions enhances the traditional assessment of supervisor competency through supervisors' self-reported evaluation alone. The study outcomes

provided the rationale to support the evaluation of supervisor competency through the perceptions of CITs. The use of PSDS-S for the purpose of assessing perceived supervisor competency will be a potential method in the development of effective supervision and the education and training of CITs.

Limitations

As many findings in this study were exciting and with a potential of contributing to the advancement of counselor education and clinical supervisor training, there are limitations due to the selection of sampling, instruments, and research methods. The use of sampling process, research design, and data analysis methods carried noticeable limitations that should be discussed for readers and others before they may want to utilize the results of this study. Readers should be cautious in interpreting and generalizing the outcomes.

Representativeness of the Sample

Sampling is an essential component of conducting research as it helps to increase the quality of the data and allow for the generalizability of the study results. A representative sample can increase the confidence of explaining a phenomenon and generalizing the findings of the sample to its population. However, it is not easy to always obtain a representative sample. A non-representative sample does place limitations to the interpretation and generalizability of research outcomes.

A significant limitation to this study includes the sampling process. The recruitment process produced the inconsistency of data collection. An online recruitment was used in order to obtain participants in the United States in an attempt to acquire a

representative sample. However, the online recruitment may not include an adequate sample size. Additionally, a paper-and-pencil survey was implemented to recruit more participants. The difference of data collection methods may cause different readiness for participating in the study. As a result, the sample of this study did not include participants from all 50 states. The sample also consisted of a high number of participants in the clinical mental health track. The lack of equivalent participants from different tracks of study skewed the results and could have misinform the effect of track of study on the CITs' development of counseling self-efficacy. Finally, the sample size came with a majority of participants from the practicum class. The distribution of enrollment status (mostly from a practicum class) may influence the statistical results for generalizing the outcomes to the population. With these limitations, readers have to be aware of the interpretation and generalization of the results.

Concerns about PSDS-S

The instrument used in this study included the COSE and S-SRQ. Due to difficulties in obtaining an instrument that assesses supervisees' perceptions of supervisor competency, the PSDS-S was converted from PSDS, which is an author-made instrument for assessing supervisors' perspectives on their supervisor competency. The PSDS was selected because of its ability to assess supervisor competency, and in this study PSDS was converted to reflect the assessment of supervisor competency from supervisees' viewpoints. Although the development of PSDS-S followed the process of construct validity, and its psychometrics were tested in this study, the PSDS-S was still an instrument without strong empirical support from other research projects. The PSDS-S

was first debuted in this study and demonstrates appropriate internal reliability. The psychometrics of the PSDS-S will still require additional support for future research. Before the PSDS-S receives empirical support from the literature, it should be interpreted with caution.

Recommendations for Future Research

This study investigates CITs' perceived supervisor competency of their supervisor and counseling self-efficacy. It takes a new approach to explore the perceived supervisor competency and its impact on counseling self-efficacy. Understanding the outcomes of this study, several directions can be suggested for future research. First, the outcomes of this study indicated that CITs perceived supervisor competency of their clinical supervisors and the total client/student direct contact hours together contributed significantly to CITs' development of counseling self-efficacy and explained about 21.2% variance of counseling self-efficacy. It is important to notice that there are additional factors (e.g., supervisory relationship and track of study) and others that affect CITs' development of counseling self-efficacy, and these additional factors were not included in the study. While counseling self-efficacy has been a critical indicator of the training effectiveness of counseling students, the continuous study of the additional factors of counseling self-efficacy development are still needed.

Secondly, as explained through Bandura's social learning and social cognitive theory, more practice of a behavior will lead to the increase of self-efficacy. This research found positive correlation between Total direct contact hours and CITs' development of counseling self-efficacy. CACREP standards (2016, 2024) clearly

regulated the required 40 and 240 direct contact hours for practicum and internship; however, the ratios of required direct contact hours may need further explanation. More research efforts can be directed to this issue to investigate the relationship between the amount of direct contact hours and the optimal development of counseling self-efficacy of CITs. The outcomes may help counselor education programs and the counseling profession re-evaluate the necessity of direct contact hours and the effective training modules to enhance CITs' learning outcomes.

Thirdly, it is also essential to listen to CITs' voice about their perception of supervisor competency in clinical supervision. Clinical supervision delivers crucial knowledge to the development of CITs' counseling self-efficacy. Clinical supervisors not only guide the professional development of supervisees in their professional knowledge and skills but also serve as a gatekeeper to safeguard the quality of the profession (Falender, 2014; Falender et al., 2014; Watkins, 1995). Effective supervision is vastly associated with the development of highly qualified counselors in training which leads to the sustainability of the counseling profession (Magnuson et al., 2001). Supervisor competency has historically been researched as part of clinical supervision to assure the effectiveness of clinical supervision and the professional development of supervisees. The concern of supervisor competency leads to the discussions of the lack of proper training and education of clinical supervisors from scholars in the fields of clinical mental health counseling (Reiser & Milne, 2014) and school counseling (Peed, 2017). In addition to the supervision dyad of supervisors and supervisees, another prominent perspective is understanding the function of supervisor competency in this

dynamic. Efstation et al. (1990) contended the necessity to also research supervision and supervisor competency from the perspectives of supervisees. The voice of supervisees or CITs provides additional experiences and ideas from the supervision dyad, which may enhance the comprehensive understanding of clinical supervision and supervisor competency. Thus, it is critical to explore the topic of supervisor competency through the lens of CITs to maximize CITs' development of counseling self-efficacy.

Fourthly, the difference of clinical content between clinical mental health counseling and school counseling is largely addressed in training criteria and professional organizations (CACREP, 2024). CITs of CACREP accredited clinical mental health counseling and school counseling tracks will share the similar educational training prior to the clinical experiences, namely the practicum and internship (CACREP, 2024). From practicum to internship, CITs either in the clinical mental health track or school counseling track, diverge into the clinical practices within their work environments and job context. Students from the clinical mental health track often obtain clinical experiences through various mental health agencies and the treatment of mental health illnesses. By contrast, school counseling trainees often enter kindergarten through 12th grade classrooms to provide support for academic success, social emotional well-being, and career exploration, etc. Due to the differences between the two tracks, it is not fair to apply the same criteria of supervisor competency for both counseling professions. School counselors will be better served when there is a comprehensive framework that illustrates the needs of their specific professional competencies. More specifically, the supervisor competency for school counseling can be developed accordingly for the

training of competent school counseling supervisors. With proper training and education of clinical supervisors for both clinical mental health and school counseling, the requirements of post-graduate supervision will provide additional benefits in developing competent professional mental health counselors and professional school counselors.

Fifthly, the supervisory relationship was supported by researchers and previous literature as essential in the development of CITs (Cliffe et al., 2014; Deihl, 2009; Holloway, 1995). Supervisory relationship was included in the original regression model of this study to investigate its impacts on CITs' development of counseling self-efficacy. However, this variable was excluded from analysis in this study due to its insignificant correlation with CITs' development of counseling self-efficacy. The ability of fostering a supervisory relationship is one of the various domains in supervisor competency. Participants of the study may take a global perspective of supervisor competency rather than focus on supervisory relationship. Although the finding on the supervisory relationship and counseling self-efficacy is inconsistent with the literature, the counseling profession may benefit from additional research to continue exploring the influence of supervisory relationship on counseling self-efficacy development and the connection between supervisory relationship and supervisor competency. One of the possible explanations is the sample size obtained in this study. Sample sizes are related to probabilities of statistical significance (Cohen, 1992). This study had a sample size of 49. Understanding the limitation of the sample size in this study, future research with larger sample size may provide further understandings on the relationship between supervisory relationship and counseling self-efficacy.

Sixthly, the track of study was included in this study for its effect on CITs' development of counseling self-efficacy. An insignificant result was found between the variables of track of study and counseling self-efficacy. However, a bi-variate correlation was conducted to explore the relationship between track of study and CITs perceived supervisor competency of their clinical supervisors, and a positive correlation was reported (r=.288, p=.045). Compared with CITs in school counseling track, the CITs of the clinical mental health track rated their clinical supervisors' supervisor competency higher; however, the higher rating of supervisor competency did not make a significant difference on the development of counseling self-efficacy in both tracks. With the exploration of supervisor competency between different counseling tracks, it is also important to notice that the requirements of a supervisor status and the development and training of supervisors are remarkably different between the two tracks. The significant finding of the different ratings of clinical supervisor competency between the two tracks may inform counselor educators on the importance of clinical supervisor's supervision competency. In the future, this researcher wants to continue investigating the supervisor competency in school counseling to better inform counselor educators on the necessity of education and training of school counseling supervisors. Additionally, it will be important to explore the differences of supervisor requirements (i.e., experience, training, supervisor credentials, and development of counseling self-efficacy) in different counseling tracks. As indicated from the outcomes of this study, enhancing supervisor competency in school counseling will strengthen the supervision and counseling self-efficacy in this profession.

