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Evaluation of the Veteran Resilience Project

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EVALUATION OF THE VETERAN RESILIENCE PROJECT

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ABSTRACT

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Posttraumatic Stress Disorder (PTSD) is a daunting concern among the majority of organizations with diverse, or tangential, affiliations to the United States Military and/or its personnel. Unquestionably, the 21 million service-connected individuals, at the time of this writing, (i.e., Active-Duty, Reserve, National Guard, and Veterans) afflicted with this disorder are the catalyst for the intense public and private sector interest and involvement in eradication of this disorder. Prevalence rates of PTSD among this complex classification of persons vary across the relevant literature. Some estimates suggest anywhere from 11 to 20 percent, while other sources indicate that upwards of 40 percent of some military service-connected populations (i.e., those who served in Operation Enduring Freedom [OEF], Operation Iraqi Freedom [OIF], and Operation New Dawn as well as less publicized military actions which have taken place within the same timeframe) demonstrate PTSD or other related mental health disorders. Given the high PTSD prevalence demonstrated among service-connected populations, effective, practical, and accessible treatment of PTSD among this contingent is a primary and salient area of exploration both clinically and empirically. Relevant to this, the Veteran Resilience Project (VRP) of Minnesota utilizes Eye Movement Desensitization and Reprocessing (EMDR) as an intervention to treat veterans with PTSD. Thus, the organization contracted this program evaluator to undertake a program evaluation of their nonprofit organization. The association utilizes Eye Movement Desensitization and Reprocessing (EMDR) as a therapeutic intervention due to their

belief that it is the most efficacious treatment for PTSD. Along with the comprehensive

evaluation of their program and the establishment of proof of efficacy for their interventions of

choice, EMDR, the VRP seeks to increase their capacity through the recruitment of military

service-connected clients and retention of treating therapists. Therefore, the achievement of

these objects occurs through an implementation program evaluation dissertation, based on both

qualitative (i.e., using survey and interview methodologies) and quantitative data (i.e., analyzing

accessible collected data from a sample of service-connected clients who had previously utilized

services at the VRP). As a part of the program evaluation, the data were used to inform specific

recommendations thus refining ameliorative procedures. This dissertation is available in open

access at AURA, http://aura.antioch.edu/ and Ohio Link ETD Center,

https://etd.ohiolink.edu/etd.

Keywords: PTSD, EMDR, veterans, program evaluation

Dedication

To my father, who has always put his role of protector above all things.

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Over the past eight years, I have received support and encouragement from a great number of individuals; however, I would like to acknowledge the following individuals in particular. Katherine Weissbourd, Ph.D., has been a mentor and friend. Her presence has helped to form a thoughtful and rewarding doctoral journey. I would also like to thank my editor. A special thank you to my dissertation committee, comprised of Jude Bergkamp, Psy.D., Bill Heusler, Psy.D., and Joseph Graca, Ph.D. for their support over the past four years as I have moved from a concept to a completed exposition. In addition, I would like to give a naval salute to Mark Russell, Ph.D. (CDR retired) for connecting me with the subject of my dissertation and CDR John Petrescu, my friend who kept me afloat in rough seas. Thank you all for sharing this experience with me and for your understanding.

I would also like to acknowledge the involvement of the Veteran Resilience Project in this program evaluation and dissertation. Qualitative and quantitative data were collected on treatment participants from the Veteran Resilience Project in Minnesota. Additionally, partial funding for the program evaluation and dissertation was provided through a research grant via the Veteran Resilience Project.

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Executive Summary

At the time of this writing, the War in Afghanistan has lasted approximately 16 years and five months and is approaching the length of the Vietnam War which lasted for 17 years and four months. This is the most protracted and most expensive war in U.S. History (Fair, 2018; See Appendix A, Figure 1, Item a). The addition of the war in Iraq marks the first time that America has fought two simultaneous, large-scale wars in the Middle East (Hook & Spanier, 2018). Undoubtedly, the result of armed conflict on this level is war-related trauma to an unprecedented magnitude. In response to this, the U.S. Government engaged in the immense undertaking of treating distress-burdened personnel in the form of a one-of-a-kind healthcare system in both size and operation. Despite this effort, there is a distinct deficiency of treatment acquisition in active, auxiliary, and past military personnel, as well as an air of stigma surrounding the diagnosis of war-related trauma in this cohort.

With the preceding in mind, this project takes an in-depth look at one service agency that could illuminate the broader dynamics of need and service implementation. In this regard, this paper will identify the recipients of their care model, the organizational treatment philosophy, and the agency's requirements for increasing capacity. The project employs program evaluation as a systematic method for collecting and analyzing both contemporary and historical data to examine the efficacy and competence of the organization. Therefore, the program evaluation methods involved in scrutinizing treatment methods found to be useful in other health services contribute to continuous program improvement in the precedent effort. The hope is that this enterprise model becomes an exemplar for other projects of this type.

Dissertation Overview

This dissertation describes the process of performing a program evaluation for a veteran

nonprofit organization (NPO) in the state of Minnesota (See Appendix A, Figure 1, Item b).

Chapter I presents an assessment of social needs, or the reasons for the program's creation (See

Appendix A, Figure 1, Item c). This chapter opens with an examination of the effects on and

corresponding prevalence rates of individuals who have Posttraumatic Stress Disorder (PTSD).

The scope of the research is focused on those who currently serve or have served previously in

the military, in its necessary forms, during two wars with three major military operations;

Afghanistan: Operation Enduring Freedom (OEF) 2001-TBD (See Appendix A, Figure 1, Item

d), Iraq: Operation Iraqi Freedom (OIF) 2003-2010, and Iraq: Operation New Dawn (OND)

2010-TBD (known previously as OIF until September 2010; LeMire & Mulvihill, 2017; Torreon,

2015). Within this document, the terms OEF and OIF will be used for consistency unless OND

is used directly in specific literature.

   The following is a description of the current systems of care available to active duty

service members, National Guard (See Appendix A, Figure 1, Item e), Reserve, and veterans no

longer serving. Next, the paper will explore various evidence-based treatments accessible to this

body within the mental health system. Also described are the barriers to care faced by armed

forces members and retirees on the national home front. The focus of the program evaluation is

a Minnesota program called the Veteran Resilience Project (VRP), which is introduced in the

first chapter, including its history, mission, and context. Finally, the introduction concludes with

an examination of the theoretical framework for the program evaluation as well as the evaluation

questions generated by the NPO to achieve dynamic efficiency improvements.

   In the second chapter, a review of related literature will provide the groundwork for an

organized study of the following three evaluation questions (See Appendix B, Table 1):

   1) What are efficient approaches to recruit veterans for treatment? (See Appendix A,

Figure 1, item f)

2) What are efficient strategies for retaining treating therapists?

3) What is the efficacy of the Eye Movement Desensitization and Reprocessing (EMDR)

therapy employed by the Veteran Resilience Project of Minnesota?

Chapter III outlines the methodology and procedures used to evaluate the program in a

systematic fashion. The primary objective of the section is to assure the replicability of these

methodological practices through thorough explanation. Therefore, a narrative chain will detail

the project from conception and development through completion, beginning with the expedited

review process implemented by the Institutional Review Board (See Appendix A, Figure 1, Item

g). Then, an account is provided of the process of conducting onsite interviews with VPR staff

and management regarding review of the program's theory via the creation of a preliminary

Logic Model (See Appendix B, Figure 1) together with the program evaluation's Master Plan

(See Appendix B, Figures 2, 3, and 4). Next, this section presents the transcripts of telephone

and email interviews conducted with VRP therapists and their corresponding response rates.

These dialogues were to gather the staff therapists' views on the efficacy of the VRP's strategies

for the retention of therapists. Later, treatment outcome data received from the project are

presented and reviewed to determine whether the EMDR treatments administered by VRP are

effective. Additionally, the results of interviews conducted by the VRP are presented,

concentrating on whether clients felt that the program was effective. Finally, the results of

additional interviews, likewise conducted by the VRP, are presented to assemble data on long-

term PTSD symptom alleviation and program effectiveness.

Chapter IV presents the main findings of the above-described research along with an

account of the strengths and weaknesses of data relative to the program evaluation questions.

The results chapter also includes an evaluation of any difficulties encountered in collecting and analyzing data, together with an assessment of how barriers and dilemmas were addressed.

Lastly, Chapter V presents an overall appraisal of the evaluation and suggestions for future research, thus, situating the evaluation findings within the larger theoretical/policy discussion of the literature review.

Chapter I: Introduction

Diagnostic Classification for Posttraumatic Stress Disorder

The anxiety disorder referred to as Posttraumatic Stress Disorder (PTSD) initially made its formal arrival as a psychiatric disorder in the third edition of the Diagnostic and Statistical Manual of Mental Disorders (DSM [See Appendix A, Figure 1, Item h]; American Psychiatric Association [APA; See Appendix A, Figure 1, Item i], 1980). Since its institution, however, the disorder has been reclassified as one of several trauma- or stressor-related disorders within the DSM, Fifth Edition (DSM 5). Per the DSM 5, diagnosing an individual with PTSD requires the establishment of several clinical criteria (APA, 2013). The initial criteria for diagnosing PTSD is outlined in Table 2 (See Appendix B).

PTSD Among Military Personnel and Veterans

Exposure to trauma is a primary risk factor for mental health problems in combat settings (Albright & Thyer, 2010a). United States (U.S.) Military service members are at a higher risk for PTSD than the general population (Kang & Bullman, 2008; Tsai, Whealin, & Pietrzak, 2014), as military activities regularly place them in settings which present a high risk for exposure to violent trauma (Albright & Thyer, 2010a). Posttraumatic stress disorder is a potentially incapacitating anxiety disorder initiated by exposure to a traumatic occurrence (APA, 2013). This disorder commonly occurs among veterans of war and is often persistent,

debilitating, and strongly associated with the amount of combat exposure an individual has experienced (Atkinson, Guetz, & Wein, 2009). Consequently, it is the most frequently diagnosed mental disorder among OEF and OIF veterans seeking health care from the U.S. Department of Veterans Affairs (U.S. Department of Veterans Affairs, n.d.-c; See Appendix A, Figure 1, item j; Jakupcak et al., 2009). Left untreated, military-related PTSD often follows a chronic course, resulting in lifelong dysfunction (Steenkamp, Litz, Hoge, & Marmar, 2015).

Inclusive estimates encompassing service-connected individuals during the OEF/OIF conflict period, since America's engagement in the post-September 11 "War on Terrorism," are daunting. The overall U.S. population of service-connected personnel is estimated at 21.4 million veterans, consisting of those who have separated from all components of the military and are living countrywide (Bruyere, VanLooy, von Schrader, & Barrington, 2016). An additional 1.34 million military service members are on active duty (Defense Manpower Data Center, 2016). And, another 2.2 million service members identify as active National Guard/Reserve personnel. This means that veteran and military populations are considerable. According to recent estimates, approximately 7.3 percent of Americans have served in the military. Estimates surrounding PTSD exposure appear proportionately intimidating. Overall, approximately 27 percent of those mobilized to combat operations have deployed more than once (Sayer et al., 2010; Tanielian, Batka, & Meredith, 2017; Wells et al., 2010). The Department of Veteran Affairs (2009) reported that since 2002, it had diagnosed 178,483 of OEF/OIF veterans with a possible mental health disorder and approximately 92,998 veterans with a probable diagnosis of PTSD. These results overlapped with claims presented by the Institute of Medicine (IOM [See Appendix A, Figure 1, Item k], 2012) that 13 to 20 percent of the estimated 2.6 million U.S. service personnel who served in the OEF/OIF conflict zones demonstrated PTSD. As of 2012,

there is an estimated total between 338,000 and 520,000 service-connected personnel. Given the amount of service-connected or previously service-connected individuals, and the estimated prevalence of PTSD, we begin to examine the weight of addressing the war-stress phenomenon.

Exact data on the extent of the problem is elusive. Approximately 16 percent of active soldiers screen positive for PTSD, and approximately 24.5 percent of National Guard and Reserve soldiers screen positive as well (Gates et al., 2012; Milliken, Auchterlonie, & Hoge, 2007). Meanwhile, the U.S. Government Accountability Office (GAO, 2009; See Appendix A, Figure 1, Item l) reports that only 22 percent of OEF/OIF service members at risk for PTSD were referred by the U.S. Department of Defense (DoD; See Appendix A, Figure 1, Item m) to healthcare providers for a mental health evaluation (Atkinson et al., 2009). Further estimates of mental disorders among OEF/OIF service members and veterans vary from 18.5 percent to 42.5 percent (See Appendix A, Figure 1, Item n; National Council for Behavioral Health, 2012; Seal et al., 2009; Tanielian & Jaycox, 2008). Still, other studies show that between 11 and 20 percent of veterans who served in OEF/OIF met criteria for PTSD at the time of the study (IOM, 2012; National Center for PTSD [NCPTSD], 2016; Tanielian & Jaycox, 2008).

Exposure to mortality in combat can be an occurrence of lasting significance for all subcategories of veterans. According to Frankfurt and Frazier (2016), a RAND (See Appendix A, Figure 1, Item o) population-based survey performed on all deployed OEF/OIF veterans, including both active duty and National Guard/Reserve, U.S. Army, Marine Corps, Navy, and Air Force personnel, measured the frequency of combat exposure. The study found that nine and a half percent reported participating in hand-to-hand combat, five percent reported being directly responsible for deaths of civilians, and five percent reported witnessing brutality toward civilians. Moreover, in a post-deployment mental health assessment, Maguen et al. (2010) found

that 40 percent of combat veterans reported killing in combat, even after controlling for other

combat exposures, an element significantly associated with PTSD. Witnessing mortalities or

prolonged combat experiences are, however, far from the sole cause of PTSD. In fact, military

experience is only one source of PTSD disturbance in armed forces personnel. Sayer et al.

(2010) suggest that nine to ten percent of service members, including activated Reserve

personnel, screen positive for PTSD. They posit that this finding underscores the need for

commanders to determine whether their subordinates are suffering from the effects of PTSD

before deployment. Nevertheless, it is easy to speculate that stigma within the military culture

may lead some to evade full-disclosure of PTSD symptomology in pre-deployment screening.

This could be quite distressing in an environment in which combatants see deployment multiple

times. This calls into question the idea that confidentiality of treatment may be a solution to this

projected dilemma.

       Increased risk for PTSD incurred by military personnel engaged in multiple deployments

with no interim recuperation underscores a significant hazard of carrying out a prolonged war

with a volunteer military. The tempo of deployment cycles in Operation Iraqi Freedom (OIF),

for example, exceeded that of any war since World War II, with many troops on multiple

deployments and some Army soldiers experiencing 15-month deployments (Atkinson et al.,

2009). Tanielian and Jaycox (2008) illustrate that deployments have expanded in both duration

and frequency for OEF/OIF combatants when compared to past conflicts in both the Vietnam

and Persian Gulf conflicts. Additionally, the length of rest between deployments for personnel

involved in the OEF/OIF conflicts has steadily decreased when compared to previous U.S.

engagements.

       For service member previously affected with PTSD, the effects of being deployed in the

combat theater undoubtedly increase their infection. Atkinson et al. (2009) reported that the

Mental Health Advisory Teams (MHAT; See Appendix A, Figure 1, Item p) found that more

than 75 percent of those who screened positive for exposure to trauma on their second

deployment had engaged in dangerous activities during their first. This finding may seem

straightforward at a glance; however, other data suggests that it may not be violence, but rather,

the additional deployment(s) that account for this increase. A recent report disclosed that

approximately 73 percent of U.S. Army active-duty service members had deployed at least once.

It also noted that "most of these soldiers were working on their second, third, or fourth year of

cumulative deployed duty" (Baiocchi, 2013, p. 2). Similarly, PTSD rates among Marines

increased from 24, to 39, to 64 percent for subsequent deployments, despite full recuperation

between stints (Atkinson et al., 2009).

Changes in the composition of the military personnel engaged in combat operations are

also relevant to PTSD rates, as a high proportion of those now serving in combat are National

Guard and Reserve personnel. They are often called upon for active duty roles, though many of

these fighters may not have anticipated current circumstances upon initially joining the military

(Schnurr, Lunney, Bovin, & Marx, 2009). Once a force called upon only for occasional stints of

disaster relief work, the National Guard and Reserve are now commonly summoned for long

deployments to combat zones (Brunswick, 2011). Sayer et al. (2010) argue that National Guard

and Reserve troops may face unique circumstances during their deployment given the fact that

their military status is merely part-time. Might their part-time situation affect their military

proficiency upon first reaching the combat zone? Moreover, might this deficiency of routine

operation predispose them to face the types of circumstances which could more quickly facilitate

development of PTSD when compared to active duty personnel? On this point, Atkinson et al.

(2009) argue that deployed military reservists develop symptomatic PTSD one to two years

sooner than active service members. This difference may point to a potential vulnerability in the

way that reservists are either trained or utilized, leaving them at higher risk for the disorder.

Empirical studies of National Guard and Reserve personnel also confirm their relative

vulnerability to the impact of deployment-related stressors. A study of psychiatric evacuees

found that members of the National Guard and Reserve were more likely to be evacuated from

combat areas for mental disorders than their active duty counterparts (Wells et al., 2011).

Several theories are present in the literature to account for the divergence in National

Guard and Reserve PTSD presentation. Accordingly, Wells et al. (2011) report that National

Guard and Reserve personnel experience what they refer to as a range of "citizen-soldier"

stressors when they deploy. Per the authors, National Guard and Reserve personnel comprise a

group of private citizens who train to be ready for the military duty of defending their state or

country in times of emergency. They are a militia, which means they are distinct from regular

active duty military forces, as they are not units of professional soldiers maintained full-time

(both in war and peace) by the federal government. Hence, National Guard and Reserve

personnel are engaged in other full-time occupations before and after they are called on for

deployment to combat regions or other duties. Additionally, Wells et al. (2011) contend that

National Guard and Reserve personnel frequently experience irregular interactions with members

of their units before deployment and may live and train in areas geographically remote from their

assigned duty locations. Moreover, when deploying to the combat theatre, they are not utilized

in their customary training units (Capone, McGrath, Reddy, & Shea, 2013; Thomas et al., 2010).

Instead, they are deployed in dispersed units and discontinue unit integrity again upon

demobilization and return to post-deployment civilian life. This means that the DoD is not

always vigilant of individual National Guard and Reserve members' mental health status in their

civilian capacity. By the same token, it is not difficult to imagine that non-deployed National

Guard and Reserve personnel repeatedly suffer in silence when ravaged by PTSD symptoms and

may not feel capable of benefiting from proximate peer support, which is generally a strength of

full-time military service comradeship.

Another change in the composition of military personnel involves gender. An

unprecedented and growing number of female service members have been deployed to combat

areas within Iraq and Afghanistan to fulfill combat support roles (Sayer, Carlson, & Frazier,

2014). Technically barred from serving in combat until recently, women now comprise

approximately 12 percent of forces deployed in war zones (Sayer, Hagel, Noorbaloochi et al.,

2014). Significantly, the forms of trauma most commonly linked to PTSD vary by gender.

Women undergo lower levels of combat exposure than do men; however, they suffer

significantly higher rates of in-service sexual assault, which is strongly associated with the

development of PTSD (Gates et al., 2012). Further, PTSD prevalence rates might differ among

female and minority active military and retirees when compared with White, non-Hispanic

males. Nevertheless, a more extensive study found that male and female OEF/OEF veterans had

a similar prevalence of PTSD, with a slightly higher degree of prevalence demonstrated in men

when compared to women (Gates et al., 2012). Although other individual-level or trauma-

related characteristics may contribute to these differences, disparities by gender or race or

ethnicity may comprise an essential consideration in studies of PTSD. For example, according to

Lehavot and Simpson (2014), a representative sample of PTSD disability-seeking female service

members showed military stress trauma at around 70 percent during active service. Current data

which carefully examines the distinct demographic differences of OEF/OIF deployed service

members who have probable PTSD by race is lacking. Still, an analysis of the National Vietnam Veterans' Readjustment Study (NVVRS), a 1983 congressional mandate to examine PTSD among Vietnam Veterans, revealed a higher prevalence of the disorder among Native-American veterans, and more race-related stress for Asian-American veterans when compared to veterans of European descent (Gates et al., 2012). The study did not show significant race-related stress for African-American veterans but did show that they were somewhat prone to a PTSD diagnosis when compared to veterans who identified with Hispanic or European origin.

It should be appreciated that numerous factors may contribute to differences in the prevalence estimates across such studies (Gates et al., 2012; Ramchand et al., 2010). Factors of importance are study design and methods, diagnostic criteria used, and characteristics of the study population at risk (See Appendix A, Figure 1, Item q), such as the severity of combat exposure or the number of deployments. Furthermore, some researchers embrace the heterogeneity of PTSD subjects across the population (Sharpless & Barber, 2011) while others cite preliminary evidence indicating that the type of PTSD affecting military personnel differs significantly from other forms, possibly due to the nature of experiences of those who serve (Albright & Thyer, 2010a). Differences in population at risk characteristics, such as the duration or intensity of combat exposure or the number of deployments, may also contribute to the differing prevalence rates across studies (Gates et al., 2012; Ramchand et al., 2010).

Hoge (2011) considered that military personnel, like members of any professional workgroup of first responders (i.e., firefighters and police), are specially trained to respond to traumatic events; they do not perceive of themselves as victims of those events, nor do they usually consider their reactions to trauma pathological. Because veterans may resist identifying with their possible pathology relative to PTSD, this cohort may be exceptionally difficult to

identify for treatment. That said, Sayer et al. (2010) maintained that insufficient research has been conducted to determine whether PTSD is underdiagnosed among OEF/OIF veterans.

Treatment Structure within the Veterans Affairs and Military: Current Systems of Care

Tanielian et al. (2017) identify three central systems that were established to care for U.S. Armed Forces, military veterans, and their families: The Military Health System (MHS; See Appendix A, Figure 1, Item r), the Veterans Health Administration (Pickett et al., 2015; See Appendix A, Figure 1, Item s), and nonmilitary private and community health care providers. In recent years, these systems have responded to a growing recognition of the need to expand access and improve the quality of mental health care for this cohort through such solutions as collaborative care models and Internet-based technologies such as video-conferencing-based telemental health (TMH; See Appendix A, Figure 1, Item t). This technological expansion, in particular, coincides with the federal government's health Information Technology (IT) priorities as proposed in the U.S. Department of Health and Human Services (HHS) Federal Health IT Strategic Plan: 2015-2020 (The Office of the National Coordinator for Health Information Technology, n.d.). According to Luxton, Nelson, and Maheu (2016), telehealth offers an important opportunity for providers to reach patients who would normally experience substantial barriers to care. Telemental health is discussed at greater length later in this chapter.