Lastly, there are areas not focused on in this study, and these areas could become topics for future research. For example, this study did not explore the multicultural influences in supervision and supervisory relationship. Cross-cultural elements in supervision and supervisory relationships play a vital role in achieving the effectiveness and success of clinical supervision (Brown et al., 2006; Killian, 2013; Lyon & Potkar, 2011; and Soheilian et al., 2014). The multicultural influences exit in the dyadic supervisor-supervisee relationship, and such influences cannot be overlooked in the study of clinical supervision. The intersectionality of a variety of cultural elements plays a key feature in the quality and effectiveness of clinical supervision (Zimmerman & Castronova, 2021). This study did not include the exploration of intersectionality and its influence on counseling self-efficacy. The future research may investigate the multicultural influences and intersectionality on the development of counseling self-efficacy and supervisor competency.

One more area for future research is the investigation of differences between CACREP-accredited and non-CACREP programs. This study focused on CACREP-accredited programs, which limited the recruitment and generated a sample that includes only CITs from CACREP-accredited programs. The differences between CACREP and non-CACREP programs may become influential in the development of CITs' counseling self-efficacy and professional identity (Person et al., 2020; Tang et al., 2024). Future research should include data from non-CACREP programs to build a holistic view on the importance of clinical supervision. Furthermore, supervisor credentials are regulated by states and the CACREP standards for practicum and internship with a variety of

requirements and criteria (Borders et al., 2014; CACREP, 2016, 2024; Henriksen et al., 2019). The lack of universally mandated criteria for board-approved supervisors may create the difficulty in assessing supervisor training and competency. Future research may find this topic important for establishing a credible assessment protocol for supervisor competency.

In conclusion, CITs' counseling self-efficacy is a prominent indicator for assessing the effectiveness of counselor education and training. This study provides counselor educators with additional information regarding the importance of clinical supervisors and the impact on the development of counseling self-efficacy of the practicum and internship students. It is recommended that counselor educators continue to collaborate with qualified and competent clinical supervisors in CITs' practicum and internship processes. This is a crucial step for CITs' professional development and counseling self-efficacy. Noteworthy, self-efficacy and competence are related, yet different constructs. Readers are cautioned about equating self-efficacy to competency. More research is needed to explore the connection between the two constructs. Furthermore, the training and education of competent clinical supervisors positively influence the CITs' development of counseling self-efficacy. Counselor educators should review the curriculum of doctoral training to ensure that the supervisor competency has been established through both proper practice and training. Although supervision training is not required for master's level students, the understanding of supervision models and supervisor competency will help master's students establish adequate knowledge to effectively evaluate supervisor competency. This training will also

establish a foundation for theses master's students in the future when they are called to supervise students and young counselors.

Supervisor competency training for masters-level site supervisors is important because these supervisors work closely with CITs in practicum and internship yet may not have had training or coursework in clinical supervision. Counselor educators want to help site supervisors obtain necessary knowledge and skills to be competent in clinical supervision. The inclusion of CITs' perceived supervisor competency of their clinical supervisor is a critical step in establishing supervisor competency. CITs' voice should be included in the training of clinical supervisors, and the PSDS-S can be an additional assessment to inform the development of clinical supervisors-in-training. Overall, this study provides invaluable research on supervisor competency and counseling self-efficacy. The study outcomes contribute to the literature and help to enhance the field of counselor education and the counseling profession by furthering the understanding of supervision and the development of supervisor competency.

References

Aiken, L. S., & West, S. G. (1991). *Multiple regression: Testing and interpreting interactions.* Sage.

Akos, P., & Scarborough, J. L. (2004). An examination of the clinical preparation of school counselors. *Counselor Education and Supervision, 44*(2), 96-107. https://doi.org/10.1002/j.1556-6978.2004.tb01863.x

American Counseling Association. (2014). *ACA Code of Ethics.* American Counseling Association. https://www.counseling.org/resources/aca-code-of-ethics.pdf

American Mental Health Counselors Association. (2020). *AMHCA standards for the practice of clinical mental health counseling.* Alexandria, VA: Author.

American School Counselor Association. (2016). *ASCA ethical standards for school counselors*. American School Counselor Association.

American School Counseling Association (2022). *ASCA ethical standards for school counselors*. https://www.schoolcounselor.org/getmedia/44f30280-ffe8-4b41-9ad8-f15909c3d164/EthicalStandards.pdf

Association for Counselor Education and Supervision (ACES). (2011). *Best practices in clinical supervision.* https://acesonline.net/wp-content/uploads/2018/11/ACES-Best-Practices-in-Clinical-Supervision-2011.pdf

Association for Counselor Education and Supervision (ACES). (2016). *ACES teaching initiative taskforce: Best practices in teaching in counselor education report 2016.* https://acesonline.net/wp-content/uploads/2018/11/ACES-Teaching-Initiative-Taskforce-Final-Report-2016.pdf

Baker, S. B., Exum, H. A., & Tyler, R. E. (2002). The developmental process of clinical supervisors in training: An investigation of the Supervisor Complexity Model. *Counselor Education and Supervision, 42,* 15–30. https://doi.org/10.1002/j.1556-6978.2002.tb01300.x

Bandura, A. (1977). Self-efficacy: Toward a unifying theory of behavioral change. *Psychological Review, 84*(2), 191–215. https://doi.org/10.1037/0033-295X.84.2.191

Bandura, A. (1986). *Social foundations of thought and action: A social cognitive theory*. Prentice-Hall.

Bandura, A. (1994). Self-efficacy. In V. S. Ramachaudran (Ed.), *Encyclopedia of human behavior* (Vol. 4, pp. 71-81). Academic Press.

Bandura, A. (1999). Social cognitive theory of personality. *Handbook of personality, 2,* 154-96.

Bandura, A., & Schunk, D. H. (1981). Cultivating competence, self-efficacy, and intrinsic interest through proximal self-motivation. *Journal of Personality and Social Psychology, 41*(3), 586–598. https://doi.org/10.1037/0022-3514.41.3.586

Bang, K., & Goodyear, R. K. (2014). South Korean supervisees' experience and response to negative supervision events. *Counselling Psychology Quarterly, 27*(4), 353–378. https://doi.org/10.1080/09515070.2014.940851

Barden, S. M., & Greene, J. H. (2015). An investigation of multicultural counseling competence and multicultural counseling self-efficacy for counselors-in-training.

International Journal for the Advancement of Counselling, 37, 41-53. https://doi.org/10.1007/s10447-014-9224-1

Barker, K. K., & Hunsley, J. (2013). The use of theoretical models in psychology supervisor development research from 1994 to 2010: A systematic review. *Canadian Psychology / Psychologie Canadienne, 54*(3), 176-185. https://doi.org/10.1037/a0029694

Barnes, K. L. (2004). Applying self-efficacy theory to counselor training and supervision: A comparison of two approaches. *Counselor Education and Supervision, 44*(1), 56-69. https://doi.org/10.1002/j.1556-6978.2004.tb01860.x

Barnes, K. L., & Moon, S. M. (2006). Factor structure of the psychotherapy supervisor development scale. *Measurement and Evaluation in Counseling and Development, 39*(3), 130-140. https://doi.org/10.1080/07481756.2006.11909794

Barnett, J. E. (2007). In search of the effective supervisor. *Professional Psychology: Research & Practice, 38*(3), 268-275. https://doi.org/10.1037/0735-7028.38.3.268

Barnett, J. E. (2011). Ethical issues in clinical supervision. *The Clinical Psychologist, 64*(1), 14–20.

Barnett, J. E., Erickson Cornish, J. A., Goodyear, R. K., & Lichtenberg, J. W. (2007). Commentaries on the ethical and effective practice of clinical supervision. *Professional Psychology: Research and Practice, 38*(3), 268-275. https://doi.org/10.1037/0735-7028.38.3.268

Barnett, J. E., & Molzon, C. H. (2014). Clinical supervision of psychotherapy: Essential ethics issues for supervisors and supervisees. *Journal of Clinical Psychology: In Session, 70*(11), 1051–1061. https://doi.org/10.1002/jclp.22126

Beinart, H. (2004). Models of supervision and the supervisory relationship and their evidence base. In I. Fleming & L. Steen (Eds.), *Supervision and clinical psychology* (pp. 51-65). Routledge.