Despite these efforts, challenges persist in creating sustainable, collaborative systems of care that address mental health issues among service members, veterans, and their families (Tanielian et al., 2017). Privately funded centers and programs aim to fill gaps in treatment and services and expand community capacity (Tanielian et al., 2017). Efforts to understand mental health issues among service-members, veteran, and family populations; to develop and disseminate evidence-based practices for treating mental health conditions; and to oversee

improvements in policies and programs have contributed to improvements (Tanielian et al., 2017). Veterans of earlier conflicts, in addition to veterans of OEF/OIF, also have rates of PTSD that exceed their non-veteran counterparts (Committee on the Assessment of Ongoing Efforts in the Treatment of Posttraumatic Stress Disorder, 2011; Tanielian et al., 2017; Veterans Health Administration [VHA], n.d.). For instance, the projected lifetime prevalence of PTSD among male veterans of the Vietnam War has been estimated at 30.9 percent (Committee on the Assessment of Ongoing Efforts in the Treatment of Posttraumatic Stress Disorder, 2011; Tanielian et al., 2017). Among veterans of earlier eras, research has also identified high rates of medical comorbidity of PTSD and such afflictions as cardiovascular disease and chronic pain (Tanielian et al., 2017).

Military Health System (MHS). The MHS provides care to active duty service members, retired military personnel, and their dependents, through services delivered in military-owned treatment facilities and those purchased from the private sector through TRICARE, thus covering active duty, retired, and Guard/Reserve service members (Office of the Assistant Secretary of Defense, 2017; Tanielian et al., 2017). The mission of MHS is to ensure service members' medical readiness both at home and while deployed and to promote the health, fitness, and high performance of individuals in the military (Military Health System and Defense Health Agency, n.d.; Tanielian et al., 2017). To deliver health care services, MHS relies on both direct care provided at military treatment facilities and purchased care provided elsewhere, with expenditures split evenly between the two (DoD, 2014; Tanielian et al., 2017). In 2014, the MHS employed 9,200 mental health providers, divided between military and Department of Defense (DoD) civilian personnel, at 56 military hospitals and medical centers and 360 walk-in clinics (DoD, 2014; Tanielian et al., 2017).

Active duty service members are required to seek non-emergency mental health care at military hospitals or clinics if possible (DoD, 2018; Tanielian et al., 2017). If no such services are available, in order to have expenses covered, they must obtain a referral from a primary care manager for care from a community-based provider (DoD, 2018; Tanielian et al., 2017). Department of Defense purchases care from the private sector through TRICARE, which in the mid to late 1990s replaced the Civilian Health and Medical Program for the Uniformed Services as the insurance provider for military beneficiaries. Comparable to the private sector, TRICARE enables eligible individuals to pay for treatment through a typical insurer-to-provider arrangement. Thus, this civilian care component of the MHS consists of three healthcare coverage packages embodied in its program name. The coverage packages are detailed in Table 3 (See Appendix B).

TRICARE's 500,000-plus network includes more than 60,000 network behavioral health providers (DoD, 2014; Tanielian et al., 2017). Additional plans, beyond the primary three, cover select populations such as those living abroad or retired National Guard and Reserve component members and their families. TRICARE for Life, for example, provides Medicare wraparound coverage for beneficiaries who are eligible for both TRICARE and Medicare. Roughly 85 percent of eligible TRICARE beneficiaries received some MHS care, directly or through purchase, in 2014 (DoD, 2014; Tanielian et al., 2017). TRICARE benefits and plans differ based on beneficiary category, although the differences amount to little more than how care is accessed and the level of cost-sharing (Tanielian et al., 2017; TRICARE, 2016).

Through TRICARE, recipients can access a range of mental health services from an authorized provider depending on their eligibility and needs (Tanielian et al., 2017; U.S. Department of Veterans Affairs, 2018b). Services include psychotherapy (individual,

family/marriage counseling, group, and collateral visits) and psychoanalysis as well as care at

psychiatric residential treatment centers and hospitals, acute inpatient psychiatric care, tele-

mental health, and interface through Internet accessible technologies such as smartphones and

computers. Active duty service members incur no cost for authorized mental health care; the

amount of co-payment for other beneficiaries varies by plan and whether providers are in or out

of network. Each TRICARE recipient is covered with a network provider for up to eight

outpatient visits in a fiscal year without further referral or authorization (Tanielian et al., 2017;

U.S. Department of Veterans Affairs, 2018b). However, additional appointments are obtainable

after evaluation and authorization through the TRICARE system.

   **Veterans Health Administration (VHA)*.* The Veterans Health Administration (VHA)

stands as the largest subsidiary of the U.S. Department of Veterans Affairs (VA) overseeing most

of the department's clinical programs. It falls under the authority of the Under Secretary of

Veterans Affairs for Health (Hayes et al., 2011; Tanielian et al., 2017; Veterans Health

Initiatives, n.d.). With an annual mental health budget of $6.2 billion (U.S. Department of

Veterans Affairs, 2014), this department oversees administration and operation of Community

Based Outpatient Clinics (CBOC), Outpatient Clinics (OPC), VA Community Living Centers

(VA Nursing Home) Programs, and VA Medical Centers (VAMC).

   Typically, veterans are eligible for VA health care if they served 24 consecutive months

of active duty in military service and separated under any condition other than dishonorable

discharge (Hayes et al., 2011; Szymendera, 2016; Tanielian et al., 2017). Accordingly, a veteran

must possess a Certificate of Release or Discharge from active duty (DD Form 214) to be

eligible for treatment through the VHA (U.S. National Archives and Records Administration

[NARA; See Appendix A, Figure 1, Item u], n.d.). However, some exceptions may grant

eligibility to veterans for VA health care. In some instances, veterans may be eligible for VA

health care based on their income. Moreover, service members who have experienced Military

Sexual Trauma (MST) are also eligible for VA health care for health needs related to MST

incidents, even if they do not meet other VA eligibility requirements (Hayes et al., 2011;

Tanielian et al., 2017; U.S. Department of Veterans Affairs, 2018a). Military sexual trauma will

be discussed at greater length in Chapter II.

Both National Guard and Reservists are treated at military hospitals like active duty

military personnel while on active duty. However, Reservists are also given veteran status on

active duty, allowing them to seek care at the VA activated outside of a war zone. Conversely, if

activated in a domestic emergency, National Guard may use VA services (Hayes et al., 2011;

Tanielian et al., 2017; U.S. Department of Veterans Affairs, n.d.-b). Eligibility for VA health

care is limited for Reservists and National Guard members who are not on full-time activation

for federal service. Since VA health care is allocated based on the availability of resources

(Panangala, 2016; Tanielian et al., 2017), eligibility is dependent on the agency's budget. The

VA uses a priority group system to determine eligibility and resource allocation for groups of

veterans based on veterans' service-related disabilities, income, service during a conflict,

commendations, and other factors. Enrollees never pay for the care of service-connected

conditions, and co-payments for non-service-connected conditions vary based on their priority

group.

Special exceptions have been made to increase access to VA health care for veterans who

have recently returned from combat. Within five years of returning from combat, veterans are

eligible to enroll in VA health care without needing to prove that their illness or injury is service-

related or meet an income requirement (Panangala, 2016; Tanielian et al., 2017). Once veterans

enroll in VA care under the extended eligibility authority, they may continue receiving health care beyond the five-year eligibility period (Panangala, 2016; Tanielian et al., 2017). On July 5, 2017, veterans with other than honorable discharges became eligible for limited mental health services and VA emergency mental health services. The increase in the rate of suicide for veterans with other than honorable discharge status caused this shift in VA policy (Tanielian et al., 2017). Tanielian et al. (2017) relate that they do not yet know how this change in policy will affect demand and utilization for these services nor how the longer-term mental health needs of this population will be addressed in the VA healthcare system.

Per their website, the VHA's mission is to "honor America's Veterans by providing exceptional health care that improves their health and well-being" (Emerson, 2017; U.S. Department of Veterans Affairs, n.d.-a). True to its size, the VHA encompasses upwards of 800 CBOCs and 278 Veteran Centers which provide outreach services, readjustment counseling, and referral services. Additionally, the VHA oversees 135 community living centers and 48 domiciliary centers offering residential treatment programs (Tanielian et al., 2017; Veterans Health Administration [VHA], n.d.). In 2015, approximately 6.7 million veterans used VHA health care, out of approximately nine million VHA-enrolled veterans (Tanielian et al., 2017; U.S. Census Bureau, 2017) among a total population of more than 21 million veterans (Bagalman, 2014; Tanielian et al., 2017).

In 2015, VHA also provided specialized mental health treatment to more than 1.4 million veterans (Tanielian et al., 2017; U.S. Census Bureau, 2017). Beyond PTSD, the VHA offers evidence-based outpatient and inpatient direct mental healthcare for a range of issues (Tanielian et al., 2017; Veterans Integrated Service Networks [VISN; See Appendix A, Figure 1, Item v] and Mental Illness Research Education Clinical, Centers of Excellence [U.S. Department of

Veterans Affairs; See Appendix A, Figure 1, Item w], 2012). These include anxiety, bipolar disorder, depression, schizophrenia, and substance abuse. The VHA offers mental health care at medical centers, CBOCs (either in-person or via telehealth), and domiciliary care. Additionally, the Vet Centers specialize in readjustment counseling and Multi-Systemic Therapy which is an evidence-based, three- to five-month intensive in-home family counseling program (Tanielian et al., 2017; U.S. Department of Veterans Affairs, 2013). Moreover, the VHA offers supported work settings and residential care for veterans who need mental health and rehabilitative care (Tanielian et al., 2017; U.S. Department of Veterans Affairs, 2013).

The VHA also provides specialized and coordinated mental health care. The VHA Suicide Prevention Coordinators collaborate with mental health care teams to offer specialized support for veterans at high risk for suicide (Tanielian et al., 2017; U.S. Department of Veterans Affairs, 2013). The Veterans Crisis Line is a 24-hour toll-free, confidential hotline, online chat, and text service that connects qualified VHA responders with veterans in crisis as well as their families and friends. Moreover, any veteran who experienced military sexual trauma is eligible for VHA counseling, including specialized inpatient, outpatient, and residential programs (Tanielian et al., 2017; U.S. Department of Veterans Affairs, 2013). The VHA also offers a range of mental health care services for veterans who are homeless, older (with nursing home needs), or involved with the criminal justice system (Tanielian et al., 2017; U.S. Department of Veterans Affairs, 2013).

In addition to providing direct treatment and services, VHA purchases care for veterans from the community or private sector through a variety of programs. According to Tanielian et al. (2017), the VHA has had to purchase more care for veterans in recent years due to many specialized needs for care through private providers. They believe that their costs may continue

to rise; therefore, the VHA instituted the Veterans Choice Act. For example, with this act, private care now exists for veterans who live more than 40 miles from the nearest VHA facility or are unable to schedule a needed health care appointment within a 30-day window. Others may obtain prescription medication through VHA while concurrently receiving mental health counseling through a nonprofit service provider. With multiple options for care, Tanielian et al. (2017) suggest that the choice of which program to access, within the overall military healthcare system, depends on the veteran's personal preference, geographic location, perceptions of confidentiality, quality, and wait times, as well as other individual factors. An additional point of consideration is the psychoeducational aspect of seeking or receiving mental health services within the VA and MHS for veterans and active military personnel. There are Peer Specialists and Peer Apprentices (See Appendix A, Figure 1, item ag) who are military-associated persons who aim to guide others in seeking mental health treatment, given the maze of treatment options and the intricacy of navigating the VA and MHS.

  Community-based or private-sector provided care. As discussed earlier, both MHS and VHA purchase care from community or private sector organizations as needed and appropriate to meet the needs of their covered populations (Tanielian et al., 2017). Further, service members, veterans, and their family members may be eligible for health care in the community or private sector based on their circumstances. Factors involved could include private health insurance provided by an employer or purchased independently, Medicare or Medicaid, Indian Health Service, federally qualified health centers, and student health centers, as well as care provided by or coordinated through nonprofit organizations (Tanielian et al., 2017). Some individuals may be eligible for care in multiple systems, either sequentially or simultaneously. For example, a member of the Reserve is automatically enrolled in TRICARE

Prime when serving on active duty for more than 30 days but may return to using VHA or employer-sponsored health care when not on active duty status.

Tanielian et al. (2017) indicate that the community and private sector work together to help support the overriding objectives of the MHS and VHA through overlapping roles. Explicitly, community providers affiliated with these agency-purchased care programs play a direct role in supporting the surge capacity needs of DoD active duty beneficiaries and VA retirees. Beyond serving military and veteran populations specifically, community providers aim to fulfill the broader mission of meeting the diverse healthcare needs of the local population in general. On the other hand, some privately funded providers and centers seek to fill the gaps in mental healthcare specifically for service members, veterans, and their families and create new capacity to provide mental health care for them in numerous ways. By offering accessible, high-quality care, privately funded centers and programs increase the availability of providers and appointments, which may reduce wait times and encourage military and veteran populations to seek treatment (Tanielian et al., 2017).

Some new centers and programs offer unique mental health care services for veterans and their families who may not be eligible for VA care, including those with dishonorable discharges. For these individuals, private providers help increase access to mental health care. Many privately funded centers offer mental health care services free of charge, thus eliminating financial barriers to care for some service members, veterans, and their families (Tanielian et al., 2017). At the same time, some privately funded centers and programs aim to complement the VHA by offering services not typically available there, such as child mental health services and nontraditional therapies (e.g., equine therapy, hyperbaric oxygen therapy, or wraparound case management services). Ultimately, although the community and private sector organization

purviews and processes differ, both groups contribute meaningfully to the accessibility of quality care for military and veteran populations across the United States (Tanielian et al., 2017).

Recent Delivery Innovations in Expanding Capacity

The MHS, VHA, and community and private providers have been innovating new technical systems and integrated health care settings to improve access and quality of mental health care. Two significant system-level shifts have been introduced in recent years: Tele-Mental Health (TMH) and mental health in primary care (Tanielian et al., 2017). These innovations seek to improve the structural capacity of MHS and VHA to meet the high demand for mental health care among the veteran population at large. The approaches also aim to reduce barriers to care posed by provider shortages, geographic distance, and stigma. Tele-mental health capitalizes on the increasing availability and sophistication of video and other technology applications, allowing many healthcare providers to extend the reach of their services. For some, these service modes may come down to a simple use of the telephone to provide consultations to patients and other providers; for others, they may entail the more sophisticated use of web-based platforms to video conference as well as share images and videos to provide care virtually (Luxton et al., 2016).

Over the past decade, the VHA has used the Internet to expand access to mental health care for veterans, particularly those who live far from any facility with specialty mental health care services. The VHA's tele-mental health care includes the use of web-based communication platforms for delivering services to veterans in venues not co-located with the primary therapist. In these instances, a VA mental health professional interacts with a patient who may be sitting in a different community-based outpatient setting or a Vet Center. Use of these approaches has begun to take effect: approximately 100,000 veterans living in remote communities have

received mental health care remotely (Office of Rural Health [ORH; See Appendix A, Figure 1, Item x], Tanielian et al., 2017; U.S. Department of Veterans Affairs, n.d.-d). In the VA's proposed fiscal 2017 budget, the agency estimated that its telehealth services provided 2.1 million sessions with 677,000 veterans in 2015 followed by a purposed increase of 762,000 veteran consultations in 2017 (Tanielian et al., 2017; U.S. Department of Veterans Affairs, 2017).

The National Center for PTSD (NCPTSD; See Appendix A, Figure 1, Item y) has partnered with the National Center for Telehealth and Technology, a component of the MHS, to develop standalone self-help mobile device health applications (e.g., Mindfulness Coach, and PTSD Coach) and psychotherapeutic treatment companion applications utilizing a CPT or PE framework (NCPTSD, 2017a; Tanielian et al., 2017). These tools are intended for self-management that can supplement and complement provider-based care. Studies indicate that PTSD Coach is well received by veterans (Gordon, 2016; Tanielian et al., 2017). Aimed at teaching users to manage PTSD symptoms, the application offers information about PTSD and treatment, as well as tools for screening and tracking symptoms; and is widely used around the world (NCPTSD, 2017b; Tanielian et al., 2017). Early evaluation results indicate that users find PTSD Coach to be helpful in reducing their symptoms (Kuhn et al., 2014; Tanielian et al., 2017).

In addition to these specific mental healthcare applications, other advancements in technology may influence how veterans access mental health care services. For example, the VHA has introduced a new scheduling application intended to help with reserving and managing appointments. According to Record et al. (2016) the VHA is also increasingly using consumer health information and health services to promote veterans' active involvement in their healthcare. Their example of this is the My HealtheVet account website which permits veterans

to download a copy of their VA health records, research health education information, keep a

personal health journal, as well as request medication refills and track delivery of VA

prescriptions (Record et al., 2016). Veterans are also able to access and share their medical

records with healthcare professionals on a computer or smartphone through the My HealtheVet

website (which can be found at http://www.myhealth.va.gov/).

Beyond the My HealtheVet website, Record et al. (2016) state that the VA hosts several

interactive websites established to provide users with mental health specific resources. For

example, Mental Health (which can be found at https://www.mentalhealth.va.gov/) provides a

complete guide to the abundance of VA mental health services; Veteran Training (which can be

found at https://www.veterantraining.va.gov/movingforward/) teaches stress management and

problem-solving skills; and Make the Connection (which can be found at

https://maketheconnection.net/) from which veterans can find local resources; as well as

peripheral sites such as Homeless Veterans (which can be found at

https://www.va.gov/homeless/) which is a site committed to ending homelessness among

veterans.

In addition, non-MHS/VHA entities have partnered with individual MHS/VHA

organizations to offer online programs to treat veterans. Boston University and the VA Boston

Healthcare System, in partnership with the NCPTSD, with support from the Bristol-Myers

Squibb Foundation and the NCPTSD collaborated in presenting VetChange (Boston University

Vet Change, 2017; which can be found at https://vetchange.org/) which is a free, confidential

online self-management program to assist active duty military and Veterans in taking control of

their drinking while learning to manage their PTSD symptoms without using alcohol. The

program allows users to set weekly goals related to drinking and make use of a daily log for

drinking behavior. The log is accessible via computer, smartphone, and tablet. Users can also "check in" through the website interface to receive feedback and evaluate their progress with program staff who are trained for the task but are not therapists.

The VA Secretary also recently announced plans to adopt the DoD's electronic medical record (EMR) system. This interchange would facilitate the seamless transfer and sharing of medical records between organizations as well as following personnel from active duty into reengagement with the community upon release, enabling greater continuity of care for service members and veterans with mental health problems (Tanielian et al., 2017). The VA indicates that this innovation is still in the production phase, however, this announcement follows approximately two decades of planning surrounding the integration of EMRs for the MHS and VHA.

Providing Mental Health Services in Primary Care

To reduce mental health treatment stigma while increasing patient satisfaction, access to care, and the effectiveness of evidence-based care, MHS has begun integrating mental health care into primary care in all three systems. While MHS has implemented this integration across all installations and clinics as part of its patient-centered medical home (PCMH) model, some individual service branches have gone even further, embedding behavioral health providers within operational units (Embrey, 2009; Tanielian et al., 2017). The VHA refers to the conceptualization of PCMHs as patient-aligned care teams (Tanielian et al., 2017; U.S. Department of Veterans Affairs, 2016). The patient-aligned care teams aim to deliver patient-driven, personalized care. This care includes proactive screening and treatment for mental health issues in the primary care setting (Rosland et al., 2013; Tanielian et al., 2017). Within the private sector, larger healthcare systems have also sought to implement PCMHs and community

care organizations to improve the integration of mental health and primary care (Brink, 2014; Tanielian et al., 2017). Some challenges arise associated with treating mental health issues in the primary care setting. Primary care providers must diagnose and treat their patient's crises within a short period. Given the time used to conduct an appointment, the duration allotted for treatment is not always conducive to the patient's needs. Under these circumstances, identifying and treating both physical ailments and mental health issues can prove challenging. Research shows that general practitioners often fail to detect and diagnose mental disorders among their patients (Jorm, 2000; Tanielian et al., 2017). More than one-third of patients requesting mental health care get their treatment through primary care providers exclusively (Russell, 2010; Tanielian et al., 2017). Further, some studies indicate that primary care physicians neglect to address mental health issues with 69 percent of their afflicted patients (Ani et al., 2008; Tanielian et al., 2017). Because of concerns about the physician supply shortage, particularly in the primary care workforce, some experts fear that asking primary care providers to assess patient needs in a mental health capacity overtaxes these practitioners (IHS Markit [See Appendix A, Figure I, Item z], 2017; Tanielian et al., 2017). Nevertheless, given the ubiquity of mental health complications within the military population, it is logical to assume that primary care capacity would only be enhanced through education and training around mental health (Russell, 2010; Tanielian et al., 2017).

Mental health care quality, along with agency, capacity, and timeliness, in primary care are significant concerns. Primary care providers sometimes fail to adhere to evidence-based care practices for mental health issues (Russell, 2010; Tanielian et al., 2017). For instance, studies show that primary care providers sometimes prescribe inappropriate dosages of antidepressants and neglect to schedule the required follow-up visits (Russell, 2010; Tanielian et al., 2017).

Furthermore, primary care providers often stop short of providing referrals for psychotherapy—and when they do provide them, many patients either do not follow up to receive that care or, if they do seek out counseling, drop out quickly. This limitation is significant given that certain types of psychotherapy constitute first-line treatment options and treatments most preferred by patients for many psychiatric disorders (Russell, 2010; Tanielian et al., 2017).

The MHS and VHA are beginning to improve primary care by inserting professionals specializing in mental health care (e.g., psychiatrists, psychologists, and social workers) into primary care settings. In the past, placing mental health professionals in primary care comprised a component of some integrated behavioral health models, but embedded approaches in primary care settings reduce the demand upon the primary care professional to manage mental health problems. This allows primary care providers to refer patients to a mental health provider in the same physical setting, rather than to deliver psychiatric services themselves.

Expanding Access to Community Sources of Care

Both DoD and VHA have sought to expand access to mental health services by bolstering their networks of community-based providers. The DoD also sought to increase the number of mental health providers accepting TRICARE by calling on its managed care support contractors to increase network enrollment of licensed mental health professionals. Historically, concerns over TRICARE reimbursement rates have limited network expansion, and the new effort is no exception; concerns about reimbursement rates continue. Paradoxically, rather than using reimbursement increases to draw more providers into the network, some managed care contractors have recently proposed reductions in reimbursement rates for mental health care within TRICARE, which has intensified mental health providers' hesitation to join the network.

Posttraumatic Stress Disorder Treatment Modalities

Steenkamp et al. (2015) report that psychotherapy is recommended more consistently than medications as first-line treatment for PTSD. This fact is important to note, as the DoD and VA have made a concerted and significant policy shift toward evidence-based therapies. This undoubtedly coincides with the emergence of increasing numbers of Randomized Controlled Trials (RCTs) of PTSD treatments in military personnel and veterans over the past ten years (Karlin et al., 2010; Steenkamp et al., 2015). The diverse range of PTSD psychotherapies is broadly grouped into trauma-focused and non–trauma-focused categories (Steenkamp et al., 2015). Trauma-focused therapies are cognitive-behavioral treatments involving a range of techniques that attend to the details of the trauma and associated emotions or cognitive processes (e.g., beliefs or assumptions). The three most widely studied trauma-focused therapies, considered the leading evidence-based psychotherapies according to all essential clinical guidelines, are Cognitive Processing Therapy (CPT), Prolonged Exposure (PE) therapy, and Eye Movement Desensitization and Reprocessing (EMDR) therapy (Steenkamp et al., 2015).

Chard, Schumm, Owens, and Cottingham (2010) relate that CPT's typical 12-session regime encompasses three distinct phases; the initial phase addresses trauma's impact and its connection to thoughts, feelings, and behaviors; the second phase involves written narratives on the meaning of events and their subsequent stuck points; and the final phase introduces the concepts of assimilation and overaccommodation concerning the traumatic event examined. Prolonged Exposure therapy usually consists of eight to fifteen sessions of manualized treatment with each session lasting 60 to 120 minutes (APA, 2017). Sessions of this length are advised for the recipient to engage in exposure and adequately process the experience, which is achieved through in vivo and imaginal exposure to the traumatic event as a means of processing the

traumatizing experience. Finally, EMDR is a structured and manualized treatment that can combine elements of mindfulness, body-based approaches, and person-centered therapies (Hase et al., 2015; Sharpless & Barber, 2011; Steenkamp et al., 2015; Wood, Ricketts, & Parry, 2018). Shapiro & Maxfield (2003) relate that EMDR uses the Adaptive Information Processing Model as its clinical influence. This theory proposes that traumatic memories in PTSD are unprocessed, and thus, they are not stored as memories but are instead treated by the brain as if they were new sensory inputs. These three modalities for PTSD treatment also demonstrate the most evidence for efficacy and utility with veteran populations (Sharpless & Barber, 2011).

Meta-analyses show substantial positive pre- to post-treatment effects for EMDR (Steenkamp et al., 2015). When comparing these treatments in control conditions, within-group and between-group samples display comparable outcomes. However, these treatments have other attributes in common. Steenkamp et al. (2015) illustrate that CPT, PE, and EMDR are manualized treatments and thereby progress in a session-by-session manner, making these evidence-based protocols ideal for delivery in specialty mental health care settings. Moreover, although they use different techniques and theoretical rationales, they all require sustained engagement, typically 12 sessions, and can be emotionally demanding for patients. In 2008, CPT and PE were selected by the VA for nationwide dissemination to standardize adequate care for veterans. As a result, 98 percent of VA centers now offer both forms of therapy (Karlin & Cross, 2014; Steenkamp et al., 2015).

Initially, neither CPT or PE interventions were sufficiently validated among active duty military or veteran populations; instead, both therapies were initially tested among predominantly civilian female survivors of sexual assault (Steenkamp et al., 2015). However, Vermetten, Meijer, van der Wurff, and Mert (2013) point out that PE and EMDR failed to differ

significantly from baseline change when applied to any treatment sample. This equivalency was noted for both interventions in posttreatment and follow-up measurements regardless of the quantitative scale. Despite high-level endorsements from many international practice guidelines and substantial evidence of efficacy in civilian studies, EMDR research receives comparatively little VA or DoD funding (Steenkamp et al., 2015). The lack of research might explain the lack of dissemination of EMDR interventions within the VA.

Shapiro & Maxfield (2002) indicate that EMDR is judged efficacious by the International Society for Traumatic Stress. However, the American Psychological Association uses the term "best research evidence" when describing the primary determinate of evidence-based practice (The Society for a Science of Clinical Psychology, n.d.). McHugh & Barlow (2010) indicate that the IOM treatment policy incorporates evidence-based practice as a central tenet of healthcare delivery. Albright & Thyer (2010a) state that Division 12, The Society of Clinical Psychology, Section 3, The Society for a Science of Clinical Psychology within the APA maintains the function of defining the criteria for an empirically supported treatment. They note that EMDR as a psychotherapeutic modality, does not meet the threshold for evidence-based practice in PTSD treatment among military combat veterans. As per Chambless et al. (1998) these standards require, among other features:

> At least two good between-group design experiments demonstrating efficacy in one or more of the following ways: A. Superior (statistically significantly so) to pill or psychological placebo or another treatment. B. Equivalent to an already established treatment in experiments with adequate sample sizes (p. 4)

A report by the IOM in 2001 argued that there was a remarkable disconnect between medical research and practice (McHugh & Barlow, 2010). In fact, some scholars indicate that a

form of CBT called Trauma-Focused Cognitive Behavioral Therapy (TF-CBT) and EMDR are the most common exposure-based therapies provided for treatment of PTSD overall (Ehlers et al., 2010; Vermetten et al., 2013).

There is a need for improvement in existing PTSD treatments as well as the development and testing of novel evidence-based treatment strategies (Steenkamp et al., 2015). Steenkamp et al. (2015) argue that EMDR has strong curative confirmation in civilian studies and high-level endorsement from many international guidelines. Despite this, they conclude that neither the VA nor DoD endorse its clinical use and EMDR research has received comparatively little funding within their organizations, thus, ensuring a continuation of the status quo. As a choice, the effectiveness of PTSD psychotherapies delivered in the VA and DoD appear to receive scant empirical interest within their clinical culture. Through observation of several large-scale VA and DoD studies, Steenkamp et al. (2015) proclaim that treatment retention is a significant problem in military-related PTSD care. As they found that only a small portion of service-connected personnel receive a minimally adequate number of mental health treatment encounters after PTSD diagnosis.

According to Steenkamp et al. (2015), many trials of CPT and PE have compared patients receiving the intervention with patients not receiving any standardized intervention (waitlist) or with patients receiving treatment as usual. Steenkamp et al. (2015) indicate RCTs also have not reported the need for continued care following CPT or prolonged exposure; for many patients, 12 sessions of manualized trauma-or non–trauma-focused treatment is insufficient. Definitions of treatment dropout also differ between studies, and studies often fail to delineate why patients dropped out (Steenkamp et al., 2015).

Eye Movement Desensitization and Reprocessing

Eye Movement Desensitization and Reprocessing (EMDR) therapy was introduced approximately 30 years ago as a therapeutic intervention for clients with anxiety disorders (Albright & Thyer, 2010b; Lyons, 2014) and despite much controversy since its inception, has come to be viewed in the last decade as a breakthrough treatment for PTSD (Vermetten et al., 2013). Rank, Chaffin, Figley, and Lawrence (2008) indicate that the results of various controlled studies present strong documentation in support of EMDR as an effective treatment strategy for single-trauma cases. According to Cukor, Olden, Lee, and Difede (2010), the question at the heart of the debate surrounding EMDR is whether the effectiveness of the treatment is due exclusively to the exposure to the trauma memory during the exercise, thereby rendering the treatment merely a disguised form of exposure therapy. Alternatively, the added benefits may result from EMDR's specific methods. Proponents of EMDR maintain that its efficacy results from a complex combination of therapeutic elements. The eight phases of EMDR treatment are comprised of exposure and cognitive restructuring elements (Cukor et al., 2010; Steenkamp et al., 2015; Vermetten et al., 2013). Within these phases, patients are asked to maintain a dual focus on a distraction task in the form of an external stimulus (i.e., tracking a series of the therapist's presented hand movements, tones, taps, or other tactile stimulation) while simultaneously thinking about their trauma. This creates a fresh, non-dysfunctional perspective on the original traumatizing event. Repeated sequencing aids in developing a different narrative to store in memory. Importantly, in EMDR, the client does not need to describe details of the traumatic experience in order to access it. According to Figley (2002) EMDR procedures require the client to select a target memory which represents the worst and most traumatic aspect of the presenting distress. However, the client does not need to describe the details of the traumatic experience as in CPT and PE. For some, this reduces stigma and shame of the disturbance, yet

allows full access to addressing the trauma. Concurrent with the procedures above, the patient

must attend to bodily sensations linked to the recalled image (Steenkamp et al., 2015). Albright

and Thyer (2010b) argue that EMDR therapy treated vastly different patient types in greatly

varying clinical settings. Still, Vermetten et al. (2013) contend that CBT and EMDR are the

most efficacious treatments currently available for PTSD. Because of EMDR's efficacy in

treating PTSD, some installations within the military used EMDR to treat combat veterans

(Lewis, 2009; Vermetten et al., 2013).

        EMDR theory and mechanism of action. According to the Phoenix Australia Centre

for Posttraumatic Mental Health (2013), EMDR's theory assumes that during a traumatic event,

overwhelming emotions or dissociative processes may interfere with information processing. To

combat this, EMDR is employed; thus, Rousseau et al. (2019) indicate that EMDR consists of

accessing cognitive, emotional, and physical aspects of real distress to traumatic scenes. The

International Society for Traumatic Stress (2018) hypothesized that EMDR stimulates an

individual's information processing to help integrate the targeted memory as an adaptive

contextualized memory. Processing targets involve past events, present triggers and adaptive

future functioning. At times, EMDR uses restricted questioning related to cognitive processes

paired with Bilateral Stimulation (BLS) to unblock processing. Rousseau et al. (2019) indicate

that imaginal exposure to the traumatic event is then after proposed in association with bilateral

alternating stimulation stimuli, which results in a change of cognitive processing of memory and

cessation of trauma-related distress, while eliminating physical discomfort associated with the

initial memory and establishing a positive cognition about the self. Phoenix Australia Centre for

Posttraumatic Mental Health (2013) state that this leads to the experience being stored in an

"unprocessed" way, disconnected from existing memory networks. Rhythmic movements of the

eyes, acquired initially by left-right smooth pursuit in response to bilateral movement of a visual stimulus, are a pivotal feature of EMDR protocol (Coubard, 2015). Following Shapiro's adaptive information processing (AIP) model, BLS is posited to activate more remote neural networks to allow the linking of dissociated information with the target traumatic events, thus encouraging the reprocessing of the events and their eventual desensitization (Keller, Stevens, Lui, Murray, & Yaggie, 2014).

A foundational component of EMDR that distinguishes it from other trauma treatment strategies is the use of BLS during the contemplation of traumatic target events (Keller et al., 2014). In EMDR, the person is requested to focus on trauma-related imagery, negative thoughts, emotions, and physical sensations while concurrently moving their eyes back and forth following the motion of the therapist's fingers or EMDR light bar across their field of vision for 20 to 30 seconds or more. Eye Movements (EMs) are the most commonly used external stimulus (Propper, Pierce, Geisler, Christman, & Bellorado, 2007). This process is highly replicable. Thus, this dual attention facilitates the processing of the traumatic memory into existing knowledge networks, although the precise mechanism involved is not known (Phoenix Australia Centre for Posttraumatic Mental Health, 2013). Christman et al. (2003) suggest that EM manipulation is particularly useful in reducing instances of false memories. Christman et al. (2003) reiterate that PTSD is a dissociative disorder, in which patients have difficulty voluntarily retrieving memories for traumatic experiences. An essential component of PTSD therapies involves patients reliving traumatic memories within the supportive therapeutic context. One of the professed benefits of the EMDR technique is that it makes traumatic memories more readily accessible to voluntary retrieval; reduces the incidence of involuntary intrusions; and, perhaps most critically, desensitizes the patients to the traumatic nature of past events via a form of

cognitive restructuring. Nieuwenhuis et al. (2013) state that in many patients, repetition of the BLS gradually changes the traumatic (sensory) memory into a more (verbal) declarative memory, while at the same time reducing emotional arousal and avoidance. Nieuwenhuis et al. (2013) report that studies show that horizontal EMs performed during retrieval also decrease the vividness and distress of emotional autobiographical memories in healthy adults.

Propper et al. (2007) indicate that the use of bilateral EMs is an essential component of EMDR therapy for a patient with posttraumatic stress disorder. However, other forms of BLS such as bilateral auditory tones, bilateral tapping, or these components are used individually or in conjunction (Phoenix Australia Centre for Posttraumatic Mental Health, 2013). That said, the neural mechanisms underlying EMDR remain unclear. Christman et al. (2003) indicate that the underlying logic for the use of bilateral EMs is as follows; first, there is a link between EMs and hemispheric activation, with lateral EMs leading to a sustained increase in activation of the contralateral hemisphere, then, sequences of left-right bilateral EMs presumably result in simultaneous activation of both cerebral hemispheres. Christman et al. (2003) disclose that considerable controversy surrounding EMDR stems primarily from the fact that the psychological and physiological mechanisms underlying the efficacy of this technique remain a mystery. Despite the increasing popularity of auditory stimulation as an alternative to EMs, there have been no controlled studies of the efficacy of this technique (Nieuwenhuis et al., 2013). No study has included structured or systematic functional outcome measures. As with the other therapies, the extent to which gains remain over the long term requires further evaluation (APA, 2010). Since cognitive behavior therapy and exposure therapy have been shown to have efficacy in the treatment of PTSD, a significant question about EMDR has been whether the EMs contribute to therapy outcome (APA, 2010).

Although some feel that EMDR is clinically efficacious, there is little evidence at present that it differs in efficacy from other therapies such as Cognitive Behavioral Therapy (CBT) as EMDR's underlying neural mechanisms remain controversial (Propper et al., 2007). Controversies about the nature of EMDR therapy stem partially from the failure of its proponents to suggest plausible neural mechanisms underlying its efficacy (Propper et al., 2007). Although proponents of EMDR emphasize the importance of bilateral EMs, virtually no distinction has been made between saccadic versus pursuit EMs, leading to potentially critical methodological problems. Christman et al. (2003) found that saccadic, but not smooth pursuit, EMs result in enhanced episodic retrieval. A therapist waving a finger back and forth in front of the patient is more likely to elicit pursuit than saccadic EMs (Christman et al., 2003). It is possible that many of the negative reports on the efficacy of EMDR reflect the fact that their procedures induced smooth pursuit, not saccadic, EMs (Christman et al., 2003). Nieuwenhuis et al. (2013) report that these three real-life phenomena suggest that horizontal saccades are essential for efficient consolidation and retrieval of memories, and some researchers have speculated that the phenomena may be intimately related. Lyle and Jacobs (2010) state that Saccade-Induced Retrieval Enhancement (SIRE) is the effect whereby making bilateral saccades enhances the subsequent retrieval of memories. Nieuwenhuis et al. (2013) indicate that meta-analyses show EMDR as equally valid as cognitive-behavioral therapy, and superior to other therapies.

Episodic memory improvement induced by bilateral EMs is hypothesized to reflect enhanced interhemispheric interaction, which is associated with superior episodic memory (Christman, Garvey, Propper, & Phaneuf, 2003). Episodic memory is the term used to denote memory for personal experiences involving the retrieval of specific events located in time and place. This form of memory provides the basis for mental time-travel that allows the individual

to recollect and subjectively re-experience the past event (Parker & Dagnall, 2012). Christman

et al. (2003) reported that the explicit retrieval of episodic memories facilitation increases with

an interaction between the two cerebral hemispheres. Christman et al. (2003) relate that bilateral

EMs enhance interhemispheric interaction, and subsequently episodic memory, by equalizing the

levels of activation for the left and right hemispheres of the brain. Christman et al. (2003)

divulge that their finding of enhanced retrieval of nontraumatic episodic memories when

participants made bilateral EMs suggests that the EMs used in EMDR activate

neurophysiological structures generally involved in episodic–explicit memory retrieval rather

than those specific to traumatic information or the EMDR therapeutic situation in general.

Nieuwenhuis et al. (2013) indicate that recent research shows superior memory retrieval when

participants make a series of horizontal saccadic EMs between the memory encoding phase and

the retrieval phase compared to participants who did not move their eyes or move their eyes

vertically, rather than laterally. A hypothesis exists regarding the rapidly alternating activation

of the two hemispheres that is associated with the series of left-right EMs is indispensable in

creating the enhanced retrieval. The hypothesis predicts a beneficial effect on retrieval of

alternating left-right incitement not only of the visuomotor system but additionally in the

somatosensory system, both of which have a strict contralateral organization.

Because EMDR helps PTSD patients overcome dissociative amnesia for traumatic

events, EMDR's efficacy may be due to its action on neuroanatomical structures involved in

memory (Propper et al., 2007). Propper et al. (2007) proposed a neurobiological framework

wherein the BLS in EMDR enhances memory processing through increased interhemispheric

interaction via the corpus callosum. These studies reported superior episodic memory after

EMDR-like stimulation consisting of 30 seconds of bilateral saccadic EMs, relative to 30

seconds of central fixation. Superior episodic memory took the form of increased recall of

laboratory-based and real-world memories, decreased false memories, and recall of earlier

childhood memories. Propper et al. (2007) propose that superior episodic memory after bilateral

EMs is a result of EM-induced increases in interhemispheric communication during episodic

retrieval. There is converging evidence that episodic retrieval is associated with increased

communication between the cerebral hemispheres, coming from imaging studies, studies of split-

brain patients, and visual half-field studies. In respect of PTSD symptoms, it may be that by

changing interhemispheric coherence in frontal areas, the EMs used in EMDR foster

consolidation of traumatic memories, thereby decreasing the memory intrusions found in this

disorder. It is unclear why this occurs only when the eyes are kept open after EM (Propper et al.,

2007). Christman et al. (2003) indicate that the retrieval of episodic memories is selectively

enhanced when preceded by bilateral horizontal saccadic EMs.

Christman et al. (2003) propose that equalized levels of activation in the two

hemispheres, as a result of bilateral EMs, enhance interhemispheric interaction, resulting in the

improvements of episodic memory obtained in the current experiments. However, the current

methodology does not allow firm conclusions about the precise mechanism by which bilateral

EMs enhance episodic memory retrieval. Christman et al. (2003) propose that BLS fosters

interhemispheric interaction by increasing and equalizing activation of the two cerebral

hemispheres. Increased interhemispheric interaction, in turn, is implicated in the facilitation of

episodic retrieval. Thus, the therapeutic benefits of the EMs used in EMDR therapy may have

more to do with helping patients with PTSD overcome their dissociative amnesia and retrieve

episodic memories for traumatic events than with directly affecting emotional processes related

to the trauma and the therapeutic context. However, a possible role of EMs in the modulation of

emotional processing, in addition to the memory effects demonstrated in the current experiments, is also possible. Christman et al. (2003) reported that interhemispheric interaction was beneficial in the alleviation of stress and worry. Thus, the hypothesized increase in interhemispheric interaction induced by EMs might also help clinical patients cope with the anxiety and stress accompanying the enhanced retrieval of traumatic memories. Indeed, reduction in subjective distress levels (i.e., desensitization) is a commonly reported effect of EMDR. In this sense, the EM procedures used in EMDR may influence emotional processes in addition to memory processes. Nieuwenhuis et al. (2013) report that a brief period of bilateral saccadic EMs before the retrieval phase of a memory experiment improves memory retrieval in a wide array of tasks. These tasks include recall and recognition of words, recall of early childhood memories, recognition of details in a visual even, and recall and recognition of landmark shape and location information. EMDR treatment consists of desensitization and Resource Development and Installation (RDI) stages. Both protocols provide a positive alternating BLS (Amano & Toichi, 2016). This technique involves a unique procedure where by a therapist exposes the patient to BLS, which involves alternating bilateral visual (EM), auditory, or sensory stimulation (e.g., tactile stimulation). The customary EMDR protocol consists of two main stages, desensitization of traumatic memories and development along with installation of a resource (e.g., safe and pleasant thoughts). In the conventional protocol, both stages use alternating BLS. BLS is performed simultaneously with the recall of the worst image of the trauma and the resources installation. The RDI has become a powerful psychotherapeutic tool for relaxation and encompasses a wide range of resource development interventions during the stabilization phase of PTSD treatment (Amano & Toichi, 2016). Results indicated that using BLS increased the effectiveness of RDI over not using BLS (Amano & Toichi, 2016).

Christman et al. (2003) report that an alternative neural basis for EMDR, arguing that the recurrent redirecting of attention in EMDR induces a neurobiological state. The authors argue that it is similar to that of rapid eye movement (REM) sleep, which is optimally configured to support the cortical integration of traumatic memories into general semantic frameworks. This framework predicts that the direction (horizontal vs. vertical) and nature (saccade vs. pursuit) of EMs should not matter, as all involve the redirecting of attention. The fact that only horizontal saccadic EMs produced significant effects on episodic retrieval suggests that the redirecting of attention, albeit possibly necessary, is not sufficient. The current results strongly suggest that facilitation of interhemispheric interaction lies at the heart of EMDR's efficacy. With this understanding, it is interesting to note the similarities between EMDR and REM sleep are consistent with the current framework, as there is conjectural evidence that REM sleep may be necessary for the consolidation of various types of memory (Christman et al., 2003). In another hypothesis about the mechanisms underlying the efficacy of EMDR also proposes that bilateral neural activation (specifically, in the anterior cingulate cortex) is essential (Christman et al., 2003). Nieuwenhuis et al. (2013) relate that previous research reveals intriguing relationships between saccadic EMs and memory. First, REMs during sleep, of which the majority are in the horizontal direction, are critical for memory consolidation. Second, during demanding memory retrieval, people tend to make more saccades than during simple retrieval.