Belser, C. T., Shillingford, M., Daire, A. P., Prescod, D. J., & Dagley, M. A. (2018). Factors influencing undergraduate student be retention in STEM majors: Career development,

mathematics ability, and demographics. *The Professional Counselor, 8*(3), 262-276. https://doi.org/10.15241/ctb.8.3.262

Bernard, J. M. (1997). The discrimination model. In C. E. Watkins, Jr. (Ed.), *Handbook of psychotherapy supervision* (pp. 310–327). John Wiley & Sons, Inc.

Bernard, J. M., & Goodyear, R. K. (2005). Tracing the development of clinical supervision. *The Clinical Supervisor, 24*(1-2), 3-21. https://doi.org/10.1300/J001v24n01_02

Bernard, J. M., & Goodyear, R. K. (2014). *Fundamentals of clinical supervision* (5th ed.). Pearson.

Bledsoe, K. G., Logan-McKibben, S., McKibben, W. B., & Cook, R. M. (2019). A content analysis of school counseling supervision. *Professional School Counseling*, *22*(1), 2156759X19838454. https://doi.org/10.1177/2156759X19838454

Borders, L. D. (2005). Snapshot of clinical supervision in counseling and counselor education: A five-year review. *The Clinical Supervisor, 24*(1-2), 69-113. doi:10.1300/J001v24n01_05

Borders, L. D. (2014). Best practices in clinical supervision: Another step in delineating effective supervision practice. *American Journal of Psychotherapy, 68*(2), 151–162. https://doi.org/10.1176/appi.psychotherapy.2014.68.2.151

Borders, L. D., Bernard, J. M., Dye, H. A., Fong, M. L., Henderson, P., & Nance, D. W. (1991). Curriculum guide for training counseling supervisors: Rationale, development, and implementation. *Counselor Education and Supervision, 31*(1), 58-80.

Borders, L. D., Glosoff, H. L., Welfare, L. E., Hays, D. G., DeKruyf, L., Fernando, D. M., & Page, B. (2014). Best practices in clinical supervision: Evolution of a counseling specialty. *The Clinical Supervisor, 33*(1), 26-44. https://doi.org/10.1080/07325223.2014.905225

Borders, L. D., & Usher, C. H. (1992). Post-degree supervision: Existing and preferred practices. *Journal of Counseling & Development, 70*(5), 594-599. https://doi.org/10.1002/j.1556-6676.1992.tb01667.x

Brott, P. E., Stone, V., & Davis, T. E. (2016). Growing together: A developmental model for training school counseling site supervisors. *Professional School Counseling, 20*(1), 1096-2409. https://doi.org/10.5330/1096-2409-20.1.139

Brown, T. L., Acevedo-Polakovich, I. D., & Smith, A. M. (2006). Cross-cultural issues affecting the supervisory relationship in counseling children and families. In T. K.

Neill (Ed.), *Helping others help children: Clinical supervision of child psychotherapy* (pp. 73–88). American Psychological Association. https://doi.org/10.1037/11467-004

Brown, C., Dahlbeck, D. T., & Sparkman-Barnes, L. (2006). Collaborative relationships: School counselors and non-school mental health professionals working together to improve the mental health needs of students. *Professional School Counseling, 9*(4), 332-335. https://www.jstor.org/stable/42732694

Carrol, M. (2010). Supervision: Critical reflection for transformational learning (Part 2). *The Clinical Supervision, 29*(1), 1-19. https://doi.org/10.1080/07325221003730301

Cashwell, T. H., & Dooley, K. (2001). The impact of supervision on counselor self-efficacy. *The Clinical Supervisor*, *20*(1), 39-47. https://doi.org/10.1300/J001v20n01_03

Chae, N. (2022). Collegial, Competent, and Consultative Supervision: A Peer Supervision Approach for School Counselors. *Professional School Counseling, 26*(1). https://doi.org/10.1177/2156759X221138233

Cliffe, T., Beinart, H., & Cooper, M. (2014). Development and validation of a short version of the Supervisory Relationship Questionnaire. *Clinical Psychology and Psychotherapy, 23*(1), 77-86. https://doi.org/10.1002/cpp.1935

Cohen, J. (1988). *Statistical power analysis for the behavioral sciences* (2nd ed.). Routledge. https://doi.org/10.4324/9780203771587

Cohen, J. (1992). A power primer. *Psychological Bulletin, 112*(1), 155–159. https://doi.org/10.1037/0033-2909.112.1.155

Cohen, J. (2013). *Statistical power analysis for the behavioral sciences*. Academic press.

Cohen, J., Cohen, P., West, S. G., & Aiken, L. S. (Eds.) (2002). *Applied multiple regression/correlation analysis for the behavioral sciences* (3rd ed.). Routledge. https://doi.org/10.4324/9780203774441

Council for Accreditation of Counseling and Related Educational Programs (CACREP). (2016). *2016 CACREP Standards.* http://www.cacrep.org/wp-content/uploads/2017/08/2016-Standards-with-citations.pdf

Council for Accreditation of Counseling and Related Educational Programs (CACREP). (2022). *Excellence in counselor education since 1981.* https://www.cacrep.org/home/40th-anniversary/

Council for Accreditation of Counseling and Related Educational Programs (CACREP). (2024). *2024 CACREP Standards.* https://www.cacrep.org/wp-content/uploads/2023/06/2024-Standards-Combined-Version-6.27.23.pdf

Crespi, T. D. (2002). Training school psychologists in prison schools: Implications for training special service providers with delinquent adolescents. *Special Services in the Schools, 18*(1-2), 151-163. https://doi.org/10.1300/J008v18n01_10

Crook-Lyon, R. E., Presnell, J., Silva, L., Suyama, M., & Stickney, J. (2011). Emergent supervisors: comparing counseling center and non-counseling-center interns' supervisory training experiences. *Journal of College Counseling, 14*(1), 34-49. https://doi.org/10.1002/j.2161-1882.2011.tb00062x.

Daniels, J. A., & Larson, L. M. (2001). The impact of performance feedback on counseling self-efficacy and counselor anxiety. *Counselor Education and Supervision, 41*(2), 120-130. https://doi.org/10.1002/j.1556-6978.2001.tb01276.x

Deihl, L. (2009). *The contribution of the supervisory working alliance to burnout and vigor among residential counseling paraprofessionals* (Publication No. 3355211) [Doctoral dissertation, State University of New York at Albany]. ProQuest Dissertation Publishing. https://www.proquest.com/openview/fec00fd69119d3911821bb0f6a576a60/1?pq-origsite=gscholar&cbl=18750

DeKruyf, L., Auger, R. W., & Trice-Black, S. (2013). The role of school counselors in meeting students' mental health needs: Examining issues of professional identity. *Professional School Counseling, 16*(5), 2156759X0001600502. https://doi.org/10.1177/2156759X0001600502

DeKruyf, L., & Pehrsson, D. E. (2011). School counseling site supervisor training: An exploratory study. *Counselor Education and Supervision, 50*(5), 314-327. https://doi.org/10.1002/j.1556-6978.2011.tb01918.x

Dewey, J. (1986). Experience and education. *The Educational Forum, 50*(3), 241-252. https://doi.org/10.1080/00131728609335764

Diambra, J. F., & Studer, J. R. (2010). *A guide to practicum and internship for school counselors-in-training.* Routledge. https://doi.org/10.4324/9780203883594

Dillman, D. A., Phelps, G., Tortora, R., Swift, K., Kohrell, J., Berck, J., & Messer, B. L. (2009). Response rate and measurement differences in mixed-mode surveys using

mail, telephone, interactive voice response (IVR) and the Internet. *Social Science Research, 38*(1), 1-18. https://doi.org/10.1016/j.ssresearch.2008.03.007

Dillman, D. A., Smyth, J. D., & Christian, L. M. (2009). *Internet, mail, and mixed-mode surveys: The tailored design method* (3rd ed.). Wiley.

DiMino, J. L., & Risler, R. (2012). Group supervision of supervision: A relational approach for training supervisors. *Journal of College Student Psychotherapy, 26*(1), 61-72. https://doi.org/10.1080/87568225.2012.633050

Dollarhide, C. T., & Miller, G. M. (2006). Supervision for preparation and practice of school

counselors: Pathways to excellence. *Counselor Education and Supervision, 45*(A), 242-

252. https://doi.org/10.1002/j.1556-6978.2006.tb00001.x

Duncan, K., Brown-Rice, K., & Bardhoshi, G. (2014). Perceptions of the importance and utilization of clinical supervision among certified rural school counselors. *The Professional Counselor, 4*(5), 444–454. https://doi.org/10.15241/kd.4.5.444

Dye, H. A., & Borders, L. D. (1990). Counseling supervisors: Standards for preparation and practice. *Journal of Counseling & Development, 69*(1), 27-29. https://doi.org/10.1002/j.1556-6676.1990.tb01449.x

Efstation, J. F., Patton, M. J., & Kardash, C. M. (1990). Measuring the working alliance in counselor supervision. *Journal of Counseling Psychology, 37*(3), 322-329. https://doi.org/10.1037/0022-0167.37.3.322

Ellis, M. V. (2010). Bridging the science and practice of clinical supervision: Some discoveries, some misconceptions. *The Clinical Supervisor, 29*(1), 95-116. https://doi.org/10.1080/07325221003741910

Ellis, M. V., Berger, L., Hanus, A. E., Ayala, E. E., Swords, B. A., & Siembor, M. (2014). Inadequate and harmful clinical supervision: testing a revised framework and assessing occurrence. *The Counseling Psychologist, 42*(4), 434-472. https://doi.org/10.1177/0011000013508656

Ellis, M. V., & Ladany, N. (1997). Inferences concerning supervisees and clients in clinical supervision: An integrative review. In C. E. Watkins Jr. (Ed.), *Handbook of psychotherapy supervision* (pp. 447–507). Wiley.

Falender, C. A. (2014). Clinical supervision in a competency-based era. *South African Journal of Psychology*, *44*(1), 6-17. https://doi.org/10.1177/0081246313516260

Falender, C. A., Cornish, J. A. E., Goodyear, R., Hatcher, R., Kaslow, N. J., Leventhal, G., et al. (2004). Defining competencies in psychology supervision: A consensus statement. *Journal of Clinical Psychology, 60*(1), 771–785. https://doi.org/10.1002/jclp.20013

Falender, C. A., & Shafranske, E. P. (2004). *Clinical supervision: A competency-based approach.* American Psychological Association.

Falender, C. A., & Shafranske, E. P. (2012). The importance of competency-based clinical supervision and training in the twenty-first century: Why bother? *Journal of Contemporary Psychotherapy, 42*, 129-137. http://doi.org/10.1007/s10879-011-9198-9

Falender, C.A., & Shafranske, E.P. (2017). *Supervision essentials for the practice of competency-based supervision.* American Psychological Association.

Falender, C. A., Shafranske, E. P., & Falicov, C. (Eds.). (2014). *Multiculturalism and diversity in clinical supervision: A Competency-based approach.* American Psychological Association.

Falender, C. A., Shafranske, E. P., & Ofek, A. (2014). Competent clinical supervision: Emerging effective practices. *Counselling Psychology Quarterly, 27*(4), 393-408. https://doi.org/10.1080/09515070.2014.934785

Fall, M., & Sutton Jr, J. M. (2003). Supervision of entry level licensed counselors: A descriptive study. *The Clinical Supervisor, 22*(2), 139-151. https://doi.org/10.1300/J001v22n02_09

Faul, F., Erdfelder, E., Buchner, A., & Lang, A. G. (2009). Statistical power analyses using G* Power 3.1: Tests for correlation and regression analyses. *Behavior Research Methods, 41*(4), 1149-1160. https://doi.org/10.3758/BRM.41.4.1149

Field, T. A., Ghoston, M., & McHugh, K. (2019). Requirements for supervisors of counselor licensure candidates in the United States. *Journal of Counselor Leadership and Advocacy, 6*(1), 55-70. https://doi.org/10.1080/2326716X.2018.1489315

Friedlander, M. L. (2015). Use of relational strategies to repair alliance ruptures: How responsive supervisors train responsive psychotherapists. *Psychotherapy, 52*(2), 174–179. https://doi.org/10.1037/a0037044

Gibson, D. M., Dollarhide, C. T., & Moss, J. M. (2010). Professional identity development: A grounded theory of transformational tasks of new counselors. *Counselor Education and Supervision, 50*(1), 21-38. https://doi.org/10.1002/j.1556-6978.2010.tb00106.x

Gonsalvez, C. J., Hamid, G., Savage, N. M., & Livni, D. (2017). The supervision evaluation and supervisory competence scale: Psychometric validation. *Australian Psychologist, 52*(2), 94-103. https://doi.org/10.1111/ap.12269

Goodyear, R. K. (2014). Supervision as pedagogy: Attending to its essential instructional and learning processes. *The Clinical Supervisor, 33*(1), 82-99. https://doi.org/10.1080/07325223.2014.918914

Goodyear, R. K., & Bernard, J. M. (1998). Clinical supervision: Lessons from the literature. *Counselor Education and Supervision, 38*(1), 6-22. https://doi.org/10.1002/j.1556-6978.1998.tb00553.x

Goodyear, R. K., & Guzzardo, C. R. (2000). Psychotherapy supervision and training. In S. D. Brown & R. W. Lent (Eds.), *Handbook of counseling psychology* (3rd ed., pp. 83–108). Wiley.

Gray, L. A., Ladany, N., Walker, J. A., & Ancis, J. R. (2001). Psychotherapy trainees' experience of counterproductive events in supervision. *Journal of Counseling Psychology, 48*(4), 371-383. https://doi.org/10.1037/0022-0167.48.4.371

Granello, D. H., Kindsvatter, A., Granello, P. F., Underfer-Babalis, J., & Moorhead, H. J. H. (2008). Multiple perspectives in supervision: Using a peer consultation model

to enhance supervisor development. *Counselor Education and Supervision, 48*(1), 32-47. https://doi.org/10.1002/j.1556-6978.2008.tb00060.x

Hamilton, S. J., Briggs, L., Peterson, E. E., Slattery, M., & O'Donovan, A. (2022). Supporting conscious competency: Validation of the Generic Supervision Assessment Tool (GSAT). *Psychology and Psychotherapy: Theory, Research and Practice, 95*(1), 113-136. https://doi.org/10.1111/papt.12369

Hartley, D., Ziller, E. C., Lambert, D., Loux, S. L., & Bird, D. C. (2002). *State licensure laws and the mental health professions: Implications for the rural mental health workforce.* Portland, ME: Maine Rural Health Research Center.

Henderson, D., McGrath, P. D., & Patton, M. A. (2016). Experience of clinical supervisors of international medical graduates in an Australian district hospital. *Australian Health Review, 41*(4), 365-371. https://doi.org/10.1071/AH15094

Henriksen, R. C., Henderson, S. E., Liang, Y., Watts, R. E., & Marks, D. F. (2019). Counselor supervision: A comparison across states and jurisdictions. *Journal of Counseling & Development, 97*(2), 160-170. https://doi.org/10.1002/jcad.12247

Henry, P. J., Hart, G. M., & Nance, D. W. (2004). Supervision topics as perceived by supervisors and supervisees. *The Clinical Supervisor, 23*(2), 139-152. https://doi.org/10.1300/J001v23n02_09

Herlihy, B., Gray, N., & McCollum, V. (2002). Legal and ethical issues in school counselor supervision. *Professional School Counseling, 6*(1), 55–60.

Hess, A. K. (1987). Psychotherapy supervision: Stages, Buber, and a theory of relationship. *Professional Psychology: Research and Practice, 18*(3), 251-259. https://doi.org/10.1037/0735-7028.18.3.251

Higgins, S. E., Veach, P. M., MacFarlane, I. M., Borders, L. D., LeRoy, B., & Callanan, N. (2013). Genetic counseling supervisor competencies: results of a Delphi study. *Journal of Genetic Counseling, 22*(1), 39-57. https://doi.org/10.1007/s10897-012-9512-z

Hill, C. E., & Knox, S. (2013). Training and supervision in psychotherapy. In M. J. Lambert (Ed.), *Bergin and Garfield's handbook of psychotherapy and behavior change* (6th ed., pp. 775– 812). Wiley.