Clinical Practice Guidelines for EMDR

The various CPG segments presented below recount the appraisals and qualifications of EMDR from seven prominent multinational organizations (with the exclusion of the American Psychological Association, covered in Chapter 1 Introduction, under the section: Posttraumatic Stress Disorder Treatment Modalities, and Chapter 2 Literature Review, under subsection: Eye

Movement Desensitization and Reprocessing [EMDR] appraisal [Medical Model or Contextual Model] respectively). The following CPGs consist of the most recent guidelines for treatment of PTSD and Acute Stress Disorder within these professional institutions: a) American Psychiatric Association, in 2010 with their Practice Guidelines for the Treatment of Patients with Acute Stress Disorder and Posttraumatic Stress Disorder; b) Canadian Agency for Drugs and Technologies in Health (CADTH; 2018) with their Post-Traumatic Stress Disorder: Summary of evidence of the clinical effectiveness of treatments; c) International Society for Traumatic Stress Studies in 2018 with their PTSD Prevention and Treatment Guidelines Methodology and Recommendations; d) Great Britain's National Institute for Health and Care Excellence (NICE) (2018) PTSD Guideline (NG116); e) Phoenix Australia Centre for Posttraumatic Mental Health in 2015 with their Australian Guidelines for the Treatment of Acute Stress Disorder & Posttraumatic Stress Disorder; f) VA/DoD CPG Working Group in 2017 with their Management of Post-Traumatic Stress; g) World Health Organization, in 2013 with their Guidelines for the Management of Conditions Specifically related to Stress.

Institute of Medicine. The IOM (2011) reveals that the Agency for Healthcare Research and Quality's National Guideline Clearinghouse contained nearly 2,700 clinical practice guidelines (CPGs). They indicate that parallel growth in CPGs occurred in other countries, with the Guidelines International Network's database listing more than 3,700 CPGs. According to Watkins, Sprang, and Rothbaum (2018) guidelines are not standards, which would render them obligatory or mandatory by definition. Instead, the IOM (2011) clarifies that CPGs are generally a systematic aid to formulating difficult clinician and patient healthcare decisions, thereby enhancing intervention quality and outcomes. Forbes et al. (2010), further refine the above positions, describing CPGs as scientifically developed statements to assist both the practitioner's

and patient's conclusions about appropriate health care for specific clinical circumstances. The IOM (2011) signifies that research has shown that CPGs can reduce inappropriate practice variation. They also indicate that CPGs may enhance translation of research into practice. Additionally, CPGs improve healthcare quality and safety. The IOM (2011) indicates that CPGs have also had a significant influence on the development of clinical performance measures. Forbes et al. (2010) explain that several practice guidelines have appeared to inform clinical work in the assessment and treatment of posttraumatic stress disorder as they contribute, drastically, to the betterment of health care provision and client outcomes. Consequently, this subsection strives to examine an assortment of transnational guidelines and compare their recommendations concerning PTSD and EMDR.

American Psychiatric Association. The American Psychiatric Association (APA) is the main professional organization of psychiatrists and trainee psychiatrists in the United States, and the largest psychiatrically focused body in the world. The APA CPG provides evidence-based recommendation for the assessment and treatment of psychiatric disorders. This organization indicates that CPGs are intended to assist in clinical decision making by presenting systematically developed patient care strategies in a standardized format. The APA (2010) practice guidelines indicate that EMDR is an effective treatment for the essential core symptoms of acute and chronic PTSD. The guidelines cite the meta-analyses of various controlled trials which concluded that EMDR represents an effective treatment (APA, 2010). They also judge CBT as being effective. Moreover, they relate that this indication may also exist for stress inoculation, imagery rehearsal, and prolonged exposure techniques for treatment of PTSD and PTSD-associated symptoms such as anxiety and avoidance. They declare that all of the treatments mentioned above may have a critical intervention component which exists as a shared

element of controlled exposure of some kind. The APA also reports that "No controlled studies of psychodynamic psychotherapy, EMDR, or hypnosis have been conducted that would establish data-based evidence of their efficacy as an early or preventive intervention for ASD or PTSD" (p. 13). The APA (2010) further indicates that most of the well-designed EMDR studies have small sample sizes, analogous to many of the studies of other cognitive behavior and exposure therapies. However, several meta-analyses demonstrated efficacy for this treatment modality which they believe are similar to other forms of cognitive and behavior therapy. In short, the APA states that EMDR belongs within a continuum of exposure-related and cognitive behavioral treatments. They reason that EMDR employs techniques which could provide the patient with more control over the exposure experience. They posit that EMDR is less reliant on a verbal account, and provides techniques to regulate anxiety while undergoing the treatment. More to the point, they believe it may prove advantageous for patients who cannot tolerate prolonged exposure and patients having difficulty verbalizing traumatic experiences. They indicate that comparative studies of EMDR with other treatments using larger samples are needed to clarify treatment differences (APA, 2010).

Canadian Agency for Drugs and Technologies in Health. The Canadian Agency for Drugs and Technologies in Health (CADTH) is an independent, Canadian, not-for-profit organization that provides research and analysis to Canada's healthcare decision-makers. This organization performs these explorations with the objective of assisting Canadian leaders in making informed choices about their nation's healthcare system. CADTH's methods and guidelines capture advances in best practices, establish a uniformly high level of rigor while providing transparency to enable uniformity of evidence-based information, and continuous improvement. CADTH, in their Summary of Evidence of the Clinical Effectiveness of

Treatments of PTSD (2018), convey that the disorder is composed of defectively stored and incompletely processed memories. They assert that these faulty recollections are also the root cause of several other disorders, including adjustment disorders, various forms of depression, and anxiety disorders. They speculate that EMDR guides an individual in reprocessing memories of traumatic events by identifying more positive aspects of the trauma recollections to thereby aid in replacing the problematic portions. It involves reproducing distressing images along with associated negative cognitions and bodily sensations while engaging in eye movements (EMs) guided by the clinician. They relate that the effectiveness of EMDR compared with other psychological interventions (e.g., cognitive behavioral therapy, cognitive processing therapy, prolonged exposure, deep brain processing, acceptance and commitment therapy) for adults with depression, anxiety, or PTSD remains unclear (CADTH, 2018). They speculate that a review of the available evidence regarding the clinical effectiveness of EMDR will assist in formulating decisions for the optimal management of depression, anxiety, and PTSD. CADTH indicates that one of their key findings related to PTSD, explicitly, is that limited-quality evidence suggests that treatment with EMDR results in significantly better outcomes when compared with waitlist or usual care. However, outcomes in PTSD patients treated with EMDR compared with other active treatment modalities was inconsistent (CADTH, 2018).

International Society for Traumatic Stress Studies. The International Society for Traumatic Stress Studies (ISTSS) is an international interdisciplinary professional organization that promotes advancement and exchange of knowledge about traumatic stress. The ISTSS Prevention and Treatment Guidelines are intended to assist clinicians who provide prevention and treatment interventions for individuals with, or at risk for developing, PTSD and complex

PTSD. ISTSS (2018) indicates that single-session EMDR within the first three-months of a

traumatic event has promising evidence of efficacy for the prevention and treatment of PTSD

symptoms in adults. However, they also report that there is insufficient evidence, at this time, to

recommend the treatment for the abovementioned purpose. Next, the ISTSS reviewed multiple

session, early treatment interventions. In this regard, they recommended EMDR within the

initial three-months following a traumatic event for treatment of PTSD symptoms in adults.

They also endorsed Cognitive Behavioral Therapy with a Trauma Focus (CBT-T or Trauma-

Focused Cognitive Behavioral Therapy [TF-CBT]) and Cognitive Therapy for the previously

mentioned function. Lastly, they strongly recommend EMDR for adults with PTSD. In

addition, they recommended Cognitive Processing Therapy (CPT), Cognitive Therapy (CT),

Individual CBT with a Trauma Focus, and Prolonged Exposure (PE).

       National Institute for Health and Care Excellence. The National Institute for Health

and Care Excellence (NICE) is an executive non-departmental public body of the Department of

Health in the United Kingdom which provides guidance and advice to improve their national

health and social care. The NICE (2018) PTSD Guideline (NG116), covers recognizing,

assessing and treating PTSD in children, young people and adults. It aims to improve quality of

life by reducing symptoms of PTSD such as anxiety, sleep problems, and difficulties with

concentration. Recommendations also aim to raise awareness of the condition and improve

coordination of care. NICE (2018) recommends that clinicians consider EMDR for adults with

PTSD diagnoses, and they approve consideration of EMDR for clinically important symptoms of

PTSD in those who present between one and three months after a non-combat-related trauma if

they indicate a preference for EMDR (NICE, 2018). NICE also suggests extending EMDR to

adults with PTSD or clinically significant symptoms of PTSD, presenting more than three

months after a non-combat-related trauma (NICE, 2018). The organization declares that there

was less evidence for EMDR than TF-CBT but agreed that available data justified prescribing

the treatment. Still, NICE maintains that although studies which compared EMDR directly with

TF-CBT showed no significant differences, they also confirm a trend in favor of EMDR. This

trend in favor of EMDR was also present in cost effectiveness results (NICE, 2018). However,

NICE confirmed that their evidence suggested that EMDR was not effective for military combat-

related trauma. This data was in marked contrast to all other analyzed trauma types with

observed progress. On this premise, NICE's endorsement committee restricted their sanction of

EMDR to non-combat-related trauma. They relate that the majority of their data came from

adults exposed to one or more traumatic events over three months previous to their examinations.

Limited evidence showed benefits between one and three months after trauma. NICE divulged

that they derived their understanding from limited evidence and by extrapolating from the

stronger evidence for EMDR in those presenting more than three-months after trauma; therefore,

the committee recommended considering EMDR between one and three months after a non-

combat-related trauma (NICE, 2018). NICE states their endorsement was made with lower

confidence than treatment after three months because of the minimal direct evidence (a single

study) and limited evidence suggesting non-statistically significant benefits of EMDR within one

month of trauma (NICE, 2018).

Phoenix Australia Center for Posttraumatic Mental Health. Phoenix Australia is a

not-for-profit organization dedicated to reducing the impact of PTSD by building the capability

of individuals, institutions, and the community to understand, prevent, and recover, from PTSD.

Approved by Australia's National Health and Medical Research Council (NHMRC; Australia's

central government entity supporting mental health and medical research), the Australian

Guidelines for the Treatment of Acute Stress Disorder (ASD) and Posttraumatic Stress Disorder (2015) provide recommendations on the best interventions for individuals exposed to potentially traumatic events, ASD, or PTSD. The CPG is designed to be used by a) general and mental health practitioners across clinical settings; b) trauma sufferers and their loved ones, making decisions about treatment; and c) funding bodies making service purchasing decisions. Phoenix Australia (2015) indicates that their CPGs were developed by leading Australian trauma experts, collaborating with representatives of the professional associations and various mental health clinicians. Their recommendations focus on best practice evidence found through a systematic review of the Australian and international trauma literature. The Phoenix Australia Center for Posttraumatic Mental Health (2015) express that considerable debate exists, surrounding the contribution of the eye movements as an active treatment component in EMDR. However, they relate that EMDR, along with TF-CBT, is the best approach to treat adults with PTSD. They also indicate that these ameliorative treatments involve confronting the memory of the traumatic event while coming to terms with the experience, with EMDR repeatedly demonstrating effectiveness in reducing PTSD symptoms relative to a waitlist and nondirective counseling.

> **VA/DoD Management of PTSD and Acute Stress Reaction.** The VA and DoD (2017) relate concerning their CPG that:

> The Department of Veterans Affairs and the Department of Defense guidelines are based upon the best information available at the time of publication. They are designed to provide information and assist decision making. They are not intended to define a standard of care and should not be construed as one. Neither should they be interpreted as prescribing an exclusive course of management (p. 1)

> Within the VA/DoD (2017) document that they strongly recommend specific manualized

trauma-focused psychotherapies with the predominant component of exposure and/or cognitive restructuring for use with PTSD sufferers, which includes EMDR. Along with this, they endorse Brief Eclectic Psychotherapy (BEP), specific CBTs for PTSD, CPT, Narrative Exposure Therapy (NET), PE, and written narrative exposure. They also declare that one of the trauma-focused psychotherapies with the most persuasive evidence from clinical trials is EMDR (alongside CPT and PE). They advised that these were tested in numerous clinical trials, on patients with complex presentations and comorbidities, as well as in comparison to active control conditions. In addition, these individuals had long-term follow up and validation of result via research teams other than the developers.

  World Health Organization. The World Health Organization (WHO) is an agency in the United Nations dedicated to international public health. They indicate that their mission is the highest possible level of health for humanity. Concerning EMDR, WHO (2013) indicates

  This therapy is based on the idea that negative thoughts, feelings and behaviors are the

  result of unprocessed memories. The treatment involves standardized procedures that

  include focusing simultaneously on (a) spontaneous associations of traumatic images,

  thoughts, emotions and bodily sensations and (b) bilateral stimulation that is most

  commonly in the form of repeated eye movements (p. 1)

  WHO recommend consideration of EMDR (along with CBT with a trauma focus and stress management) for adults with PTSD. They attribute a moderate rating to the quality of their data for this statement. They express that they cannot endorse EMDR for acute traumatic stress (defined as re-experiencing, avoidance, hyperarousal) symptoms experienced after a potentially traumatic recent event, however, the WHO divulge that the quality of their evidence is "very low" regarding this assertion. They forward similar accounts about EMDR for adults

with acute traumatic stress symptoms associated with significant impairment in daily functioning in the first month after a potentially traumatic event.

In closing, because this is a secondary accounting of guidelines from the aforementioned organizations, readers are encouraged to read CPGs regarding EMDR. Inside the organizational guiding principles discussed above, EMDR is represented with some disagreement across CPGs. Still, the IOM (2011) articulates that our understanding of the impact of CPGs on clinical practice and patient outcomes is, at best, limited. Moreover, even when a CPG assertion exists, interpretation of the hypothetical evidence is still required to translate a statement about the investigatory findings to a declaration of recommended action (Forbes et al., 2010). Thus, CPGs are only one component of good clinical decision-making that is supplementary to patients' preferences and values, clinicians' standards and experience, as well as the available resources. The extent to which these factors are considered in a set of guidelines is obviously incomplete and imperfect. Regardless, the absence of clear-cut confirmation does not equate to evidence of the absence of a treatment effect. That said, a need exists for practice guidelines to rise above this debate and to provide objective and dispassionate recommendations based on the available evidence. On balance, interventions with the most substantial, reliable, comprehensive evidence should determine the first line treatment for PTSD whenever possible, with consideration of patient preferences and values and clinician expertise (Watkins, Sprang, & Rothbaum, 2018).

Obstructions to Treatment within Military and Veteran Populations

Attitudes and perceptions of mental health treatment. When returning to an ordinary life on the home front, many veterans find the conduct maintained by the civilian population at large strikingly unconnected to their wartime experience. Hoge (2011) asserts that a paradox of war exists, in which the symptoms of PTSD are often believed to be adaptive for military

personnel while serving in combat. Thus, combatants who are deemed to be the highest

functioning by their wartime comrades are often not recognized as having trauma when making

administrative preparations to return home. Research by Gates et al. (2012) supports the

conclusion that veterans with a history of PTSD have a higher risk of infectious disease,

cardiovascular, respiratory, and gastrointestinal problems, nervous system and autoimmune

disorders, as well as anxiety, depression, and substance abuse. With this array of indicators and

comorbidities, is it any wonder that Sayer et al. (2010) found veterans with presumed PTSD

reported more problems with private citizen reintegration than did their counterparts without

presumed PTSD?

Stigma in the military, an obstacle particularly salient for those wishing to make a career

of the armed forces, can prevent personnel from seeking mental health care. Examples of

inferences within the military related to PTSD identification might include the perception of

weakness and unreliability by unit leadership and peers. Even in the face of documented need,

substantial portions of returning OEF/OIF combatants have declined to access existing mental

health services in the MHS/VHA. For example, in a national survey of post-9/11 veterans, only

25 percent sought outpatient mental health care (Elbogen et al., 2013; True, Rigg, & Butler,

2015). Of that 25 percent, 46 percent found care at an MHS/VHA facility, while 37 percent of

them sought care from a non-MHS/VHA facility and 16 percent sought care from both. Less

than half of active duty combatants with a recent diagnosis of PTSD (within six months),

received any mental health care upon their return from deployment (Hoge et al., 2014; True et

al., 2015).

The fear of disclosure and stigmatization regarding mental health, and its subsequent

treatment, discourage help-seeking behavior within the military due to the negative career

repercussions. Further, policy language excluding service members with mental health disorders from career opportunities may prevent some service members from seeking care (Acosta et al., 2014; Acosta et al., 2016). True et al. (2015) reported that two forms of stigma; social-stigma and self-stigma, act as barriers to service members and veterans seeking treatment. Frost (2011) defines social stigma regarding stereotypes which represent commonly held generalizations about qualities of people based on their membership in stigmatized groups or possession of a stigmatized attribute. Corrigan and Rao (2012) define self-stigma regarding self-discrimination, in which internal and subsequent behavioral processes lead to social isolation and ostracism (e.g., believing that one develops PTSD because they are dangerous or cowardly and not worthy of care). Personal perceptions and experiences may also drive service members' attitudes. Potential consequences associated with treatment-seeking stigma can lead service members to hide the mental illness from family, friends, and colleagues for fear of personal embarrassment, disappointing comrades, losing the opportunity for career advancement, or receiving a dishonorable discharge (American Psychological Association, n.d.; Tanielian et al., 2017).

Research on stigma unearths both strengths and weaknesses in policy and institutional culture within DoD. Research suggests that DoD efforts to reduce the stigma associated with mental health treatment-seeking reflect best practices and may contribute to reduced self-reported stigma among service members (Acosta et al., 2016). However, it can also be argued that stigma continues to pose a barrier to mental health treatment for some service members and veterans, a problem for which stakeholders have recommended a range of policy solutions, including collaborative care (incorporating behavioral health into primary care settings) and improved confidentiality of mental health care.

The DoD has made efforts to encourage service members to seek mental health care if

they feel they need it. Both the DoD and VA have introduced several initiatives to increase referral of recently separated veterans to existing health services (Spelman, Hunt, Seal, & Burgo-Black, 2012; True et al., 2015). Under recently changed security clearance procedures, service members do not need to disclose treatment for combat-related issues or marital counseling to their military chain-of-command. Commanders of active duty personnel or National Guard/Reserve personnel on deployment, although not health providers, were privy to the details of their subordinates' care until recently (Neuhauser, 2010; Tanielian et al., 2017). As a result, some personnel indicate that they prefer to seek care in a community care setting because it offers the likelihood of confidentiality in addition to appointment times outside of work hours. Engel (2014) cites studies which recommend reconsidering the role of commanders in the mental health dispensed to their subordinates due to potential barriers to care associated with lack of confidentiality. Despite these recommendations, commanders may still have access to service members' health information despite current policy.

Furthermore, some DoD communications about military mental health policies seek to assure service members that getting help will not impact their careers, and many military leaders have come forward to disclose their own experiences with treatment-seeking. Service members may also receive duty limitations or separations; if they fail to heed the warnings that commanding officers will institute penalties for not seeking mental health care for their observed symptoms (National Alliance on Mental Illness [NAMI; See Appendix A, Figure 1, Item aa], n.d.; Tanielian et al., 2017).

While traditional systems of care strive to adapt to mounting veteran mental health treatment needs, they still face ever-growing problems. Potential patients' concerns about career repercussions, combined with other negative attitudes and perceptions about mental health,

remain a problem in the governmental systems serving veterans, as well as in private and community systems of care. Globally, such concerns are often classified under the label of stigma, a documented problem in the long-suffering civilian population (Russell, 2010). Over the past decade, several policies and program solutions have been promulgated to reduce the stigma associated with mental health treatment-seeking (Jorm, 2000). Efforts are also underway to improve mental health literacy among the public, as the fears that fuel stigma tend to arise from ignorance (Collins, Hewson, Munger, & Wade, 2010). Nevertheless, the increased number of veterans after 9/11 along with an ever-increasing number of elderly veterans seeking treatment means that the VA may sometimes be overwhelmed (LeMire & Mulvihill, 2017). Additionally, providing increased and varied treatment outlets for mental health care might help to decrease stigma and improve health outcomes (Collins et al., 2010).

The PTSD Problem in Minnesota

Thus far, the review of the literature focused on the diagnostic classification for PTSD. This chapter also explored the experience of PTSD among OEF/OIF military personnel and veterans as a whole, along with the establishment of estimated prevalence rates. It examined the treatment structure for current systems of care addressing the disorder within the VA and military. This chapter also identified recent delivery innovations for expanding the capacity of the treatment structure to meet demand. Further, this writing characterized the effective treatment modalities for PTSD. This chapter then delineated the forms of obstruction which military and veteran populations face regarding seeking treatment. This section of the introduction chapter turns now toward illustrating the experience of PTSD in Minnesota.

Little literature exists concerning the prevalence rates for veterans suffering from PTSD in Minnesota, a state with a military component which is primarily comprised of National Guard

and Reserve personnel. However, according to the U.S. Census Bureau's 2016 American Community Survey 1-Year Estimates, Minnesota had a veteran population of 310,786 in that year (Margin of Error +/-6,190). Despite a lower threshold, to some extent, Minnesota's local PTSD rates reflect the problem veteran populations face nationally. Regarding national estimates, the literature acknowledges that a substantial proportion of combatants return from deployment with psychological injuries warranting specialized interventions (Milliken et al., 2007; Seal et al., 2009), which may justify some increase in the diversity of treatments made available to veterans in Minnesota. Holdeman (2009) indicated that 12 percent of OEF/OIF veterans who responded while enrolled for care at the Minneapolis, MN, Veterans Affairs Medical Center (Minneapolis VAMC; See Appendix A, Figure 1, Item ab) and who were not already accessing mental health care at the VA screened positive for PTSD. Moreover, since 2007, 18 members of the Minnesota State National Guard completed suicide, a number only surpassed by the 20 National Guard suicides in Oregon (Brunswick, 2011).