Hillman, S. L., McPherson, R. H., Swank, P. R., & Watkins Jr, C. E. (1998). Further validation of the psychotherapy supervisor development scale. *The Clinical Supervisor, 17*(1), 17-32. https://doi.org/10.1300/J001v17n01_02

Hoffman, R. M. (2001). *Maximizing Internship Experiences for School Counselors-in-Training.* Washington, DC: Office of Educational Research and Improvement. (ERIC Document Reproduction Service No. ED454487)

Holcomb-McCoy, C., & Johnston, G. (2008). A content analysis of pre-service school counselors' evaluations of an urban practicum experience. *Journal of School Counseling, 6*(16), n16.

Holloway, E.L. (1995). *Clinical supervision: A systems approach.* Sage.

Holloway, E. L., & Neufeldt, S. A. (1995). Supervision: its contributions to treatment efficacy. *Journal of Consulting and Clinical Psychology, 63*(2), 207-213. https://doi.org/10.1037/0022-006X.63.2.207

Holstun, V. P., Wiggins, E. C., & Maldonado, J. M. (2019). Emerging leadership: Mental health counseling competencies for school counselor trainees. *Journal of School Counseling, 17*(25), n25. http:/www.jsc.montana.edu/articles/v17n25.pdf

Hughes, A., Galbraith, D., & White, D. (2011). Perceived competence: A common core for self-efficacy and self-concept?. *Journal of Personality Assessment, 93*(3), 278-289. https://doi.org/10.1080/00223891.2011.559390

IBM Corp. (2022). *IBM SPSS Statistics for Windows* (Version 29.0) [Computer software]. IBM Corp.

Ikonomopoulos, J., Vela, J. C., Smith, W., & Dell'Aquila, J. (2016). Examining the Practicum Experience to Increase Counseling Students' Self-Efficacy. *The Professional Counselor, 6*(2), 161–173. https://doi.org/10.15241/ji.6.2.161

Inman, A. G., Hutman, H., Pendse, A., Devdas, L., Luu, L., & Ellis, M. V. (2014). Current trends
concerning supervisors, supervisees, and clients in clinical supervision. In C. E. Watkins, Jr. & D. Milne (Eds.), *Wiley international handbook of clinical supervision* (pp. 61–102). Wiley. https://doi.org/10.1002/9781118846360

Jackson, C. M., Snow, B. M., Boes, S. R., Phillips, P. L., Stanard, R. P., Painter, L. C., & Wulff, M. B. (2002). Inducting the transformed school counselor into the

profession. *Theory into Practice*, *41*(3), 177-185. https://doi.org/10.1207/s15430421tip4103_6

Johnson, E., Baker, S. B., Kopala, M., Kiselica, M. S., & Thompson, E. C. (1989). Counseling self-efficacy and counseling competence in prepracticum training. *Counselor Education and Supervision, 28*(3), 205–218. https://doi.org/10.1002/j.1556-6978.1989.tb01109.x

Kavanagh, D. J. (2011). Training clinical psychologists: The current situation and a way forward [Editorial]. *Australian Psychologist*, *46*(2), 65–66. https://doi.org/10.1111/j.1742-9544.2011.00025.x

Kavanagh, D. J., Spence, S. H., Wilson, J., & Crow, N. (2002). Achieving effective supervision. *Drug and Alcohol Review*, *21*, 247–252. https://doi.org/10.1080/0959523021000002705

Keller-Dupree, E. A., Scott, C. N., Shannon, J. L., Durham, R. L., & Woltjer, A. (2020). In the gap: Peer support group experiences for post-graduate, pre-licensed counseling candidates. *Journal of Counselor Preparation and Supervision, 13*(3), Article 9. https://digitalcommons.sacredheart.edu/cgi/viewcontent.cgi?article=1386&context=jcps

Kemer, G., Li, C., Attia, M., Chan, C. D., Chung, M., Li, D., Colburn, A. N., Peters, H. C., Ramaswamy, A., & Sunal, Z. (2022). Multicultural supervision in counseling: A content analysis of peer-reviewed literature. *Counselor Education and Supervision, 61*(1), 2-14. https://doi.org/10.1002/ceas.12220

Killian, K. D. (2013). Differences making a difference: Cross-cultural interactions in supervisory relationships. In T. S. Zimmerman (Ed.), *Integrating gender and culture in family therapy training* (pp. 61-103). Routledge. https://doi.org/10.4324/9780203725269

Kozina, K., Grabovari, N., Stefano, J. D., & Drapeau, M. (2010). Measuring changes in counselor self-efficacy: Further validation and implications for training and supervision. *The Clinical Supervisor, 29*(2), 117-127. https://doi.org/10.1080/07325223.2010.517483

Kühne, F., Maas, J., Wiesenthal, S., & Weck, F. (2019). Empirical research in clinical supervision: a systematic review and suggestions for future studies. *BMC Psychology, 7*, Article 54. https://doi.org/10.1186/s40359-019-0327-7

Ladany, N., & Bradley, L. J. (Eds.). (2011). *Counselor supervision.* Routledge.

Ladany, N., Ellis, M. V., & Friedlander, M. L. (1999). The supervisory working alliance, trainee self-efficacy, and satisfaction. *Journal of Counseling & Development, 77*(4), 447-455. https://doi.org/10.1002/j.1556-6676.1999.tb02472.x

Lamprecht, L. M., & Pitre, S. (2018). Developing a pre-practicum environment for beginning counselors: Growing my counselor educator self. *The Journal of Counselor Preparation and Supervision, 11*(2), Article 3. https://digitalcommons.sacredheart.edu/jcps/vol11/iss2/3

Larson, L. M., & Daniels, J. A. (1998). Review of the counseling self-efficacy literature. *The Counseling Psychologist, 26*(2), 179–218. https://doi.org/10.1177/0011000098262001

Larson, L. M., Suzuki, L. A., Gillespie, K. N., Potenza, M. T., Bechtel, M. A., & Toulouse, A. L. (1992). Development and validation of the counseling self-estimate inventory. *Journal of Counseling Psychology, 39*(1), 105. https://doi.org/10.1037/0022-0167.39.1.105

Leach, M. M., Stoltenberg, C. D., McNeill, B. W., & Eichenfield, G. A. (1997). Self-efficacy and counselor development: Testing the integrated developmental model. *Counselor Education and Supervision, 37*(2), 115-124. https://doi.org/10.1002/j.1556-6978.1997.tb00537.x

Lent, R. W., Hill, C. E., & Hoffman, M. A. (2003). Development and validation of the Counselor Activity Self-Efficacy Scales. *Journal of Counseling Psychology, 50*(1), 97–108. https://doi.org/10.1037/0022-0167.50.1.97

Leddick, G. R., & Bernard, J. M. (1980). The history of supervision: A critical review. *Counselor Education and Supervision, 19*(3), 186-196. https://doi.org/10.1002/j.1556-6978.1980.tb00913.x

Lyon, R. E. C., & POTKAR, K. A. (2011). The supervisory relationship. In N. Ladany, & L. J. Bradley (Eds.), *Counselor supervision* (pp. 41-78). Routledge.

Magnuson, S., Norem, K., & Bradley, L. J. (2001). Supervising school counselors. In L. J. Bradley and N. Ladany (Eds.), *Counselor supervision: Principles, process, & practice* (3rd ed., pp. 207–221). Brunner–Routledge.

Martino, S., Ball, S., Nich, C., Frankforter, T. L., & Carroll, K. M. (2009). Correspondence of motivational enhancement treatment integrity ratings among therapists, supervisors, and observers. *Psychotherapy Research, 19*(2), 181-193. https://doi.org/10.1080/10503300802688460

Melchert, T. P., Hays, V. L., Wiljanen, L. M., & Kolocek, A. K. (1996). Testing models of counselor development with a measure of counseling self-efficacy. *Journal of Counseling & Development, 74*(6), 640-644. https://doi.org/10.1002/j.1556-6676.1996.tb02304.x

Menard, S. (2002). *Applied logistic regression analysis* (2nd ed.). Sage.

Merlin-Knoblich, C., & Chen, J. A. (2018). A survey of school counselor multicultural education behaviors and the obstacles that impede them. *Journal of School Counseling, 16*(22), 1–33.

Milne, D. (2007). An empirical definition of clinical supervision. *British Journal of Clinical Psychology, 46*(4), 437-447. https://doi.org/10.1348/014466507X197415

Milne, D. (2008). CBT supervision: from reflexivity to specialization. *Behavioural and Cognitive Psychotherapy, 36*(6), 779-786. https://doi.org/10.1017/S1352465808004773

Milne, D. L. (2009). *Evidence-based clinical supervision: Principles and practice.* John Wiley & Sons.

Milne, D. L., & James, I. A. (2002). The observed impact of training on competence in clinical supervision. *British Journal of Clinical Psychology, 41*(1), 55-72. https://doi.org/10.1348/014466502163796

Milne, D., Leck, C., James, I., Wilson, M., Procter, R., Ramm, L., & Weetman, J. (2012). High fidelity in clinical supervision research. In I. Fleming & L. Steen (Eds.), *Supervision and clinical psychology: Theory, practice, and perspectives* (2nd ed., pp.142–158). Routledge.

Milne, D. L., Sheikh, A. I., Pattison, S., & Wilkinson, A. (2011). Evidence-based training for clinical supervisors: A systematic review of 11 controlled studies. *The Clinical Supervisor, 30*(1), 53-71. https://doi.org/10.1080/07325223.2011.564955

Morrison, M. A., & Lent, R. W. (2018). The working alliance, beliefs about the supervisor, and counseling self-efficacy: Applying the relational efficacy model to counselor supervision. *Journal of Counseling Psychology, 65*(4), 512-522. https://doi.org/10.1037/cou0000267

Mullen, P.R., Uwamahoro, O., Blount, A.W., & Lambie, G.W. (2015). Development of counseling students' self-efficacy during their preparation program. *The Professional Counselor, 5*(1), 175-184. https://doi.org/10.15241/prm.5.1.175

Nate, R. D., & Haddock, L. R. (2014). An exploration of counselor supervisor requirements across the United States. *Ideas and research you can use: Vistas 2014*, Article 31. https://www.counseling.org/docs/default-source/vistas/article_31.pdf?sfvrsn=4ca07c2c_10

Nelson, M. L., Barnes, K. L., Evans, A. L., & Triggiano, P. J. (2008). Working with conflict in clinical supervision: Wise supervisors' perspectives. *Journal of Counseling Psychology, 55*(2), 172–184. https://doi.org/10.1037/0022-0167.55.2.172

Nunnally, J. C. (1978). *Psychometric theory* (2nd ed.). McGraw-Hill.

O'Byrne, K., & Rosenberg, J. I. (1998). The practice of supervision: A sociocultural perspective. *Counselor Education and Supervision, 38*(1), 34–42. https://doi.org/10.1002/j.1556-6978.1998.tb00555.x

Olds, K., & Hawkins, R. (2014). Precursors to measuring outcomes in clinical supervision: A thematic analysis. *Training and Education in Professional Psychology*, *8*(3), 158. https://doi.org/10.1037/tep0000034

Olk, M. E., & Friedlander, M. L. (1992). Trainees' experiences of role conflict and role ambiguity in supervisory relationships. *Journal of Counseling Psychology*, *39*(3), 389-397. https:// doi.org/10.1037/0022-0167.39.3.389

Osborne, J. W., & Waters, E. (2019). Four assumptions of multiple regression that researchers should always test. *Practical Assessment, Research, and Evaluation, 8*(1), Article 2. https://doi.org/10.7275/r222-hv23

Page, B. J., Pietrzak, D. R., & Sutton Jr, J. M. (2001). National survey of school counselor supervision. *Counselor Education and Supervision, 41*(2), 142-150. https://doi.org/10.1002/j.1556-6978.2001.tb01278.x

Palomo, M., Beinart, H., & Cooper, M. J. (2010). Development and validation of the supervisory relationship questionnaire (SRQ) in UK trainee clinical psychologists. *British Journal of Clinical Psychology, 49*(2), 131-149. https://doi.org/10.1348/014466509X441033

Peake, T. H., Nussbaum, B. D., & Tindell, S. D. (2002). Clinical and counseling supervision references: Trends and needs. *Psychotherapy: Theory, Research, Practice, Training, 39*(1), 114–125. https://doi.org/10.1037/0033-3204.39.1.114

Pearson, Q. M. (2004). Getting the most out of clinical supervision: Strategies for mental health. *Journal of Mental Health Counseling*, *26*(4), 361-373. https://doi.org/10.17744/mehc.26.4.tttju8539ke8xuq6

Pedhazur, E. J., & Schmelkin, L. P. (2013). *Measurement, design, and analysis: An integrated approach*. Psychology Press. https://doi.org/10.4324/9780203726389

Peed, T. (2017). *School counselor clinical supervision: An exploration of relationships between supervision training, professional experience, professional identity, and site supervisor self-efficacy* (Publication No. 10606153) [Doctoral dissertation, Northern Illinois University]. ProQuest Dissertation Publishing. https://www.proquest.com/openview/e21e14b3cc4e5edf98a73da7f442357a/1?pq-origsite=gscholar&cbl=18750&diss=y

Person, M., Garner, C., Ghoston, M., & Petersen, C. (2020). Counselor professional identity development in CACREP and non-CACREP accredited programs. *Journal of Counselor Preparation and Supervision, 13*(1), Article 7. http://dx.doi.org/10.7729/131.1335

Ramos-Sánchez, L., Esnil, E., Goodwin, A., Riggs, S., Touster, L., Wright, L.K., Ratanasiripong, P., & Rodolfa, E. (2002). Negative supervisory events: Effects on supervision and supervisory alliance. *Professional Psychology: Research and Practice, 33*(2), 197-202. https://doi.org/10.1037/0735-7028.33.2.197

Rapisarda, C. A., Desmond, K. J., & Nelson, J. R. (2011). Student reflections on the journey to being a supervisor. *The Clinical Supervisor, 30*(1), 109-123. https://doi.org/10.1080/07325223.2011.564958

Reiser, R. P., & Milne, D. L. (2014). A systematic review and reformulation of outcome evaluation in clinical supervision: Applying the fidelity framework. *Training and Education in Professional Psychology*, *8*(3), 149-157. https://doi.org/10.1037/tep0000031

Rigazio-DiGilio, S. A. (1994). A co-constructive-developmental approach to ecosystemic treatment. *Journal of Mental Health Counseling, 16*(1), 43–74.

Rodenhauser, P. (1992). Psychiatry residency programs: trend in psychotherapy supervision. *American Journal of Psychotherapy*, *46*(2), 240-249. https://doi.org/10.1176/appi.psychotherapy.1992.46.2.240

Selya, A. S., Rose, J. S., Dierker, L. C., Hedeker, D., & Mermelstein, R. J. (2012). A practical guide to calculating Cohen's f^2, a measure of local effect size, from PROC MIXED. *Frontiers in Psychology, 3,* Article 111. https://doi.org/10.3389/fpsyg.2012.00111

Shallcross, L. (2013). Unmistaken identity. *Counseling Today, 55*(9), 28-37.

Smith, K. L. (2009). *A brief summary of supervision models.* https://citeseerx.ist.psu.edu/document?repid=rep1&type=pdf&doi=240f83cb62c2bd9c84d795d6c8b8f89f2a83bb7d

Soheilian, S. S., Inman, A. G., Klinger, R. S., Isenberg, D. S., & Kulp, L. E. (2014). Multicultural supervision: Supervisees' reflections on culturally competent

supervision. *Counselling Psychology Quarterly*, *27*(4), 379-392. https://doi.org/10.1080/09515070.2014.961408

Stevens, D. T., Goodyear, R. K., & Robertson, P. (1998). Supervisor development: An exploratory study in changes in stance and emphasis. *The Clinical Supervisor, 16*(2), 73–88. https://doi.org/10.1300/J001v16n02_05

Stoltenberg, C. D. (2005). Enhancing professional competence through developmental approaches to supervision. *American Psychologist, 60*(8), 857-864. https://doi.org/10.1037/0003-066X.60.8.85

Stoltenberg, C. D., McNeill, B. W., & Crethar, H. C. (1994). Changes in supervision as counselors and therapists gain experience: A review. *Professional Psychology: Research and Practice, 25*(4), 416–449. https://doi.org/10.1037/0735-7028.25.4.416

Studer, J. R., & Oberman, A. (2006). The use of the ASCA National Model® in supervision. *Professional School Counseling, 10*(1), 2156759X0601000102.