According to the Star Tribune, per Brunswick (2011), in a joint meeting of the House Veterans Services Division and the Senate State Government Innovation and Veterans Committee, the Adjutant General for the Minnesota National Guard, Major General Rick Nash, indicated that the state of Minnesota had suffered the highest number of suicides among its National Guard members. Tragically, eight Minnesota Guard soldiers completed suicide in 2009 (Brunswick, 2011). As of 2011, Minnesota ranked second in the nation in some suicides (Brunswick, 2011). Minnesota still shows the second-highest suicide rate in the country when members of the Army Reserve are included, with 27 deaths since 2005, trailing only Texas at 30 (Brunswick, 2011). Significantly, Minnesota National Guard was the eighth-largest state contingent in the nation. Equally astonishing was the fact that Minnesota National Guard

suicides were by soldiers who had never deployed to a war zone (Brunswick, 2011). Moreover, Minnesota surpassed the rest of the country in suicides among National Guard members not on active duty. Some of the victims had not yet attended basic training (Brunswick, 2011).

Veteran Resilience Project (VRP)

The Trauma Recovery/EMDR Humanitarian Assistance Programs (Trauma Recovery/HAP; See Appendix A, Figure 1, Item ac) is the original catalyst for the Veteran Resilience Project of Minnesota (VRP). Trauma Recovery/HAP's mission is to aid in building competence for effective EMDR treatment of traumatic stress disorders in underserved communities worldwide (Humanitarian Assistance Programs, n.d.). As an organization employing not only practitioners but also evaluators, in order to provide professional support for clinicians trained in EMDR, Trauma Recovery/HAP has an additional mandate of promoting clinical standards for the use of this clinical modality. In this regard, Trauma Recovery/HAP envisioned VRP as a body to assist MN veterans and service personnel, giving them access to EMDR treatment and serving as a template/model for future Trauma Recovery/HAP outreach projects. Though the VRP commenced its earliest operations ventures with Trauma Recovery/HAP, the VRP's ongoing MN veterans and service-connected personnel focus proved to be a poor fit for the two organizations and they parted company in mid-2015. When Trauma Recovery/HAP suspended funding for the VRP, it reverted to a standalone project.

Trauma Recovery/HAP, as an organization, was established in response to the Oklahoma City bombings in 1995. The original request for help came from a Federal Bureau of Investigation agent who had previously received EMDR therapy (Rivard, n.d.). According to the VRP, the local mental health professionals could not keep up with the demand for their services after the bombings (Rivard, n.d.). In response, approximately one hundred volunteer frontline

responders to the crisis were trained in EMDR therapy and worked in rotation to provide pro-bono treatment to victims. An evaluation of the program recognized beneficial results, and so more free training in EMDR techniques were offered to clinicians.

Given the incidence of PTSD and the costs it exacted upon Minnesota veterans and service connected personnel, the founder of Veteran Resilience Project of Minnesota, Inc., and Board President, Elaine Wynne reports planning for the VRP began in May of 2012, with the initial operations commencing in January of 2013 when the VRP became a 501(c) (3) charitable organization (Rivard, n.d.). The VRP then brought EMDR treatment to Minnesota veterans, with the additional support of the Veteran Justice Corps (See Appendix A, Figure 1, Item ad), which offered hundreds of hours of pro-bono assistance, and the McCormick Foundation (See Appendix A, Figure 1, Item ae), which provided small donations. This outreach project successfully provided EMDR to veterans who would not have otherwise received EMDR, with the organization having further assisted EMDR training programs in the Minnesota Department of Veterans Affairs (Rivard, n.d.).

Additionally, the VRP program benefited from the identification and training of qualified clinicians in the community, orienting these individuals specifically to military culture and related clinical concerns. Subsequently, VRP identification and development of local clinical resources served to supplement the overall resource pool of veteran services in the Minnesota area. Further, the VRP acts as an alternative to traditional VA resources, especially in rural areas lacking access to VA Centers. Funds for the VRP are channeled exclusively toward improving the lives of Minnesota Veterans who experience PTSD as well as awareness and delivery of EMDR treatment. As a result, clinicians maintain their independent offices in over 20 locations throughout the greater Minnesota area.

Collateral information about the VRP. An outside committee member of the present

dissertation who is connected with the VRP provided the following statement about the EMDR

services offered by the VRP:

> One small point is that the EMDR provided by VRP was not "short term" EMDR. Since
>
> EMDR is not manualized like CPT and PE the content per session and hence the number
>
> of sessions is not fixed. The decision to offer at no cost 10 individual sessions and 2
>
> family couples sessions if needed was based on clinical experience with providing
>
> EMDR (Joseph Graca, Ph.D., personal communication, April 9, 2019)

Program Evaluation

The rationale behind any program evaluation dissertation, as articulated by Rossi, Lipsey,

and Freeman (2003), lies in the fact that a program evaluation formulates value judgments about

a program. This attribute stands in opposition to program evaluations of past eras, which were

conducted by applied social scientists using conventional experimental methods that proved to be

a poor fit for the disordered and dynamic nature of authentic program evaluation (Mathison,

2004). Two fundamental issues in program evaluation are 1) determining what the effects

(outcomes) of the program have been over a specific period and 2) determining the extent to

which the particular program, rather than other factors, has caused those effects (Newcomer,

Hatry, & Wholey, 2015). Arriving at such determinations stands in contrast to a standard

research project dissertation, which introduces a variable to a system and considers the

significance of outcome (Rossi et al., 2003). In addition, Rossi et al. (2003) indicate that

program evaluation requires different strategies depending on the needs of the assessment. A

program evaluation researcher may choose from among the following five categorical

approaches: a) Needs assessment, which is a process by which priorities may be set in the

decision-making process of organizational improvement or allocation of resources; b) Design

evaluation (formative), which is conducted during the development of a program; c)

Implementation of a program (process), focuses on the activities as a program is delivered; d)

Outcome evaluation (summative), which is an evaluation done at the completion of a program;

reports on the program rather than to the program; and e) Evaluation of program efficiency

determines the extent to which program outcomes are a waste of resources. These are further

detailed in Table 4 (See Appendix B). The categorical approach which will be employed in this

evaluation depends primarily on the evaluation question(s).

Structure of the Program Evaluation for the VRP

The VRP has been active in finding ways to demonstrate the value of EMDR therapy for

veterans who may experience PTSD symptoms and challenges within and upon returning to the

Minnesota community. The formal evaluation questions comprising the focus of this study grew

out of the VRP's desire to reach a more significant portion of the veteran population at need (See

Appendix A, Figure 1, Item af) within Minnesota. Moreover, the leadership of the NPO has

related that outreach is the most important measurement of success within the project through a

grant. Because the VRP is ostensibly focused on augmenting capacity, as outlined in this

chapter, this is an applied external program evaluation, program implementation type. Mathison

(2004) defines an external program evaluation as a program evaluation which is not conducted

by an evaluator who is an employee of the organization which retains the object of the evaluation

(e.g., the program). Mathison credits external evaluators with bringing objectivity,

accountability, and perspective to the mission (2004). However, of the three characteristics

forwarded above, Mathison posits that objectivity is the key component that distinguishes an

external evaluator from an internal one (2004).

The uniqueness of the Minnesota VRP as a mental healthcare organization, as well as its OEF/OIF military client focus, intrinsically demonstrates a gap in both the clinical psychology and program evaluation literature. Therefore, as an adjunct to the forthcoming investigation of this disparity, the program's self-perceived barriers to capacity are noted below and considered in terms of contemporary literary research in Chapter II. Following this, Chapter III will detail the forthcoming research procedures used to outline available methods to generate data by-products in the results Chapter IV, leading to the final discussion of the investigation in the Chapter V program evaluation conclusion. Thus, with objectivity, accountability, and perspective at the forefront of consciousness in undertaking this evaluation, we examine three questions for the VRP of Minnesota:

1) What are approaches that can be used to efficiently recruit veterans for mental health treatment?

2) What are efficient strategies for retaining treating mental health clinicians and staff?

3) What is the efficacy of the EMDR therapy treatment employed by the Veteran Resilience Project of Minnesota?

The exact form of the evaluation questions listed above was contingent upon the recommendations of the VRP and its associated stakeholders. Accordingly, this process prerequisite should exert a restraining effect upon the methods employed in this evaluation of the VRP. Consequently, the articulation above is a simple declaration of the evaluation questions content presented initially in the Dissertation Prospectus per the VRP Site Coordinator and guiding its initial exploration in the pursuing chapter.

Chapter II: Literature Review

Chapter I presented an informal needs assessment to establish the current context for the

broad U.S. Armed Forces PTSD-related crisis, providing readers with a background for the

Veteran Resilience Project of Minnesota (VRP) and providing rationale for VRP's creation.

Conspicuously, this program evaluation bypassed a formal needs assessment because the

program was already in operation, eliminating the need for program prerequisites. Nevertheless,

the program's previously realized utility, goals, and objectives, otherwise known as the program

theory, require further examination.

Regarding program theory in program evaluation, Hale (2015) explained that a program

theory is integral to understanding why the program functions or does not function. Thus,

program theory summarizes the program's present structure and impact, as well as framing

recommendations for decision-making. As a result, program theory should dictate the types of

outcome measures later enlisted by the program. However, before conceptualization of the

program theory can occur, a literature review is required. This is a thorough exploration of

existing research for the environment encompassing each program evaluation question. The

literature review aims to demonstrate why particular program queries became essential.

Chapter II commences with an explanation of the review's search strategy as well as a

description of the classes of articles sought for this portion of the dissertation. A more

exhaustive explanation and justification for implementation program evaluation procedures then

succeeds the reasoning behind the practical search strategy. A conceptual framework is

presented, by which research articles address the three primary implementation program

evaluation questions (See Appendix B, Table 1). Each program evaluation question merits an

individual investigation of relevant literature. Ultimately, the leading research sections govern

subject matter progression within the uniform subsections which follow them to examine and

explain the specific inquiry topic's context and the environment in detail.

Literature Review Procedure

  Search strategy and article reviews. A systematic review is designed to advance knowledge through a summary of empirical search beyond what is already known within a research discipline using a pre-specified eligibility criterion (Roots & Li, 2013). According to van den Berg et al. (2013), researchers perform systematic reviews to synthesize results across various primary research studies that include different variables and demonstrate methodological diversity. Secondary research is also explored in this text as an additional resource for data analysis. Overall, the methodology was chosen to assist in moving VPR policy forward by expanding the program stakeholders' understanding of the extant research surrounding each of their evaluation questions and offering direction for their future inquiries.

  This investigation is launched by systematically collecting, analyzing, and synthesizing research material. Therefore, the inquiry is initially accomplished using Boolean logic to enhance the use of search conventions by constructing search strings for the existing information space (i.e., databases, library catalogs, research guides, web directories, and online commercial bookstores; Hayden, Cote, & Bombardier, 2006). For instance, database searches make use of keywords in quotations, multiple search strings, and priorities, as in "Program" (evaluation OR evaluator) AND "example" (dissertation AND thesis). In addition, a snowballing and saturation sampling approach operates as an instrument to further identify research data in undertaking this comprehensive literature review.

  These search procedures, in theory, should efficiently generate an extensive, but focused, accumulation of empirical, peer-reviewed, and professional literature for resolution of the three evaluation questions. This allows the evaluator to distinguish outdated theories and processes from forthcoming relevant ones in the areas of study. In this way, the evaluator can avoid

ineffective approaches. In other words, if search protocols are executed correctly, the literature

review should provide contemporary information stemming from prior research, regardless of the

philosophies and theories involved, to generate answers to evaluation questions like those posed

by the VRP. Hence, adhering to this procedure sets the stage for the present investigation.

Each study presented is evaluated for elements of research characteristics to answer the

three separate, but possibly related, program evaluation questions (See Appendix B, Table 1). In

this process, the selected articles are used to render hypotheses about their essential themes and

their connections. The goal is to demonstrate the salient factors that epitomize efficacious

program outcomes. Roots and Li (2013) indicated that articles for evaluation items are generally

deemed eligible for a critical review if they meet the following criteria: a) they include a research

subject, b) they report on issues, factors, and/or strategies related to an inquiry, c) they focused

on a situation, and d) they used qualitative, quantitative, or mixed-methodologies and/or

analytical techniques.

Program implementation. The present program evaluation is an applied external

program evaluation, program implementation type. Implementation science addresses

challenges associated with the use of research to achieve a more Evidence-Based Practice (EBP)

in healthcare and other areas of professional practice (Nilsen, 2015). Evidence-based practices

are discussed at length later in this chapter. According to Damschroder et al. (2009),

implementation as a concept is the accumulation of processes intended to bring an intervention

into use within an organization. Implementation refers to how an intervention is assimilated into

an organization. It is the critical gateway between an organization's decision to adapt their

routine and their actual use of newly embraced interventions. For the purposes of this

dissertation investigation, the term intervention is also broadly used to define an action taken to

improve a general situation (i.e., answer an evaluation question), rather than address a specific

medical disorder.

In their seminal 2009 paper, Damschroder et al. postulated that any implementation

technique, by its very nature, is a social process that is intertwined with the context in which it

takes place. Context, they asserted, consists of a configuration of actively interacting variables

rather than a simple backdrop for implementation. Within implementation research, context is

defined as the set of circumstances or unique factors that surround an implementation effort.

However, the theories underpinning the intervention itself and its implementation also contribute

to context. Therefore, context represents a broad scope of circumstances and characteristics.

Damschroder et al. (2009) also indicated that the term setting includes the environmental

characteristics in which implementation occurs. Most implementation theories in the research

literature use the term context both to refer to broad context, as described above, and the specific

setting in which the implementation takes place.

At present, implementation science has progressed toward increased use of theoretical

approaches which provide better understandings and explanations of how and why

implementation succeeds or fails (Nilsen, 2015). Thus, implementation science is introduced as

a conceptual framework for this program evaluation literature review because it is a theoretical

approach which has the potential to describe what influences implementation outcomes, or

determinant frameworks. Strictly speaking, implementation science is a technique used to

determine whether individual healthcare program structures, which have been previously deemed

efficacious, are generalizable to other programs given the population served, context, and setting.

Conceptual framework. Damschroder et al. (2009) explained that many interventions

found to be useful in health services research studies did not translate into positive treatment

outcomes across multiple contexts. They considered that barriers to execution may arise at

various levels of healthcare delivery; the patient level, the provider team or group level, the

organizational level, or the market/policy level. The authors went on to quantify the previous

statement by stipulating that approximately two-thirds of healthcare organizations' efforts to

implement transformation prove less than effective. To address dilemmas of this type,

implementation science employs use of theoretical approaches to provide a better explanation,

and thus, improved understanding of how and why implementation succeeds or fails.

Implementation science as a discipline offers a diverse constellation of implementation

theories, models, and frameworks to assist organizations in making appropriate selections and

applications of relevant approaches in implementation research and practice. More specifically,

determinant frameworks outline the types (otherwise known as classes or domains) of

determinants that act as barriers or enablers (i.e., independent variables) to influence

implementation outcomes (i.e., dependent variables; Nilsen, 2015). Simmons et al. (2017)

drafted the Consolidated Framework for Implementation Research (CFIR) to offer a

comprehensive and flexible determinant framework that defined the elements needed to achieve

successful implementation by exposing the relationships among causal factors. This approach

holds an overarching objective to understand and/or explain influences on implementation

outcomes (e.g., evaluations, predicting outcomes, or interpreting findings retrospectively; Nilsen,

2015).

With real-world operations in mind, Damschroder et al. (2009) related that evaluators

must recognize the need to perform not only summative evaluations of endpoint healthcare

outcomes, but also formative evaluations to assess the extent to which implementation proves

useful in a specific environment. According to their findings, this approach optimizes

intervention benefits, prolongs sustainability of the intervention in each circumstance, and promotes dissemination of findings into other milieus. Pursuant to the practical application of the presented material, the CFIR (See Appendix A, Figure 2, Item a) and its five domains are used to evaluate research material for suitability. Currently, the CFIR appears throughout the literature in VA documentation to construct effective healthcare strategies. For this reason, readers familiar with VA procedures for healthcare development should recognize this format.

The five CFIR domains are detailed in Table 5 (See Appendix B) and are briefly described here. Firstly, domain one is Characteristics of Individuals, which concerns the targets of the intervention (e.g., recipients of healthcare, clinicians, managers). Second, the Outer Setting domain is informed by the study subject's economic, political, and social context sets a local heuristic. As a component of the Outer Setting, cosmopolitanism refers to the extent to which an organization of interest networks with external agencies. Third, Inner Setting encompasses the structural, political, and cultural dimensions of institutions, including networks and communications, which refer to the social, professional, formal, and informal connections among providers within an organization. That said, Damschroder et al. (2009) indicated that the line between inner and outer setting is not always clear since the interface can be dynamic and sometimes precarious. The authors further indicate that the context of the implementation effort determines whether specific factors are considered "in" or "out". The fourth domain of CFIR is the Process of Implementation which includes planning, engaging, executing, reflecting, and evaluating novel resolutions. Lastly, the domain of Intervention Characteristics includes constructs such as evidence strength and quality, adaptability, and complexity. Outer and Inner Settings, together, comprise the context of intervention.

Program Evaluation Question 1: Approaches to Recruitment

Specific question. What are efficient strategies for recruitment of veterans for mental health treatment?

Characteristics of individuals. Perception of precisely why veterans and current service members are not utilizing existing mental health treatment is imperative as it is the initial access point to formulating an effective recruitment strategy. Graziano and Elbogen (2017) remarked on the deficient use of mental health treatment in those who have served, despite a well-documented vulnerability to PTSD and other mental health problems in veteran populations. Studies show that negative attitudes toward behavioral health services comprised the most significant predictor in those who avoided care. In fact, one of the most common reasons cited by individuals who decline mental health treatment is a preference to manage emotional concerns on their own, especially among adults in the community with low to mild psychological distress (Shepardson, Tapio, & Funderburk, 2017). Graziano and Elbogen (2017) explained that people considered their long-held beliefs about the unimportance of treatment in contrast to their immediate desire to resolve a health crisis. Nonetheless, outside pressures, or triggers, in the veterans' environment further act to encourage or discourage health-seeking behavior. Similarly, a study conducted by Sayer et al. (2009) found that the following discreet behavioral factors affected service utilization: predisposing, enabling, and need. Predisposing factors are defined as determinants that existed before the onset of an illness which contributed to an individual's propensity to use or avoid healthcare services (i.e., demographic designation, the social structure of support system, and health beliefs). Further, quantity of enabling resources (i.e., wealth, income, and insurance) obstructed or improved a sufferer's access to behavioral health services. Sayer et al. (2009) posit that need is somewhat self-evident, as it is the perceived need for care, operationalized as evaluated diagnoses or symptoms attached to ostensive demand. DeViva et

al. (2016) found that several fixed variables were associated with decreased likelihood of

behavioral health treatment utilization, such as younger age, male gender, and, curiously, being

married.

Ford and Landoll (2018) submit that service members who self-refer for treatment, rather

than being encouraged by a supervisor or directed by their command, are less likely to

experience detrimental career consequences related to mental health treatment. They also

indicate that the time in which service member self-refer has an additional benefit. They assert

that service members who seek treatment when experiencing lower levels of distress at disorder

onset are less likely to be separated from service or have other career-limiting recommendations

related to mental health concerns than their peers who seek mental health treatment when highly

distressed and given orders to do so. Ford and Landoll (2018) indicate that any service member's

request for interruption of duty is subject to the unit commander's scrutiny. Because of this,

along with structural barriers, stigma, and career concerns, many service members go outside of

MHS to obtain mental health care.

Military psychologists must balance privacy concerns with the ultimate safety of the

service member and mission. Service members and military psychologists are beholden to

Department of Defense (DoD) rules and regulations related to accessing mental health services

and reporting mental health conditions, which at times emphasize unit safety and mission

readiness over privacy (Ford & Landoll, 2018). Ford and Landoll (2018) argue that military

mental health providers should refrain from reporting the mental health or substance use

treatment information of attended service personnel when possible. However, an exception

exists when the service members may harm themselves, others, or the mission. The authors

indicate that the governing DoD Instructions (DoDI) DoDI 6490.04, "Mental Health Evaluations

of Members of the Military Services" (2013) and DoDI 6490.08, "Command Notification

Requirements to Dispel Stigma in Providing Mental Health Care to Service Members" (2011)

describe unformed provider conduct. They describe DoDI 6490.04 as policy information on

disclosure of the least amount of medical information necessary to commanding officers and

supervisor personnel uninformed patients. While DoDI 6490.08 contains guidance regarding

how healthcare professionals can maintain the balance between confidentiality and command

risk management.

Seeking treatment outside of the MHS may result in a lack of needed documentation of

mental health concerns for later disability and service-connection claims (Ford & Landoll, 2018).

There may also be additional barriers to compensation through TRICARE, the military health

insurance. Further, there will be limited access to MHS resources, which may limit continuity of

care via communication with and referral to other MHS providers. In addition, service members

who deploy or have a permanent change of duty station (PCS) during treatment will have

treatment interruptions that might have been avoided with treatment through the MHS and

shared medical records. Finally, service members may put themselves in jeopardy of violations

of the military code of justice depending on the circumstances for seeking care outside of the

MHS (Ford & Landoll, 2018). For example, section 21 of the SF86, the form service members

complete when applying for security clearance, asks respondents about their psychological and

emotional health. In 2016, the Director of National Intelligence announced that the section

would be altered to focus on determining whether a mental health condition may affect an

individual's ability to hold a sensitive position or access sensitive information rather than simply

determining whether or not an individual has a mental health treatment history (Ford & Landoll,

2018).

More active duty military service members who deployed in OEF/OIF died by suicide than by combat (Ford & Landoll, 2018). The suicide rates for all veterans and service members are higher than the general population. Data from 2000–2010 indicate that 28.7 per 100,000 women and 32.1 per 100,000 men with service histories died by suicide, compared to 5.2 and 20.9 per 100,000 of their counterparts in the general population (Ford & Landoll, 2018). According to Ford & Landoll (2018), nearly half of service members who seek treatment outside of MHS reported suicidal ideation. Beyond common risk factors, a large, prospective longitudinal study of U.S. military personnel from all service branches found male sex, depression, manic-depressive disorder, heavy or binge drinking, and alcohol-related problems to be independent predictors of suicide (Ford & Landoll, 2018).

Special populations. According to LeMire and Mulvihill (2017), social cohesion is an attractive element of the military experience. However, despite public perception that veterans and service members are a single, unified group, research shows that there are smaller groups within this heterogeneous population who may feel excluded or disenfranchised from the more extensive veteran and military communities. Based on the findings of this study, it would be of value to consider special populations and whether those populations feel included in general outreach efforts or would respond more to a tailored form of outreach. This theme begs recognition, as Sayer et al. (2009) exposed the enduring effects of experiencing an invalidating socio-cultural environment following trauma exposure. However, they related that given encouragement through systems or social networks, some veterans with individual beliefs and values that discouraged them from initiating treatment overcame those barriers. The groups discussed below comprise specialized populations most relevant to the present investigation. Beyond the special populations detailed in this section, there may be other veteran subgroups

who feel marginalized and thus reject services customarily perceived as helpful to veterans.

Female veterans and service members. Female veterans and service members not only face a unique set of pressures and challenges but are also often unrecognized as military or service members within U.S. culture. Perhaps this situation exists because they remain a substantial minority in the armed forces, making up approximately ten percent of the overall veteran population and 16 percent of those currently serving (LeMire & Mulvihill, 2017). More to the point, when women are recognized for their service, common assumptions discount their possible prior exposure to brutal combat conditions. A portion of the population regards female veterans' and service members' service as less valuable than that of male veterans and service members, who are often assumed to have undergone greater combat experience simply because of their gender.

Women constitute a unique population within the broader veteran and military communities and thus can pose a challenge to integration with general military and veteran outreach efforts (Thomas, Haring, McDaniel, Fletcher, & Albright, 2017). One challenge centers on the fact that some female veterans do not consider themselves "real" veterans and often maintain low visibility within the veteran community. This association may be related to the fact that women still experience resistance and hostility to their presence in the military, war zones, and the adjacent veteran community (LeMire & Mulvihill, 2017). The traditional image of a veteran or service member remains male, with many civilians unaware of the extent to which female service members currently engage in hostile situations (Saitzyk, Harvey, Landes, Long, & Porter, 2017). Nevertheless, it is unfortunate that the exclusive male warrior image remains doggedly consistent. Pervasive assumptions that veterans and service members are male, even in institutions purporting to serve all, may create an unwelcoming environment for women.

Perhaps as a result of such contentions, female veterans are less likely than their male counterparts to take advantage of benefits afforded to veterans, such as VA healthcare (U.S. Department of Veterans Affairs National Center for Veterans Analysis and Statistics, 2017).

Research shows that although women in the military are less likely to experience direct combat, they have similar rates of PTSD when compared to their male counterparts (U.S. Department of Veterans Affairs, National Center for PTSD, 2016). Of the entire population of OEF/OIF veterans diagnosed with PTSD, approximately 20 percent are female (Williamson, 2009). It is likely that a significant proportion of this percentage of female combatants suffer PTSD symptoms related to the experience of Military Sexual Trauma (MST). According to the VA, female service members are 20 times more likely to suffer MST than their male service counterparts (National Center for PTSD, 2016). Still, regardless of gender, MST is profoundly damaging for service members, causing them to feel betrayed by the perpetrator, the military, and often by the government support organizations responsible for providing assistance (Aktepy, 2010). Some women with history of MST associate their lack of treatment-seeking with a military culture that silences the reporting of sexual assault. Less than 15 percent of MST experiencers officially report an assault, and more than half of those who report then face social and professional retaliation for disclosing (Morral, Gore, & Schell, 2016).

Gender and sexuality minority veterans and service members. Veterans who identify as gender or sexuality minorities (i.e., those who identify as Lesbian, Gay, Bisexual, Transgender, Queer, etc. [LGBTQ+]; See Appendix A, Figure 2, Item r) comprise another group that may feel alienated from standard channels of available treatment. In 1993, the DoD introduced the Don't Ask, Don't Tell (DADT) directive that prohibited potential service members from disclosing their sexual orientation when joining the military. The policy threatened lesbian, gay, and

bisexual service members with loss of their careers if they disclosed their sexual orientation. Consequently, the U.S. military discharged 13,000 service members under DADT (Gates, 2010). The restrictions on gay service members, in fact, date back much further; with a policy formalized in 1982 declaring homosexuality to be "incompatible with military service" and leading to an average of 1,500 individuals discharged annually in the 1980s (U.S. General Accounting Office, 1992). Similarly, Cronk (2016) recounted that the U.S. military barred transgender individuals from openly serving until Congress overturned DADT legislation in 2016, with a return to the status quo under President Donald J. Trump in 2018.

The DADT directive and other policies that restricted the service of sexual minorities and transgender individuals have had long-term effects on LGBTQ+ veterans and service members. LGBTQ+ veterans discharged under DADT and the ban on transgender service members may feel as though the military has rejected them for being who they are, despite the caliber of their actions (LeMire & Mulvihill, 2017). This rejection can fuel feelings of alienation from the military community. Service members who identify as LGBTQ+ who were forced to hide part of their identity for years to pursue their career of choice were also affected by the fear of being reported and long-term effects of alienation. Service members who identify as LGBTQ+ serving openly after the repeal of DADT and the ban on transgender service members may still feel the burden of DADT's history and lingering hostility to sexual minorities in the veteran and military communities (LeMire & Mulvihill, 2017). Moreover, LGBTQ+ veterans and service members may feel that their relationships, political affiliations, and even identities are incongruous with the traditionally conservative military community and exhibit tenuous relationships with some organizations that serve the broader veteran community (National Defense Research Institute, 2010). Thus, although LGBTQ+ veterans are entitled to care at VA facilities, research indicates

that these veterans experience barriers to care related to their gender or sexual identity (Sherman, Kauth, Shipherd, & Street, 2014). For instance, transgender veterans may have trouble correcting their Certificate of Release or Discharge from Active Duty form (DD-214) to reflect a name change, but they also may face discrimination when using a DD-214 with their former name (National Center for Transgender Equality, 2015).

Veterans with disabilities. Veterans with disabilities are not marginalized in the same sense as female and LGBTQ+ veterans and service members. The service of veterans with disabilities, or "wounded warriors," is held in high esteem by other veterans and the public. However, veterans with disabilities often experience physical and mental challenges that can limit their access to services and resources. These issues may create barriers that separate or marginalize veterans with disabilities from the rest of the veteran and military communities. According to the National Center for Veterans Analysis and Statistics (2017; See Appendix A, Figure 2, Item b), 30 percent of post-9/11 veterans have a service-connected disability. Disabled veterans of this era have also sustained an average of six service-connected disabilities per individual, compared to the four and a half disabilities per individual demonstrated by the disabled veteran population overall. The most common service-connected disabilities are tinnitus, hearing loss, and PTSD (Theodoroff, Lewis, Folmer, Henry, & Carlson, 2015; Veterans Benefits Administration, 2015). Significantly, a number of service-connected disabilities are unrelated to combat. For example, military occupations such as piloting helicopters may result in service-connected hearing loss, even if the service was not directly related to conflict. Thus, it is important to consider that there may be a variety of service-connected disabilities that are invisible yet impact veterans' abilities to access critical services in tangible ways.

Incarcerated veterans. Simmons (2014) indicated that the intersection of incarceration

and mental illness particularly impacts veterans. According to the Bureau of Justice Statistics

(BJS; See Appendix A, Figure 2, Item c), in years 2011 and 2012, an estimated 181,500 veterans

(eight percent of all inmates in state and federal prisons and local jails excluding military-

operated institutions) were serving time in correctional facilities (Bronson, Carson, Noonan, &

Berzofsky, 2015). The BJS further indicated that 25 percent of veterans in prisons and

approximately 31 percent of veterans in jails reported that they had served in combat while in the

military (Bronson et al., 2015). They also recounted that veterans discharged during this period

(having served in OEF, OIF, and OND) accounted for 13 percent of veterans in prisons and 25

percent of veterans in jails. Tejani, Rosenheck, Tsai, Kasprow, and McGuire (2014) found that

incarcerated veterans are more likely to have been involved in combat than non-incarcerated

veterans.

Though Simmons et al. (2017) acknowledged the difficulty of quantifying the exact

number of veterans released from incarceration nationally on an annual basis, they believed the

population to be between 12,000 and 56,000 individuals. In a previous study, Simmons et al.

(2017) reported that approximately half of all nationally imprisoned veterans recounted having

recently experienced symptoms of mental health disorders. They found that 30 percent of

veterans were likely to report a recent history of mental health treatment, compared to 24 percent

for non-veterans. Further, approximately half of all incarcerated veterans (48 percent in prisons,

55 percent in jails) identified having a mental health disorder (Bronson et al., 2015). Imprisoned

veterans who experienced combat (60 percent in prisons and 67 percent in jails) were more likely

than noncombat veterans (44 percent in prisons and 49 percent in jails) to be diagnosed with a

mental disorder (Bronson et al., 2015).

Homeless veterans. Tejani et al. (2014) stated that past incarceration was a significant

risk factor for homelessness. They also found that destitute adults with a history of imprisonment may face particularly difficult obstacles to escaping homelessness because their previous incarceration stigmatizes them. Additionally, homeless veterans routinely exhibited prior incarceration rates above 50 percent, with the diagnosis rate of PTSD increasing with incarceration history. However, Tsai, Kasprow, Kane, and Rosenheck (2014) found that many homeless veterans were more likely to engage with caregivers through street outreach programs and tended to suffer from healthcare trends which were inversely proportional to their histories of homelessness. The authors correspondingly discovered that these long-term homeless veterans were distrustful of conventional social services (Tsai et al., 2014). Knopf-Amelung and Jenkins (2013) noted that research on the health of homeless veterans predominantly focuses on the VA. Thus, a gap in the literature may overlook service to this cohort outside this setting.

Veterans from traditionally underrepresented or marginalized groups. Veterans from traditionally underrepresented groups have a long, yet ambivalent, history of service in the U.S. Military. Serving in the military is historically a mechanism for marginalized groups within the greater American society to attempt to gain full rights, privileges, and mobility as citizens, if not citizenship itself. It is noteworthy, though, that these minority groups continue to face discriminatory treatment in the military and as veterans. Minority-identifying service members comprise approximately 31 percent of the military and 22 percent of the overall veteran population (U.S. Department of Defense 2014; U.S. Department of Veterans Affairs, 2016). With the consistency of large numbers of underrepresented veterans and active service members in current existence, it is reasonable to consider the systems supporting them and speculate whether they are presently affected by the complexities of this marginalization regarding healthcare.

Shaffer (2000) conducted research chronicling discrimination against marginalized American factions during the various U.S. involved wars. Shaffer cites prejudice leveled against African-American Civil War veterans when filing claims for veterans' pensions. Additional research demonstrates that World War II veterans of this population often experienced barriers in collecting GI Bill benefits (i.e., stipends covering tuition and expenses for veterans attending college or trade schools) with these circumstances continuing with the Readjustment Benefits Act of 1966, which extended these gains to another generation after the Vietnam War. Relatedly, during World War II, Americans of German descent received treatment starkly different from that mandated for Japanese-Americans, who were sent to internment camps and then drafted to serve in segregated military units.

Moreover, a study of Native American veterans from several eras of conflict revealed that many reported that their military experience included racial and ethnic discrimination, such as name calling or being passed over for promotion (Harada, Villa, Reifel, & Bayhylle, 2005). Research also indicates that while female service members of European descent are more likely to report sexual harassment, African-American female service members experience sexual coercion at higher rates (Buchanan, Settles, & Woods, 2008). Studies on OEF/OIF veterans observed that ethnic and racial minority veterans reported greater perceived threat in the war zone and had more family-related concerns and stressors during deployment than did veterans of European descent of the same gender (Muralidharan, Austern, Hack, & Vogt, 2016).

Impediments to religious expression, coercion, and bias remain ongoing issues in the military, as some service members feel obligated to participate in the dominant religion or find their sacred traditions stifled. For example, Muslims and other religious minorities report being harassed or criticized in the military due to their religious beliefs and practices (Constable,

2014). Additionally, veterans and service members who are not U.S. citizens may feel

marginalized by mainstream veteran and military communities. It is important to recall that

marginalization has been a part of the U.S. Military for some groups since its inception.

According to LeMire and Mulvihill (2017), veterans from traditionally underrepresented groups

who need support but are reluctant to cooperate with the VA may prove more receptive to a

program specific to their needs. For instance, 22,486 homeless veterans were served by National

Healthcare for the Homeless Council (HCH; See Appendix A, Figure 2, Item d) clinics in 2011

(Knopf-Amelung & Jenkins, 2013).

Student veterans. Many veterans are eligible for college and vocational training through

VA education benefits programs; therefore, U.S. colleges and universities have witnessed a

resulting influx of veterans in recent years (LeMire, 2015). Also, unassumingly present on

college campuses are National Guard personnel and military reservists. The Student Veterans of

America's (SVA; See Appendix A, Figure 2, Item e) National Veterans Education Success

Tracker (NVEST; See Appendix A, Figure 2, Item f) stated that approximately 148,018 veteran

students were enrolled in colleges and universities nationwide in 2017 (Cate, Lyon, Schmeling,

& Bogue, 2017). Miles (2010) related that colleges and universities across the U.S. have

witnessed the arrival of hundreds of thousands of student-veterans whose recent experiences may

have included participating in violent combat. Fortney et al. (2016) found that a significant

proportion of student veterans screened positive for PTSD (25.7 percent) when compared to non-

veteran students (12.6 percent). In short, higher combatant survival on the battlefield, when

compared to previous U.S. military campaigns, may result in an elevated incidence of PTSD

among those contemporary combatants who return to the classroom.

LeMire (2015) indicated that student-veterans, like many other post-traditional students,

face many challenges as they transition from the military to colleges and universities, having

significantly more demands competing for their time as they are often married with children.

Because student-veterans tend to be busy with these obligations and commitments, they often

cannot attend educational events or activities, such as study groups or evening lectures. Student-

veterans are also more likely than non-veteran students to spend ten hours or more per week

working at off-campus jobs (LeMire, 2015).

In 2013, the American Council on Education (ACE; See Appendix A, Figure 2, Item g)

released research proposing that student veterans differ from traditional students in several ways.

First, student veterans are older than their civilian counterparts due to having spent their typical

college years in the military. Second, although the general population of veterans are

overwhelmingly male, women are over-represented among student veterans, making up

approximately ten percent of the total veteran community but 25 percent of those in college.

Third, student-veterans are more racially diverse and likely to be first-generation students than

their civilian counterparts. Fourth, they tend to be transfer students, although they may have

been away from the classroom for a number of years before returning to campus (LeMire &

Mulvihill, 2017).

Outer setting. Graziano and Elbogen's (2017) theorization that clinicians must

distinguish between actual and perceived need for care to understand significant factors in

treatment engagement is presented. In their view, even when an individual clearly needs a

mental health intervention, that individual may not feel they require one and therefore hesitate to

seek one out. Moreover, potential clients hold their beliefs in the context of social relationships,

meaning that individuals who feel support from others could have different perceptions about the

need for treatment. As a consequence, veterans and service members necessitating

psychotherapeutic services may be avoidant of organizations which are unaware of their specific

perspectives.

Sayer et al. (2009) found that lack of knowledge about PTSD formed a barrier at both the

societal and individual levels. Within their paradigm, a delay is a substantial contributor to any

unmet need for mental health treatment. Therefore, thorough comprehension of factors affecting

an individual's pursuit of care for PTSD could advance recruitment strategies, thus encouraging

those in need of treatment. This approach is particularly salient when a veteran or service

member perceives treatment need, attempts treatment-seeking, or tries to integrate into society

following their military deployment. Clearly, belonging to the veteran and service member

special populations is one of the principal factors affecting an individual's pursuit of care for

PTSD.

Another principal factor affecting pursuit of care are the agents by which members of this

population are inclined to communicate. Hence, it is crucial to have a nuanced vision of whom

the intended beneficiaries of behavioral health services are when attempting to connect

recruitment efforts to the communities in which those interconnected with the military service

subculture reside. Restating this point, it is important to recognize that a degree of

intersectionality likely exists within the larger veteran and service member population as a whole

or any of the special populations mentioned earlier. It is also probable that a combination of

group characteristics and communication preferences are the key to a successful recruitment

strategy.

The information space. In developing the subject of communication, it is important to

realize that technology is perhaps the most influential, powerful, and pervasive social

development of our time. Because the Internet and adjacent technologies exert such a profound

effect on our daily lives, it is prudent that information technology be addressed in any discussion framing treatment-seeking and recruitment in the context of attempts at societal integration and information mobilization within the service-connected population's environment. If current trends continue, use of both social media and social networking will continue to increase internationally in behavioral healthcare contexts as well as in other complex systems in American society.

Before focusing on these platforms for health communications, it is useful to outline their general characteristics and framework. Social media and social networking are "a group of Internet-based applications that build on the ideological and technological foundations of Web 2.0 and allow for the creation and exchange of user-generated content" (Kaplan & Haenlein, 2014, p. 618; Moorhead et al., 2013, p. 2). Web 2.0 refers to World Wide Websites that emphasize user-generated content, usability (ease of use, even by non-experts), and interaction for end-users (meaning this medium functions comfortably with other products, systems, and devices).

The term Web 2.0 was popularized by Tim O'Reilly and Dale Dougherty (founder and co-founder, respectively, of O'Reilly Media) at the O'Reilly Media Web 2.0 Conference in 2004, though coined initially by electronic information design consultant Dinucci in 1999. Web 2.0 does not refer to the update of a technical specification, but instead to modifications of the way web pages are designed and used. Defining Web 1.0 is challenging for several reasons; chief among them is the fact that the definition of Web 1.0 ultimately depends upon the meaning of Web 2.0, which is generally defined as a set of techniques for Web page design and execution, though some of these methods were also integral to Web 1.0. In short, separating Web 1.0 and Web 2.0 on a timeline is not possible.

Social media versus social networking. Even though the expressions "social media" and "social networking" are often used interchangeably due to their intersections, providing opportunities for users to generate, share, receive, and comment on social content among multi-users through multisensory communication, they are not synonymous. Ramo, Rodriguez, Chavez, Sommer, and Prochaska (2014) specify that social media functions as a communication channel that delivers a message asking for something. Social media can be classified in several ways to reflect the diverse range of social media platforms, such as collaborative projects (e.g., Wikipedia), content communities (e.g., YouTube), and virtual game and social worlds (e.g., World of Warcraft and Second Life). Social networking, rather, is a two-way and direct form of communication that includes sharing of information between several parties (e.g., Facebook, Students Circle Network, and Academia.edu).

Moorhead et al. (2013) suggested that, though related, social media and social networking comprise separate elements; one media-related and the other social dimensional. The media-related aspect involves a determination of how closely various types of social media resemble synchronous face-to-face communication, particularly in terms of how well they reduce ambiguity and uncertainty in interactions. The social-facet hinges more on sociologist Erving Goffman's (1959) "self-presentation construct," whereby individuals' interactions serve the purpose of attempting to control others' impressions of them (Ramo et al., 2014).

To illustrate the social utility of online platforms, Kietzmann, Hermkens, McCarthy, and Silvestre (2011) presented the social media ecology model to explore the diverse form and function of different social media platforms. Though referring to the definitions of social media and social networking, this model uses both social media and social networking under the title of social media. That said, this concept is comprised of a honeycomb framework of seven building

blocks which are configured by various social media platforms and have implications for

organizations interested in the enhancement of patient treatment seeking behavior. An example

would be systems within online treatment venues dominated by healthcare providers. The

conceived building blocks use the following constructs: a) Identity: the extent to which users

reveal themselves, b) Conversations: the degree to which users communicate with each other, c)

Sharing*:* the measure with which end users exchange, distribute, and receive content, d)

Presence: the extent to which users are aware of others' availability, e) Relationships: the degree

to which users relate to each other, f) Reputation: the degree to which users know the social

standing of others and content, and g) Groups: the degree to which users are ordered or have

formed communities. A fusion of group characteristics and communication preferences are vital

to deliberate positive recruitment.

Inner setting. Hoge et al. (2014) articulate that efforts to improve post-deployment

screening for PTSD have garnered enormous success inside the MHS and VHA. Thus, these

veteran and service member connected healthcare organizations, which commonly make

determinations about patient appropriateness for psychotherapy, are under pressure to respond

judiciously through increased access to psychotherapeutic treatments for those screened positive

for PTSD (Spoont, Sayer, Kehle-Forbes, Meis, & Nelson, 2016). Despite the resulting pressure

derived from the success of these latest screening measures, providers within these systems, with

responsibility, must often make cost-benefit decisions regarding which patients to triage to time-

and resource-intensive individual psychotherapy.

Hoge et al. (2014) recount that consistent treatment acquisition for those with the most

significant need for care remains low within the DoD and VA. In a study conducted with 2,230

soldiers who had received a PTSD diagnosis, Hoge et. al (2014) found that these service

members received little opportunity for evidence-based care (evidence-based care or evidence-based practice [EBP] is discussed more extensively in the question three section, outer setting subsection). Twenty-two percent had a single mental health visit, which was the visit during which diagnosis occurred. Additionally, only 41 percent received minimally adequate care, which was defined as eight or more visits after diagnosis within the year. Group psychotherapy comprised a common format chosen to maximize use of limited clinician resources in over-taxed, government-financed, military-associated environments such as the one examined in their study.

Spoont et al. (2016) described inequity in the allotment of psychotherapy services for some veterans with PTSD from racial and ethnic minority groups within the VHA. Among veterans receiving psychotherapy services in these mental health settings, African Americans, Asian/Pacific Islanders, and Latinos were less likely than veterans of European descent to receive individual psychotherapy. However, the drivers of such disparities differed across racial and ethnic groups. Results indicated that the imbalance rested primarily on factors operating both within and among healthcare networks or complications in cosmopolitanism, or the degree to which an organization interacts with other organizations. More importantly, research showed that VHA PTSD providers' decision-making processes regarding therapy referrals had never been directly evaluated.