Sutton, J. M., & Page, B. J. (1994). Post-Degree Clinical Supervision of School Counselors. *The School Counselor, 42*(1), 32–39. http://www.jstor.org/stable/23901709

Tang, A. (2020). The impact of school counseling supervision on practicing school counselors' self-efficacy in building a comprehensive school counseling program. *Professional School Counseling, 23*(1), 2156759X20947723. https://doi.org/10.1177/2156759X20947723

Tang, M., Addison, K. D., LaSure-Bryant, D., Norman, R., O'Connell, W., & Stewart-Sicking, J. A. (2004). Factors that influence self-efficacy of counseling students: An exploratory study. *Counselor Education and Supervision, 44*(1), 70-80. https://doi.org/10.1002/j.1556-6978.2004.tb01861.x

Tompkins, M. A. (2013). Enhancing self-efficacy to achieve competence. *Journal of Cognitive Psychotherapy, 27*(1), 71-80. https://doi.org/10.1891/0889-8391.27.1.71

Uellendahl, G. E., & Tenenbaum, M. N. (2015). Supervision training, practices, and interests of California site supervisors. *Counselor Education and Supervision, 54*(4), 274-287. https://doi.org/10.1002/ceas.12026

Vidlak, N. W. (2002). *Identifying important factors in supervisor development: An examination of supervisor experience, training, and attributes* (Publish No. 3055295) [Doctoral dissertation, The University of Nebraska-Lincoln]. ProQuest Dissertation Publishing. https://www.proquest.com/openview/aab3864d10e9e89dc50e1481f0e8eed2/1?pq-origsite=gscholar&cbl=18750&diss=y

Vygotsky, L. S. (1986). *Thought and Language.* Cambridge.

Walfish, S., McAlister, B., O'Donnell, P., & Lambert, M. J. (2012). An investigation of self-assessment bias in mental health providers. *Psychological Reports, 110*(2), 639-644. https://doi:10.2466/02.07.17.PR0.110.2.639-644

Walsh-Rock, V. J. (2018). *Exploring the clinical supervision experiences of school counselors: Perceptions of counseling skills and professional identity.* Northern Illinois University

Wambu, G. W., & Myers, C. E. (2019). School counselor site supervisors' perceptions of preparedness and training needs. *Journal of School Counseling*, *17*(14), n14. https://files.eric.ed.gov/fulltext/EJ1217460.pdf

Watkins, C. E., Jr. (1990). Development of the psychotherapy supervisor. *Psychotherapy: Theory, Research, Practice, Training, 27*(4), 553–560. https://doi.org/10.1037/0033-3204.27.4.553

Watkins Jr, C. E. (1993). Development of the psychotherapy supervisor: Concepts, assumptions, and hypotheses of the supervisor complexity model. *American Journal of Psychotherapy*, *47*(1), 58-74. https://doi.org/10.1176/appi.psychotherapy.1993.47.1.58

Watkins, C. E. Jr. (1995). Psychotherapy supervision in the 1990s: Some observations and reflections. *American Journal of Psychotherapy*, *49*(4), 568-581. https://doi:10.1176/appi.psychotherapy.1995.49.4.568

Watkins, C. E. (Ed.). (1997). *Handbook of psychotherapy supervision.* Wiley.

Watkins Jr, C. E. (1998). Psychotherapy supervision in the 21st century: Some pressing needs and impressing possibilities. *The Journal of Psychotherapy Practice and Research*, 7(2), 93-101.

Watkins, C. E., Jr. (2013). The contemporary practice of effective psychoanalytic supervision. *Psychoanalytic Psychology, 30*(2), 300–328. https://doi.org/10.1037/a0030896.

Watkins, C. E. Jr. (2014). Clinical supervision in the 21st century: Revisiting pressing needs and impressing possibilities. *American Journal of Psychotherapy*, *68*(2), 251-272. https://doi:10.1176/appi.psychotherapy.2014.68.2.251

Watkins, C. E. Jr. (2018). The generic model of psychotherapy supervision: An analogized research-informing meta-theory. *Journal of Psychotherapy Integration, 28*(4), 521-536. https://doi:10.1037/int0000114

Watkins, C. E. Jr., Schneider, L. J., Hayes, J., & Nieberding, R. (1995). Measuring psychotherapy supervisor development: An initial effort at scale development and validation. *The Clinical Supervisor, 13*(1), 77-90. https://doi.org/10.1300/J001v13n01_06

Watkins Jr, C. E., & Scaturo, D. J. (2013). Toward an integrative, learning-based model of psychotherapy supervision: Supervisory alliance, educational interventions, and supervisee learning/relearning. *Journal of Psychotherapy Integration, 23*(1), 75-95. https://doi.org/10.1037/a0031330

Watson, D. P. (1992). *Counseling self-efficacy and counseling competence: A comparative study of clergy and counselors-in-training* (Publication No. 9314098) [Doctoral dissertation, Purdue University]. ProQuest Dissertations & Theses Global.

Whitman, S. M. & Jacob, E. G. (1998). Responsibilities of the psychotherapy supervision. *American Journal of Psychotherapy, 52*(2), 166-175. https://doi.org/10.1176/appi.psychotherapy.1998.52.2.166

Williams, L. (1994). A tool for training supervisors: Using the supervision feedback form (SFF). *Journal of Marital and Family Therapy, 20*(3), 311-315. https://doi.org/10.1111/j.1752-0606.1994.tb00119.x

Wilson, H. M., Davies, J. S., & Weatherhead, S. (2016). Trainee therapists' experiences of supervision during training: A meta-synthesis. *Clinical Psychology & Psychotherapy, 23*(4), 340-351. https://doi.org/10.1002/cpp.1957

Woodside, M., Oberman, A. H., Cole, K. G., & Carruth, E. K. (2007). Learning to be a counselor: A prepracticum point of view. *Counselor Education and Supervision*, *47*(1), 14-28. https://doi.org/10.1002/j.1556-6978.2007.tb00035.x

Worthington Jr, E. L. (2006). Changes in supervision as counselors and supervisors gain experience: A review. *Training and Education in Professional Psychology, S*(2), 133–160. https://doi.org/10.1037/1931-3918.S.2.133

Zimmerman, T. S., & Castronova, M. (2021). Intersectionality in training and supervision. In J. Logan, B. van Eeden-Moorefield, & S. Browning (Eds.), *Constructing authentic relationships in clinical practice: Working at the intersection of therapist and client identities* (pp. 133-144). Routledge. https://doi.org/10.4324/9781003011699

Appendix A: IRB Approval Letter

April 12, 2023

Re: IRB Proposal [2025987-4] Holistic Assessment of Counseling Self-Efficacy of Counselor in Training from a Regression Model
Review Level: Exempt (Level I)

Congratulations! Your Institutional Review Board (IRB) Proposal has been approved as of April 12, 2023.

Please remember that research involving human subjects under the purview of the IRB should adhere to the most current COVID-19 guidelines available, as set by MSU, Mankato and the Minnesota Department of Health.

On behalf of the Minnesota State University, Mankato IRB, we wish you success with your study. Please remember that you must seek approval for any changes in your study, its design, funding source, consent process, or any part of the study that may affect participants in the study (https://research.mnsu.edu/institutional-review-board/proposals/process/proposal-revision/).

Should any of the participants in your study suffer a research-related injury or other harmful outcomes, you are required to report them immediately to the Associate Vice-President for Research and Dean of Extended Campus at 507-389-1242.

When you complete your data collection or should you discontinue your study, you must submit a Closure request. All documents related to this research must be stored for a minimum of three years following the date on your Closure request (https://research.mnsu.edu/institutional-review-board/proposals/process/proposal-closure/).

If the PI leaves the university before the end of the 3-year timeline, he/she is responsible for ensuring proper storage of consent forms (https://research.mnsu.edu/institutional-review-board/proposals/process/leaving-campus/). Please include your IRBNet ID number with any correspondence with the IRB.