Although unclear whether the lack of direct evaluation of the decision-making processes involved in therapy referrals are intentional, the above set of conditions correspond to what Webb, Chang, and Benn (2013) call The Ostrich Problem. In this theory, individuals in an organization or the organization itself, make an appraisal to intentionally avoid monitoring clinical practices which assess some distinct quantifiable effects due to varying motives. For

instance, The Ostrich Problem can pertain to both active and passive forms of monitoring but in slightly different ways. In passive monitoring, this would involve rejecting passively received information as uninformative, whereas in active monitoring, this would involve deliberately avoiding potentially relevant information on progress toward a goal. Webb et al. (2013) state that individuals frequently reject information that: a) is not consistent with their current attitudes, expectations, or self-beliefs; b) may demand undesired action; c) suggests that goal progress is weak rather than robust; or, relatedly, d) is expected to cause unpleasant emotions or diminish pleasant emotions. Regardless of intentionality, the reality is that information is often not perceived when it is not monitored and measured. Nevertheless, recipients of VA services are likely to be conscious of inadequate remedies which fail to address their symptoms. Hence, veterans and service-connected personnel are aware of their unmet needs and are unphased by the justifications of cost cutting measures. Expression of such organization shortcomings are apt to find an attentive audience in the ever-cautious military affiliated community.

Process of implementation. Moorhead et al. (2013) assert that behavioral healthcare organizations need to recognize and understand the social media/social networking landscape, where conversations about them are already being held, and develop their strategies when suitable. Mangold and Faulds (2009) recognized that social media and social networking are changing the relationship between producers and consumers of a message. This change suggests that healthcare providers may need to take a certain degree of control over online health communication between treatment recipients to maintain validity and reliability (Moorhead et al., 2013). A 2012 review of approximately 20 studies using social media and social networking for research recruitment found that social media, expressly, appears cost-effective, efficient, and successful in engaging a diverse range of individuals (Klee, Stacy, Rosenheck, Harkness, & Tsai,

2016).

With recruitment in mind, Moorhead et al. (2013) reported that a relationship exists between personality traits and financial solvency in engagement with social media. In other words, the authors deduced that understanding the intersection between mental disorders and poverty is particularly crucial when considering the implementation of any online intervention. Related to this is the contention by Ramo et al. (2014) that social media and social networking can access young adults where they frequent, at any hour of the day, with the potential for private interactions and the promise of peer outreach. Further, marketing campaigns on Facebook offer an opportunity to target advertisements by age, location, or keywords, which could aid in engaging a cohort of participants who met specific recruitment criteria. For example, several intervention studies have used Facebook to recruit veterans for web-based interventions targeting depression, alcoholism, and PTSD symptoms.

Characteristics and profile of users. Social media and social networking have changed the ways that online users of all ages obtain healthcare knowledge. Gandolf (2014) suggests that social media and social networking are changing the nature and speed of healthcare interaction between individuals and health service organizations as the public, patients, and health professionals employ this medium to communicate about health issues. For example, of adult Internet users in the U.S in 2014, 61 percent engaged in general online research and 39 percent used social media such as Facebook for health information (Ramo et al., 2014). Klee et al. (2016) indicated that an overwhelming majority (89 percent) of online 18- to 29-year-olds use social media, with Facebook alone visited by 70 percent of young adults on a typical day. Using age and personality as a framework, Ramo et al. (2014) indicated that extraversion, as a personality trait, is particularly vital for younger users, while openness to new experiences is

central for older users. This distinction may be critical in determining whether an engagement

strategy should be implemented through social media or social networking.

Diversity beyond age also appears to be a determinate factor among users of social media

and social networking. Klee et al. (2016) cited studies reporting that more females than males

use social network sites. More to the point, gender is a consideration in social media usage

around healthcare, in that extraverted women and men are equally likely to engage, but men are

more likely to use social media when addressing emotional instability (Ramo et al., 2014).

Chou, Lai, and Liu (2013) concluded that the population is accessing social media and social

networking regardless of education and race or ethnicity. Moreover, a few studies surprisingly

found that social media and social networking users were disproportionately from lower-income

households (Moorhead et al., 2013). Klee et al. (2016) allude to studies within the U.S. which

report that a higher percentage of social media users are African Americans.

Some individuals with severe mental illness experience specific barriers to technology

usage. Neurocognitive deficits including impairments in higher-level executive functioning,

working memory, and sustained attention may hamper their ability to use technologies such as

computers and mobile phones, as well as to access the Internet and the ability to navigate

websites effectively. Various studies indicate that individuals with severe mental illness use the

Internet less than the general population (Record et al., 2016; Tsai & Rosenheck, 2012). That

said, other studies show that access to Internet-based electronic personal health records among

individuals with severe mental illness significantly improved quality of medical care and thus

increased that population's use of medical services (Druss, Ji, Glick, & von Esenwein, 2014).

Aschbrenner et al. (2018) indicate that though the ownership of accessible Internet

technologies such as mobile phones and computers is significantly lower among individuals with

severe mental illness compared to the general population, increasing numbers of individuals with severe mental illness are utilizing the Internet both for personal use and for access to health-related information. Furthermore, Muñoz et al. (2016) propose that a growing number of health interventions utilize Internet-based technologies to supplement traditional psychiatric care (i.e., for tracking psychiatric symptoms and enhancing medication adherence) among individuals with psychiatric disorders. Arguably, the ubiquity of healthcare-based use of social media and social networking is developing and may point to the future success of recruitment strategies when simply utilizing this growing medium for recruitment over time.

Intervention characteristics. Moorhead et al. (2013) identified facilitating, sharing, and obtaining health messages as the primary uses of social media and social networking for health communication. They also defined the following six critical overarching benefits of these communication channels: a) Increased interactions with others, b) Increase in tailored, available, and mutual information, c) Increased accessibility and widening access to health information, d) Peer, social, and emotional support, e) Public health surveillance, f) Potential to influence health policy. Moorhead et al. (2013) also identified limitations consisting of concerns about quality, reliability, confidentiality, and privacy. Social media and social networking are proving attractive as they bring a new dimension to communications answering health questions and resolving concerns with the potential of improving public contact. A clear example of this was the World Health Organization's (WHO; See Appendix A, Figure 2, Item h) use of Twitter to reach 11,700 followers during the influenza A (H1N1 subtype), pandemic (Ramo et al., 2014).

Social media and social networking offer a powerful tool enabling collaboration and social interaction for a range of individuals (Moorhead et al., 2013). Klee et al. (2016) pointed out that the IOM recommended in 2006 that health technology and Web-based resources become

an essential part of healthcare services. As a result, health technology is being used to enhance service delivery; store, track, and share symptoms or test results; and facilitate communication and shared decision-making among individuals and healthcare providers. Health technology increases access to care, empowers patients (Bartlett & Coulson, 2011), and increases participation in treatment decisions (Klee et al., 2016) possibly providing informal recruitment benefits.

Dropout rates for PTSD therapies. When discussing retention of veteran populations in PTSD therapies, it is important to note dropout and attrition. According to Najavits (2015), the problem of PTSD patients dropping out of therapy is the most significant predictor of treatment failure; therefore, the most promising strategies to improve the efficacy of evidence-based treatments need to address retention. This is done through patient engagement and rapport.

Najavits (2015) characterizes retention as the percentage of patients who stay in treatment for its proposed dose. In opposition, the author defines dropout as the percentage of patients leaving before receiving their intended dose. Najavits believes this distinction is an important point of discussion because of the significant implications for PTSD treatment outcomes (2015). Najavits (2015) argues that the two PTSD therapies most studied for retention and dropout are CPT and PE, with both evidence-based treatments being the subject of massive, formal, multi-year dissemination rollouts, showing positive outcomes and reasonable retention of patients in RCTs. However, Najavits (2015) also notes that real-world studies expose substantial dropout concerning these interventions. More to the point, the author reveals that real-world studies are distinct from RCTs in that they consistently evidence far lower dropout rates with much more restrained conditions (e.g,. a more selective range of patients and clinicians; Najavits, 2015).

Najavits (2015) also indicates that it is important to recognize that dropout sometimes indicates that a patient perceives that they have improved and no longer need treatment, yet in other cases may indicate lack of response to the therapy, iatrogenesis, or other clinical worsening.

Najavits (2015) maintains that RCTs involving CPT and PE have always evidenced more positive results regarding dropout, with their average attrition rate at 28 percent. Nevertheless, the author relates that this outcome derives from the fact that RCT samples are not representative. She points out that PTSD EBT literature consistently excludes highly complex, severe patients. Najavits reveals that many of the attributes of uniformed PTSD suffers (e.g., those suffering from homelessness, suicidality, violence potential, bipolar and psychotic disorders, significant cognitive impairment, or current domestic violence) would place them in this excluded status. Najavits notes an important point; RCTs may not demonstrate the day-to-day, clinic-level implementation of the interventions studied. For example, while an RCT may boast attrition rates of 28 percent, in other settings we may observe much higher rates of dropout. In the context of the present evaluation, this means that an organization such as the VRP may observe varied rates of retention and dropout relative to RCTs on interventions due to differences in the patient population. This is well-aligned with the idea that greater patient severity may predict dropout from interventions such as PE and CPT (Najavits, 2015). Najavits (2015) contends that large-scale treatment systems (e.g., The United States Department of Veterans Affairs [VA]) are consistently investing in applications which perform less well in real-world implementation regarding retention and dropout through their dependence on RCTs and its accompanying literature.

This section detailed the literature relevant to the first question for examination within the present program evaluation: What are effective recruitment strategies of veterans for mental

health treatment? The review of relevant literature began with identification and description of

special populations of veterans and service members (i.e., female, LGBTQ+, disabled,

incarcerated, homeless, traditionally underrepresented, and students). The various military

associated subcultures were explored here in order to provide context for the general population

served by the VRP. Next, an exploration of the information technology space occurred as it is

ubiquitous in our contemporary era, and as such, any intervention would need to speak to this

communication sphere. As part of this discourse, a definition of social media and social

networking related to user characteristics occurred. Then, the MHS and VHA received

consideration, as these are the official treatment channels available to all service-connected

persons. Low patient enrollment in these treatment channels for individual psychotherapy in

support of those diagnosed with PTSD became a proposition in this section. This section also

included an examination of recruitment strategies related to a range of general social media and

social networking user aspects, attributes, and interaction tendencies arose. Finally, a discussion

of attrition and dropout in frontline PTSD therapies concluded this section.

Program Evaluation Question 2: Retention Strategies for Therapists

  Specific question. What are efficient strategies for retaining treating therapists?

  Characteristics of individuals. No universal description exists which accurately

identifies the archetypal psychotherapist in the present-day community treatment center setting

(Cook, Biyanova, Elhai, Schnurr, & Coyne, 2010). However, what is elemental to a well-

defined psychotherapist conceptualization is that an array of behavioral health professional

specializations occupy today's community behavioral health positions. These clinicians are

drawn most commonly from the contiguous disciplines of psychology, which includes

counselors, marriage and family therapists, traditional psychotherapists, and psychologists, social

work, occupational therapy (which includes physical therapists), and nursing (Cosgrave,

Hussain, & Maple, 2015). Remarkably, though diversity in specialty is not a significant issue

within the psychotherapeutic workforce, there is a primary issue of deficiency in quantity of

practicing providers. Globally, a shortage of behavioral health professionals is now a severe

problem within high-income countries such as the U.S. (Taylor, Pilkington, Montgomerie, &

Feist, 2016).

The analysis provided by Taylor et al. (2016) comports with that of Hoge et al. (2013),

who further assert that the general shortage of behavioral health practitioners coincides with the

increased prevalence of PTSD in veterans and service connected personnel. These contemporary

concomitant issues could accelerate negative behavioral health outcomes for those affiliated with

military service in North America. The antecedent dilemmas give further context to Cosgrave et

al.'s (2014) mitigating proposition that health service workforce supply is a decisive factor in

both recruitment and retention of any behavioral-health-providing labor pool. As a result, they

conclude that recognizing recruitment and retention factors specific to behavioral health

providers is an essential step in developing strategies for maximizing the effectiveness of any

community behavioral health organization in the United States.

Emotional strain, tension, and exhaustion are inexorably intertwined with behavioral

healthcare profession departure. Various studies document that behavioral health professionals,

compared to healthcare professionals employed in other fields, are particularly affected by

stressful employment situations (Fleury, Grenier, Banvita, & Chiocchio, 2017; Volpe,

Mohammed, Hopkins, Shapiro, & Dellasega, 2014). For example, Fleury et al. (2017) convey

that stress is identified as unusually high among clinical psychologists, especially for those with

less experience, and this may lead to career digression. Devebakan, Dogan, Ceylan, Akin, and

Kose (2018) indicate that long-term employment stress results in burnout. Burnout is defined as

an employee's divergence from the original meaning and purpose of their profession.

Devebakan et al. speculate that in this process, burnout is analogous to surrendering to those who

subordinate them while simultaneously nurturing the subordinators' authority (2018). Steel,

Macdonald, Schröder, and Mellor-Clark (2015) explain burnout as a psychological syndrome

displayed in response to chronic interpersonal stressors at work and constitutes a severe problem,

decreasing job satisfaction among psychotherapists and increasing self-imposed withdrawal.

Relatedly, Ozturkcu et al. (2018) supply a representative list of 20 vital factors affecting

behavioral health clinician's burnout levels and satisfaction in their work-lives. These factors are

listed in Table 6 (See Appendix B) and include a variety of individual- and organizational-level

variables that impact burnout.

Went (2016) articulates that working with trauma is an exceedingly demanding form of

employment within behavioral health services. Specifically, this emotionally draining

experience promotes burnout. Results showed that patient perceptions of therapist burnout is

correlated with worsening patient outcomes. Moreover, higher burnout levels, which are linked

to lower self-perceived effectiveness in behavioral health professionals, correspond with a

subsequent higher rate of inpatient admissions for their patients (Fleury et al., 2017). Steel et al.

(2015) researched a sample of 116 psychotherapists based in the United Kingdom (UK) on their

experiences with burnout. Results showed that the sample was adversely affected by workload

and lack of autonomy in their roles. The psychotherapists experienced adversity as emotionally

exhausting, which led to potential job dissatisfaction and higher staff turnover. The researcher's

contention is that managers and supervisors should be aware of these outcomes, and of the

danger that therapists may eventually cope by depersonalizing their clients.

Comparably, Emery, Wade, and McLean (2009) conducted research with 190 Australian clinical psychologists examining the relative contribution of demographics, workplace variables, and individual factors to burnout. Their exploratory factor analysis, and ensuing confirmatory factor analysis, indicated the presence of three coherent factors that reflected themes of therapy-related beliefs comprehended as destructive to careers in psychotherapeutic populations. Themes of the three factors were: low tolerance of distress, inflexibility with respect to the application of therapeutic models, and need for control in therapy. The initial factor, low tolerance of distress, related both to the therapist's distress experience (e.g., "If I allow my clients to distress me, I'm a failure") and the client's distress experience (e.g., "I must protect my client from reliving painful events"). A succeeding factor, inflexibility with respect to the application of therapeutic models, reflected the belief that a single exclusive treatment model or protocol advanced therapy (e.g., "It is unprofessional to take an eclectic approach to therapy"). The concluding factor, the need for control in therapy, reflected a therapist's belief that only full understanding led to a successful therapeutic outcome (e.g., "I must fully understand what happens in therapy to help the client"). Emery et al. (2009) indicate the need for emotional and therapeutic control was associated with therapist distress, youth, and (as mentioned in previous studies within this subsection) less clinical experience. This, in turn, correlated with less personal resources, lower personal accomplishment, and higher levels of burnout.

D'Souza, Egan, and Rees (2011) assert that perfectionism (See Appendix A, Figure 2, Item i), a refusal to accept any standard short of perfection, is a risk factor for the development of stress and burnout in psychologists. Findings suggest that a psychologist's stress levels can aid in identifying the amount of physical and psychological fatigue or exhaustion they have experienced. They argue that burnout is not the result of stress as such, but of continued

exposure to extreme and unmediated stress. The overarching finding was that clinical psychologists who were higher in perfectionism factors were more likely to experience greater stress levels. Perfectionism creates stress because perfectionists tend to have rigid evaluative procedures, attend to negative aspects of performance and gain limited satisfaction, which results in negative client outcomes (D'Souza et al., 2011). Perfectionism was also indicative of personal, work-related, and client-related burnout. In short, results indicate that clinical psychologists who have high levels of perfectionism are more likely to engage with clients while succumbing to stress and subsequently experience burnout.

A comparative study of 203 psychologists employed by a variety of public institutions revealed that burnout and job dissatisfaction occurred more frequently among psychologists from correctional facilities and community behavioral health hospitals (Fleury et al., 2017; Senter, Morgan, Serna-McDonald, & Bewley, 2010). Mental health social workers, or psychiatric social workers, are also exceptionally sensitive to stress and burnout (Volpe et al., 2014). Additionally, Kinman and Grant (2010) found that although mental health social workers reported considerable satisfaction in providing support and services to those experiencing mental health issues, they also tended to report higher levels of work-related stress and burnout than many other similar occupational groups. The high levels of stress and burnout experienced by social workers also contributes to the growing retention problems within their profession (Kinman & Grant, 2010). This study also demonstrated the longevity of a newly-qualified social worker to be roughly eight years (D'Souza et al., 2011).

A study conducted by Fleury et al. (2017) assessed levels of burnout and employment satisfaction among 200 mental health social workers from the New York metropolitan area. Exhaustion affected 57 percent of participants. Kinman and Grant (2010) related that one of the

most prominent reasons for social workers leaving the field is the stressful nature of the work. This stress is often derived from a shifting role in multidisciplinary teams, which puts social workers in competition with other professionals. Likewise, work-related stress carries severe implications for mental and physical well-being (Kinman & Grant, 2010). Thus, workplace stress may compromise the mental health social workers' condition, detracting from the quality of care they are able to administer and impairing performance due to sickness and resultant absence.

Eklund and Hallberg (2001) indicated that the theories and practices of occupational therapy can likewise make use of counseling and psychotherapy in the context of assisting clients to engage in improved vocational performance and behavior, activities of daily living, and purposeful normative activities. Muñoz, Moreton, and Sitterly (2016) explained that occupational therapists are increasingly documenting the psychologically-related knowledge, skills, or habit-pattern limitations their clients present in multiple areas of occupational performance. These practices include, but are not strictly limited to; independent community living, sensory and emotional regulation, gender-specific women's issues, occupational and vocational role functioning, time use and time management, and social participation. Any shortage of staff in the occupational therapy arena presents a challenge to managers in that it creates a stressful work environment for the remaining therapists and may lead to a higher exit rate (Humphreys, Wakerman, Pashen, & Buykx, 2017).

Humphreys et al. (2017) indicated that nursing shares the occupational therapy characteristic of high turnover rates and few opportunities for promotion. The workforce turnover is distinct from workforce retention, as retention refers to the number of particular employee classifications who remain in employment at a worksite while turnover is a measure of

the quantity of terminations (Humphreys et al., 2017). Knight, Abdallah, Findeisen, Melillo, and

Dowling (2011) confirmed that the nursing shortage presents a significant problem for the future

healthcare workforce.

According to Wheeler and Delaney (2008), Psychiatric Mental Health Clinical Nurse

Specialist (PMHCNS) programs have been teaching psychotherapy skills since the inception of

the role in 1952, when Dr. Hildegard Peplau initiated the first PMHCNS program at Rutgers

University with a grant from the National Institute of Mental Health (NIMH; See Appendix A,

Figure 2, Item j). The PMHCNS is a direct provider of expert patient healthcare, as well as

consultants, educators, and researchers, and the program serves as a resource for nurses across a

broad spectrum of clinical inpatient as well as community settings (Wheeler & Haber, 2004).

Over the years, the curriculum in PMHCNS graduate programs has changed to reflect the

neurobiological knowledge explosion of the 1990s, known as the "Decade of the Brain," (See

Appendix A, Figure 2, Item k) to meet emerging societal needs and address the evolution of the

advanced practice role.

Wheeler and Haber (2004) recounted that in August 2000, the Division of Nursing,

Health Resources, and Services Administration (HRSA) of the U.S. Department of Health and

Human Services funded the National Organization of Nurse Practitioner Faculties (NONPF),

which pushed to develop five entry-level competencies for the Psychiatric Mental Health Nurse

Practitioner (PMHNP) program in the primary care specialty areas of adult, family,

gerontological, pediatric, and women's health. The authors explained that the first PMHNP

program, developed in 1965 by Loretta Ford at the University of Colorado, presented a model for

health promotion and disease prevention serving a pediatric population. However, the PMHNP

was also developed to address a shortage of primary care physicians at the time. Therefore, the

intent was that PMHNPs, under the direction of physicians, would provide services to specific

populations. Consequently, PMHNPs began employing psychotherapy skills to assist veteran

populations.

Lee et al. (2017) indicate nursing turnover is a worldwide phenomenon which has

become a critical matter for the health industry. Lee et al. (2017) state that nurses leave their

profession for a wide variety of reasons, such as seeking a new job, providing personal-childcare,

or taking early retirement. Boyle (2011) contends that nurses are markedly vulnerable to

compassion fatigue. Further, Boyle (2011) maintains that such emotional fatigue is derived from

their frequent witnessing of tragedy during their work, which amounts to vicarious, indirect,

exposure to trauma on a regular basis. Sorenson, Bolick, Wright, and Hamilton (2016) proposed

that compassion fatigue results when a practitioner is exposed to repeated interactions with

distressed clients, requiring high levels of empathic engagement. Correspondingly, they claim

compassion fatigue comprises a significant contributing factor in nurses' burnout, turnover, and

decreased interaction with patients. Sorenson et al. (2016) argue that literature confirms this

assertion. Similarly, Lee et al. (2017) indicated that the same professional stressors that lead to

high turnover also lead to the ever-present issue of poor patient outcomes.

Rössler (2012) indicated that the stressors affecting behavioral health professionals

overall emanate from a wide range of sources. These include confrontations with violent,

aggressive, or suicidal patients, challenging interactions with other professionals, heavy

workloads and administrative responsibilities, lack of resources, inappropriate incoming

referrals, an absence of positive feedback, low pay, sub-standard work environment, and lack of

supervision. Moreover, behavioral health professionals suffer more stigma and enjoy lower

professional prestige when compared to other healthcare professionals (Verhaeghe & Bracke,

2012). Chronic work-related stress among behavioral health professionals has the potential to trigger not only burnout, but absenteeism related to physical illnesses, mental health problems, or alcohol/drug abuse, as well as increased risk of professional negligence (Fleury et al., 2017). That said, Humphreys et al. (2017) related that compensation alone should not be the focus of an organizational retention plan as it does not translate into better patient outcomes in the mental health field.