Be well,

Jeffrey Buchanan, Ph.D.
Co-Chair of the IRB

Chelsea Mead, Ph.D.
Co-Chair of the IRB

Jason A. Kaufman, Ph.D., Ed.D.
Director of the IRB

Appendix B: PSDS/PSDS-S

PSDS/*PSDS-S*

1. I consider the supervision that I provided to be helpful to my supervisees. *1. My supervisor provides helpful supervision.*
2. Becoming and being a supervisor demands a commitment that I believe I have made. *2. My supervisor makes a committed effort to be a supervisor.*
3. Becoming a supervisor is an ongoing process that requires much time and energy, but I see myself as well on the way to getting there. *3. My supervisor appears to invest time and energy in their development as a supervisor.*
4. I have a realistic awareness about my limitations and weakness as a supervisor. *4. My supervisor appears to have a realistic awareness about their own limitations and weaknesses as a supervisor.*
5. Sometimes I believe I'm just playing at being a supervisor. *5. My supervisor lacks understanding of their supervisor role.*
6. If, asked "Do you really feel like a psychotherapy/counseling supervisor?" I could honestly answer "yes". *6. My supervisor appears confident in their role as a counseling supervisor in supervision sessions.*
7. I believe I am able to increasingly foster a sense of self-sufficiency in my supervisees. *7. My supervisor increasingly fosters a sense of self-sufficiency in me.*
8. I consider supervision to be a very important role that I perform. *8. My supervisor considers supervision to be a very important role.*
9. If asked "can you give a good assessment of yourself as a supervisor" I can honestly answer "yes". *9. My supervisor is a competent supervisor.*
10. I have a realistic awareness about my strengths and ability as a supervisor. *10. My supervisor appears to have a realistic awareness about their own strengths and abilities as a supervisor.*
11. Right now, I feel ill-at-ease and somewhat confused with the supervisor role. (reverse coding) *11. My supervisor appears to feel uncomfortable and somewhat confused with the supervisor role.*
12. I must say that, when I perform supervisory responsibilities, I often think of myself as an imposter. *12. My supervisor does not appear to be confident when performing supervisory responsibilities.*
13. I believe I am generally effective in dealing with transference/countertransference issues in supervision. *13. My supervisor is effective in dealing with transference/countertransference issues in supervision.*

14. I believe I have a good awareness about myself as a supervisor, the impact I have on supervisee, and how I affect the supervisory situation as a whole. *14. My supervisor appears to have a good awareness about the supervisor role, the impact they have on me, and the effects on the supervisory situation as a whole.*
15. I believe I have a good knowledge of and understanding about the supervision process itself. *15. My supervisor appears to have a good knowledge of and understanding about the supervision process itself.*
16. As a supervisor, I structure the supervision experience effectively. *16. My supervisor structures the supervision experience effectively.*
17. When needed, I am able to be appropriately assertive and confrontive with my supervisees *17. When needed, my supervisor can be appropriately assertive and challenge me.*
18. I just don't consider myself that identified with supervisor role. *18. My supervisor appears to not identify with supervisor role.*

Appendix C: Demographic Questionnaire

Demographic Questionnaire

1. My program is a CACREP program.

_____ Yes

_____ No

_____ Not sure

2. Track of focus

_____ School counseling

_____ Clinic mental health counseling

3. Currently enrolled in

_____ Practicum

_____ Internship

4. Please answer following questions to the best of your knowledge

Age: _____

5. The state of your program is

_____

6. Total direct **client/student contact hours** completed (including practicum and internship):

_____

7. I have weekly/bi-weekly supervision with my current site supervisor(s)

_____ Yes

_____ No

8. Total hours of clinical supervision completed with my site supervisor(s) (including practicum and internship):

_____

9. My clinical supervisor's credential(s) (mark all that apply)

_____ LPC/LCPC, LPCC

_____ LPC-S

_____ School counselor

_____ Not sure

_____ others, please identify: _____

_____ Prefer not to answer

Wilcox et al., (2022) studied multicultural orientation in clinical supervision; they indicated that
a consistency of identity between clinical supervisor and supervisee will affect the effectiveness
of clinical supervision and development of multicultural competency of both supervisor and
supervisee. Your answers of the following questions will add to the understanding on this topic.

10. How do you describe your racial/ethnic identities?

_____

Others, please identify: _____

11. My supervisor allows space for discussions of racial and ethnic identities in our supervision

_____ Yes

_____ No

_____ Not sure

_____ choose to not answer

12. My Gender Identity

13. My supervisor allows space for discussions of gender identities in our supervision_____ Yes

_____ No

_____ Not sure

_____ choose to not answer

14. how do you describe your sexual orientation

Others, please identify: _____

15. My supervisor allows space for discussions of sexual orientation in our supervision

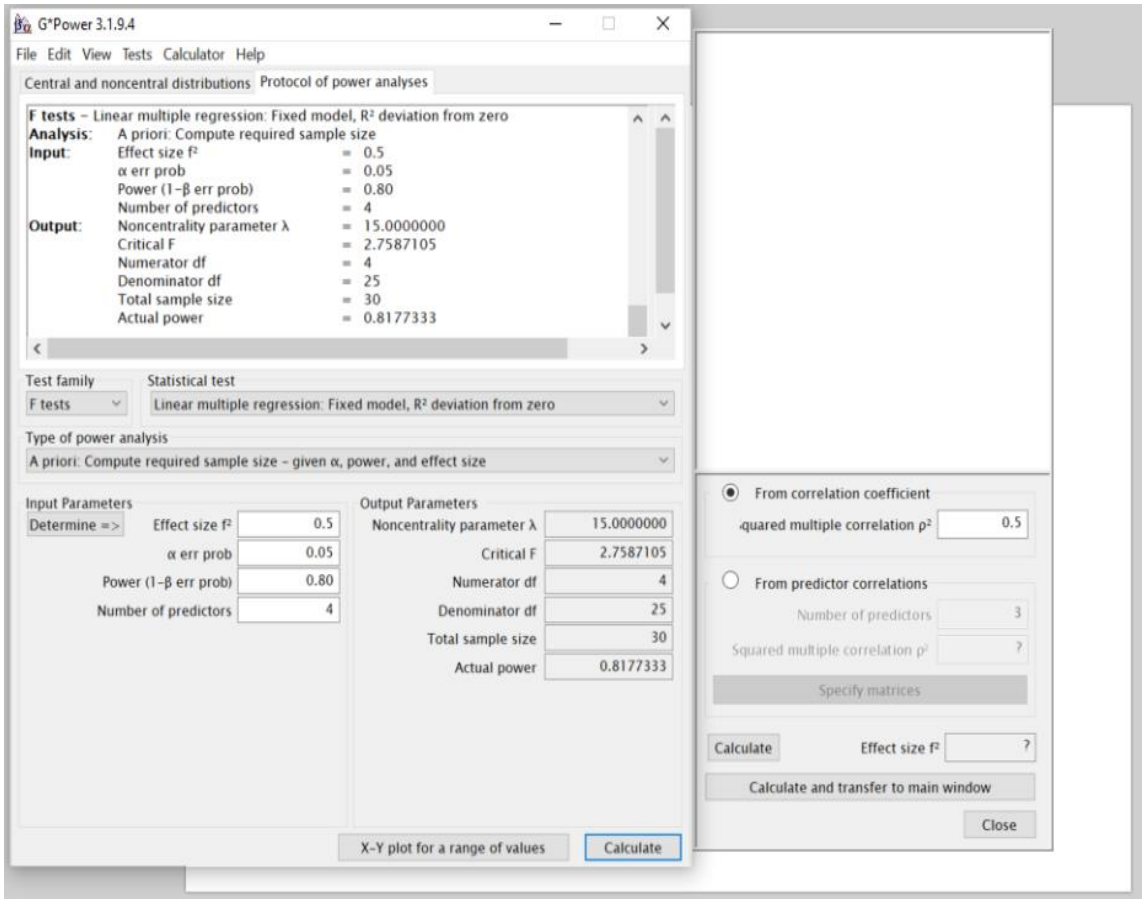
_____ Yes

_____ No

_____ Not sure

_____ choose to not answer

Appendix D: A Priori Power Analysis Using G *Power


G*Power 3.1.9.4
File Edit View Tests Calculator Help
Central and noncentral distributions
Protocol of power analyses
F tests – Linear multiple regression: Fixed model, R² deviation from zero
Analysis: A priori: Compute required sample size
Input: Effect size f² = 0.5
α err prob = 0.05
Power (1–β err prob) = 0.80
Number of predictors = 4
Output: Noncentrality parameter λ = 15.0000000
Critical F = 2.7587105
Numerator df = 4
Denominator df = 25
Total sample size = 30
Actual power = 0.8177333
Test family
F tests
Statistical test
Linear multiple regression: Fixed model, R² deviation from zero
Type of power analysis
A priori: Compute required sample size – given α, power, and effect size
Input Parameters
Determine =>
Effect size f² 0.5
α err prob 0.05
Power (1–β err prob) 0.80
Number of predictors 4
Output Parameters
Noncentrality parameter λ 15.0000000
Critical F 2.7587105
Numerator df 4
Denominator df 25
Total sample size 30
Actual power 0.8177333
X-Y plot for a range of values
Calculate
From correlation coefficient
quared multiple correlation ρ² 0.5
From predictor correlations
Number of predictors 3
Squared multiple correlation ρ² ?
Specify matrices
Calculate
Effect size f² ?
Calculate and transfer to main window
Close