Hoge et al. (2013) maintained that the behavioral health workforce has experienced long-standing employment shortages, high departure rates, a lack of diversity, as well as concerns regarding overall competency. Many healthcare employers report difficulties in recruitment among behavioral health workers to fill vacant positions, beyond the ubiquitous reality of frequent turnover (Ryan, Murphy, & Krom, 2012). These conditions point to low levels of job satisfaction and a community beset with poor morale, which coincides with the impediments attributed to this field and cited above (Fleury et al., 2017).

In the past, mental healthcare workers trained at institutions at which they remained throughout their careers, which allowed them to invest in long-term relationships with peers, patients, and families (Fleury et al., 2017; Randall & McKeown, 2014). By contrast, current healthcare trends mark the ascendancy of atomized roles, routinization, and mechanization of practices, alongside unstable employment. This volatile environment unquestionably leads to the omnipresent, high levels of staff attrition as mental healthcare professionals drift into the open market for encouraging job opportunities. According to Randall and McKeown (2014), this problem led to disengagement among mental health workers.

Senter et al. (2010) noted that an overall assessment of positive emotions characterizes the state of employee satisfaction and loyalty in which mental healthcare professionals can

contribute to success in their careers. Considering that hours spent at work represent a

significant part of daily life for most people, job satisfaction is a significant determinant of

quality of life and fulfillment, as well as of mental and physical health (Chou & Robert, 2008).

Verhaeghe and Bracke (2012) suggested that job satisfaction may also be a general indicator of a

work-related quality of life, which suggests a reason why job satisfaction is often a primary

outcome variable in mental health research.

Salyers et al. (2015) expressed that dissatisfied professionals may exert a negative

influence on colleagues, damaging the overall working environment. Consequently, mental

healthcare professionals who are unhappy with their work are also less likely to convey empathy

or engage in positive interactions with those whose care is entrusted to them (Verhaeghe &

Bracke, 2012). Thus, unhappiness among mental healthcare workers suggests a possible root-

cause for most patient dissatisfaction with mental health services (Fleury et al., 2017).

Absenteeism and staff egress due to burnout and job dissatisfaction have the further effect of

disrupting established therapeutic relationships between professionals and clients as well as the

quality and continuity of service delivery (Salyers et al., 2015). The mass exodus from the

behavioral health field, resulting from high levels of job dissatisfaction, also poses critical

financial hardships for the healthcare system, as hiring and training new staff are costly

undertakings (Fleury et al., 2017).

Outer setting. The increasing shortage of behavioral health providers is considered a

national problem, as per the Advisory Committee on Interdisciplinary Community-Based

Linkages (ACICBL, 2008 See Appendix A, Figure 2, Item q). As of 2015, the critical situation

progressed as an estimated 43.4 million Americans aged 18 and older suffered from a behavioral

health issue (Andrilla, Patterson, Garberson, Coulthard, & Larson, 2018). According to Altschul

et al. (2018), the national behavioral health workforce is in crisis because of a lack of resources,

culturally responsive services, quality clinical supervision, sufficient training in evidence-based

practices, and targeted recruitment and retention. To better understand the scope of this health

workforce emergency, an accurate conception of the behavioral health workforce is needed as

demand for behavioral health care grows.

The most significant challenges to recruiting and retaining behavioral health

professionals appear in rural and poor communities (MacDowell, Glasser, Weidenbacher-Hoper,

& Peters, 2014; Sutton, Maybery, & Moore, 2011; Thomas, Ellis, Konrad, & Morrissey, 2012;

Watanabe-Galloway, Madison, Watkins, Nguyen, & Chen, 2015; Wilks, Browne, & Jenner,

2008). Hoge et al. (2013) stated that in the U.S. roughly 45 million people, or one in five adults,

experienced a mental health condition at the beginning of the current decade. Watanabe-

Galloway et al. (2015) assert that decades of behavioral health professional shortages have posed

the greatest public health problem in states which are predominantly rural. In the U.S., for

example, 85 percent of federally designated health professional shortage areas (HPSAs; See

Appendix A, Figure 2, Item l) for mental health are rural. However, ACICBL (2008) related that

90 percent of all psychologists and 80 percent of social workers practice in metropolitan areas.

The behavioral health workforce's insufficient size, high turnover, relatively low

compensation, minimal diversity, and limited competence in evidence-based treatment are all

cause for significant concern across the whole of U.S. healthcare (Hoge et al., 2013). The

considerable costs of poor workforce retention and high turnover include restricting access to

appropriate care and loss of skills experience, compromising the continuity and quality of care,

and rising recruitment costs (Humphreys et al., 2017). Bloom, Boersch-Supan, McGee, and

Seike (2011) observed that behavioral health costs were more extensive than those associated

with cardiovascular disease, diabetes, and other chronic diseases. Many factors are sources of

this treatment gap, including the stigma and discrimination associated with mental health

conditions, lack of healthcare coverage, insufficient services and linkages among services, and

an inadequate behavioral healthcare workforce overall (Hoge et al., 2013). According to the

Substance Abuse and Mental Health Services Administration (2014), 43.8 million adults, or one

out of five adults in the U.S. had a diagnosable mental disorder in 2013. Thus, given the

American public's undoubtedly high need for behavioral health practitioners, who can say

whether the pressing behavioral health needs demonstrated by veterans and active duty personnel

are being relieved?

Workforce recruitment is defined as the process by which staff are selected for a

particular function, service, team, or role (Cosgrave et al., 2015), while workforce retention

refers to the time between engagement to a function and separation or departure therefrom

(Humphreys et al., 2017). Workforce retention is related to Cosgrave et al.'s (2015) concept of

conservation, by which organizations are motivated to actively pursue a lengthened time between

commencement and termination of staff employment. Retention, then, can be used to specify

who is leaving, who is staying, and for how long (Humphreys et al., 2017).

Rates of workforce turnover are commonly used to gauge when conservation should be

attempted in a specified time period (Cosgrave et al., 2015). Further, Humphreys and Smith

(2009) expressed that the number of terminations in an organization for a specified time period

should be divided by the number of active workers in the same categories to denote the behavior

of specific health professionals. Generally, the organization holds a workforce goal of

minimizing avoidable workforce turnover (Humphreys et al., 2017). Cosgrave et al. (2015) also

noted that workforce departure can also be an indication of the extent of workforce flux. In other

words, it can reflect the degree to which roles are automated or outsourced while more workers become contract-based, mobile, or work flexible hours. With such concepts in mind, the second question of this program evaluation which initially focused specifically on retention, was revised to additionally encompass recruitment to adequately address the factor of workforce flux as an element of workforce supply.

Recruitment as a concept is closely related to, but distinct from, retention (Humphreys et al., 2017). Recruitment involves the attraction and selection of staff to a particular organization or role and is a prerequisite for retention. Well-targeted recruitment strategies and selection criteria are important in subsequent retention, as the better-matched an individual is to a role and organization, the longer they are likely to remain at that organization, independently of the effect of additional retention strategies. For example, behavioral health workforce shortages in underserved rural areas, such as many localities in Minnesota, are a common problem in the U.S. (Watanabe-Galloway et al., 2015). According to Humphreys et al. (2017), such behavioral health workforce shortages are primarily a function of poor recruitment rather than poor retention. However, many of the factors which influence recruitment, such as background and lifestyle preference are, "unchangeable," whereas the workplace factors most relevant to retention are "modifiable" and therefore suitable for intervention (Humphreys et al., 2017).

Inner setting. Due to the associated costs, health organization employee turnover has been identified as a significant factor in direct loss of revenue within healthcare agencies (Brandt, Bielitz, & Georgi, 2016). Organization loss stems from a myriad of related direct factors: a) inflated administrative costs, b) excessive employee interviews, c) persistent new employee searches, d) unremitting severance pay, and e) unnecessary training costs (Brandt et al., 2016). Additionally, they identify costs resulting from indirect factors: a) increased

treatment failure rates, b) loss of organizational reputation, c) loss of employee/patient loyalty, d) loss of organizational expertise, e) resources bound by the increased need for management, and f) overall loss of outcome quality. By definition, since the services of healthcare institutions always deal with matters of health, life, and death, assuring the highest possible product quality (i.e., effectiveness of treatment) is not merely a cost-effective plan but an ethical duty (Suhrcke, Fahey, & McKee, 2008; Suhrcke, McKee, Arce, Tsolova, & Mortensen, 2006; Suhrcke & Urban, 2006). Retention strategies should be sufficiently flexible to target the specific needs of behavioral healthcare workers in different contexts (Humphreys et al., 2017).

Brandt, Bielitz, and Georgi (2016) affirmed evidence indicating that contextual factors, such as reduced density and stability of health organization employees, negatively impact patient outcomes. Their findings underscore the need for institutions to expend substantial effort to achieve optimal staff retention. Watanabe-Galloway et al. (2015) highlighted the following broad categories for refinement to effect organizational behavioral health provider recruitment and/or retention: a) licensing requirements, b) loan repayment, c) marketing strengths and benefits, d) national and local competition, e) positive teamwork, f) supervision, g) telehealth, h) training, and i) workload and resources for complex cases. Brandt, Bielitz, and Georgi (2016) pointed out both mid- and long-term benefits to any health employee stabilization program (e.g., lower operational and treatment costs), which are efficacious for patient outcomes. A wide range of individual, organizational, and contextual factors impact retention (Humphreys et al., 2017). Despite the lack of rigorous evaluations measuring the effectiveness of retention incentives, it is clear that no one measure alone is likely to be sufficient to improve retention (Humphreys et al., 2017). Research also shows that non-financial incentives, such as employee housing and improved working conditions, have the potential to improve retention (Humphreys et al., 2017).

Process of implementation. Retention of health workers, particularly in rural and remote areas, is important for several reasons (Humphreys et al., 2017). Good workforce retention is vital to ensuring well-functioning health services capable of delivering improved health outcomes. Longer duration of employment may be associated with increased experience, local knowledge and skills, and continuity of service and care. When a health worker leaves an organization, these benefits are lost, leaving a shortage or even complete lack of suitably qualified candidates to fill the vacant role. Even when an appropriate candidate can be found, the recruitment of new staff is often a costly exercise in terms of both time and money. New staff members are not optimally productive until fully inducted into the workplace. Poor staff retention results in inadequate service coverage, which contributes to the health inequities already known to differentiate metropolitan areas from rural and remote areas.

Steel et al. (2015) found that workload and lack of autonomy in behavioral health practitioner roles exhausted staff emotionally, leading to decreased job satisfaction and higher staff turnover. Managers and supervisors should be aware of this hazard and of the danger that therapists may eventually cope by depersonalizing their clients. Humphreys et al. (2017) related that development of strategies to efficiently retain existing therapists comprises a better approach than concentrating on recruitment; however, overreliance on this strategy has drawbacks, as resignations may continue. Therefore, it is equally essential that the selected plans and policies attract new potential employees. A combination of high attrition and severe workforce shortage negatively affects the employing institutions, the patients, and the field at large (Humphreys et al., 2017). In the case of occupational therapists, agencies must bear the high cost of recruitment and training, which is estimated to amount to approximately half of the new employee's first-year salary. If the therapist stays for only a three-year period, approximately a quarter of the

salary paid to that individual becomes a cost for which minimal return benefit has been received.

Strategies to improve workforce retention. The idea that the financial, professional, social, and external conditions required to optimize workforce retention can be met in every workplace is unlikely. Obstacles are particularly formidable in many rural and remote locations, where the factors contributing to workforce turnover are compounded by distance and isolation. In these locations, it is therefore imperative that effort be made to retain a sufficient behavioral health workforce to provide for the health needs of communities. Humphreys et al., (2017) indicate that governments and many health services provide a range of workforce recruitment and retention incentives to influence the decision-making of health workers regarding whether these employees take, remain in, or leave jobs in rural and remote areas, although few systematically monitor their effectiveness in improving workforce supply and length of stay. Retention measures are also often implemented at an organizational level. Generally, it is essential that the effectiveness of programs deliberating the improvement of workforce supply, avoidable turnover, and improving the length of employment withstand thorough periodic evaluation to ensure cost justification since there is little evidence that common contemporary retention incentives support new clinicians or sustain long-serving practitioners in areas previously suffering from workforce shortage. Therefore, greater attention is required to determine how health services in these underserved communities can minimize avoidable turnover.

In general, remuneration incentives have been the focal point for most governments and health authorities addressing workforce retention within the U.S. In the U.S. Federal Government, for example, this became a focal point of federal bonus policy resulting from the 1932 Bonsu March (See Appendix A, Figure 1, item ah; Ortiz, 2006). Nationwide, financial

incentives now include: salary packaging, salary loadings, and specific retention bonuses. However, as noted above, the ongoing shortage of mental healthcare providers in rural and remote regions is caused by multiple factors. Several authors have concluded that because workforce retention is a function of several interrelated factors, the strategies to address them should reflect this complexity. Lehmann, Dieleman, and Martineau (2008) argued that "…because of the complex interaction of factors impacting on attraction and retention, there is a strong argument to be made for bundles of interventions which include attention to living environments, working conditions and environments, and development opportunities" (para. 3). Several programs have been described which incorporate multiple strategies addressing different retention-related factors. Not all have been comprehensively evaluated, and for those which have, measuring the relative impact of each component remains a challenge. Individual policies occur without due regard to how interventions can improve the attractiveness and sustainability of workplace environments and worker satisfaction, so that triggers to leave are minimized. Focusing attention on single incentives, such as remuneration, often ignores the need to maintain adequate staffing, provide appropriate infrastructure, and supply career incentives.

Organizational advancement is a valued feature for workers in any successful organization. Hence, Gage (1991) indicated a need to reward management and clinical expertise equally, noting that care should also be taken to guarantee that only those deserving recognition receive promotion. Thus, a promotion on the clinical ladder should be challenging enough for those who advance to perceive a change in status once the upgrade occurs. Gage (1991) also cautioned that the management staff of the department must commit to the process to avoid creation of a class structure. Gage posited that hierarchy should also be structured to retain those clinicians who make a significant contribution to the organization and rather than all clinicians

indiscriminately (1991). Some attrition, however, is healthy for an organization as it provides the opportunity for the injection of new ideas.

An example of Gage's (1991) basic concept took place in 1988 at Victoria Hospital, a large teaching hospital in southwestern Ontario. The hospital decided to implement a clinical ladder on a pilot project basis, designating five overarching objectives. First, they wanted to improve recruitment and retention of valuable clinically-oriented therapists. Second, they wanted to ensure recognition of clinical skills as an alternative to administrative/management skills. Third, they sought to provide an opportunity for career advancement for clinically-oriented therapists. Fourth, they wished to improve job satisfaction. Fifth, they intended to ensure consistent and progressive quality patient care. Their ladder was designed to provide a simple, specific, and objectively measurable set of criteria for advancement. In addition to increasing the salary of the senior clinical therapists, the project provided financial support for continuing education. Therapists intending to maintain their clinical expertise would have to attend expensive specialist courses. A lack of funding for the continuing education of the senior clinical therapists arose as a possible concern among the department staff who reviewed the criteria.

Gage's (1991) approach demonstrates a dual career path model. In this conception, an individual can move from one ladder to the other. Additionally, the clinical ladder model requires that the number of advancement positions be unlimited. The author underscored that this open-ended structure provides an incentive for all staff to excel clinically. For example, if only three advanced positions existed, the incentive to less experienced therapists would diminish significantly once the posts were filled. Gage's experience indicated that enabling all therapists to apply for senior clinical status increases staff motivation in total. Further, Gage

asserted that this approach, if followed comprehensively, would encourage all occupational

therapists to achieve the level of excellence required for advancement on the clinical ladder. As

a consequence, they would be retained for more extended periods, decreasing costs of

recruitment and training, which would more than cover the increased salary costs.

      Intervention characteristics. Watanabe-Galloway et al. (2015) conducted a semi-

structured focus group study from 2012 to 2013 to obtain an understanding of behavioral health

staff recruitment and retention issues from the perspectives of administrators and behavioral

healthcare professionals (i.e., community, hospital, and private practice administrators/directors

hiring psychological health practitioners). The study was undertaken to identify potential

practices for increasing the behavioral health workforce in rural communities. Participants

reported that low insurance reimbursement negatively affected rural healthcare organizations'

ability to attract and retain clinicians and continue programs. Participants also suggested that

enhanced loan repayment programs would provide a strong incentive for behavioral health

professionals to practice in rural areas. More extensive rural residency programs were advocated

to encourage clinicians to establish roots in a community.

      Facilitators of better recruitment and retention included promotion of the area and

organization, adaptability to individual and community needs, and access to leadership and

management promotion (Sutton et al., 2011). Humphreys et al. (2017) expressly stated that

health services should pool available workforce funding to target retention in ways that best suit

their circumstances, with appropriate indicators built in for monitoring the effectiveness of the

incentives and measures adopted. Whatever the retention incentive adopted, a rigorous

evaluation strategy using pre- and post-intervention baseline measures should be employed from

the outset (Humphreys et al., 2017). Nevertheless, strategies incorporating some form of worker

obligation are effective for the duration of, but probably not beyond, the agreement. Incentives "bundled" in a strategic workforce retention strategy are likely to be the most effective (Humphreys et al., 2017). Moreover, benchmark retention rates are required for different behavioral healthcare professions (Humphreys et al., 2017).

In the preceding section, the investigation was focused on literature relevant to the second question for the program evaluation: What are efficient strategies for retaining treating therapists? This section detailed the types of behavioral health professionals seen within the psychological community (i.e., clinical psychologists, social workers, occupational therapists, and behavioral health nurses) as well as the issues pertaining to recruitment and retention. This chapter also detailed organizational concerns and strategies for remedy.

Program Evaluation Question 3: Treatment Efficacy

Specific question. What is the efficacy of the EMDR therapy employed by the Veteran Resilience Project of Minnesota?

Characteristics of individuals. A defining practice of professional psychology since the field's inception is the need to qualify treatments and subsequently position these treatments in a hierarchy (Camara, Nathan, & Puente, 2000). Within this structure, competence in delivering psychological treatments is defined as the degree to which a psychotherapist demonstrates the general therapeutic and treatment-specific knowledge and skills required to appropriately deliver an intervention, given the treatment's formulated process (Muse, McManus, Rakovshik, & Thwaites, 2017). Kaslow et al., assessing competence throughout the training and career of a clinician, found that a professional's obligation, simply put, is "the determination of what one knows, if one knows how, if one shows how, and how one does things" (2007, p. 442). That said, the need to establish an objective standard for treatment by which assessors may identify

practitioner competence within the field of psychology has brought forth both interest and criticism, and illuminates the intersections in interpretations of existing research literature as well as the merits of some research processes.

Forms of significance. In undertaking a discussion of efficacy, it is important to examine the mechanisms by which efficacy is measured. With regard to psychological interventions, significance is generally the standard for judging effectiveness, efficacy, and impact of treatment. The comprehensive principles of the varying inferential conceptual schemas which constitute the predominant significance tests are too broad a subject to adequately cover in a doctoral dissertation dedicated to another wide-ranging topic. Therefore, only a cursory description of the concepts' history and central tenets are covered in this section.

Foundationally, empiricism, the philosophical doctrine that all knowledge derives from experience, is the origin of significance and a hallmark of the scientific method (Ticineto Clough, 2009). Lo, Au, and Hoek (2014) indicate that the roots of the scientific method also developed out of the realization that data assembled and examined without bias conveyed some previously undiscovered meaning. In accord with the prior conceptualization, they reveal that the traditional scientific method sought to understand the unknown by identifying a problem to solve, establishing a hypothesis that if confirmed resolved this problem, and then gathered data relevant to the specific hypothesis, as well as justifying the analysis and interpretation of the collected data to determine whether it supported the conclusion given the declared hypothesis. The authors further contend that experimentation is a central aspect of the scientific method and the basis for creating new knowledge (i.e., determining whether some factor causes an effect). Peterson (2008) indicates that three separate research concepts, intermingled and confused across time; a) statistical significance, b) practical significance, and c) clinical significance arose from

the scientific method and emerged in the present day as the means of determining distinctive

forms of significance.

        Statistical significance. Statistical inference is based on the idea that it is possible to

generalize results from a sample to its population (Figueiredo Filho et al., 2013). Peterson

(2008) recognizes Null Hypothesis Significance Statistical Testing (NHSST) as a procedure for

measuring the probability that experimental outcomes from treatment occurred by chance given a

supposition and depending on two key variables: effect size (more on effect size in Practical

Significance) and sample size. Figueiredo Filho et al. also explain that outside these two factors,

randomized sampling enhances the strength of the result (2013). Figueiredo Filho et al. (2013)

relate that in NHSST, the null hypothesis (H_o) and the alternative hypothesis (H_a) stand in

opposition, describing conflicting and divergent impressions regarding treatment effects on a

treatment population within RCTs which strive to reduce bias when analyzing a treatment. The

H_o supports that the null is true and that no change likely occurred in the population given the

identified treatment; however, it conveys no indication of the magnitude (intensity of correlation)

nor clinical importance of this finding. In contrast, the H_a likely means the null is false,

indicating that the probability of a relationship exists and bears the same association to the

uncertainty of magnitude and clinical relevance as its counterpart when exhibiting a conclusion.

The presence of non-significant results is neither an indicator of the H_o nor the H_a in NHSST.

Peterson (2008) specifies that the ability of NHSST to evaluate treatment effectiveness is

inadequate in at least two other respects. First, NHSST does not indicate the variability (spread

of group data) of response to treatment within a population, though evidence concerning within-

treatment variability of outcome is the most valuable by-product for clinicians. Second, the

weakness in NHSST is that the calculated treatment effect registered through NHSST has no real

relation to the clinical significance of the effect. Kirk (1996) introduced a third NHSST

inadequacy, postulating that by the adoption of a fixed level of significance, a researcher

transforms a continuum of uncertainty into a dichotomous "reject-do-not-reject decision" (p.

748). This could lead to an anomalous situation in which two researchers could obtain identical

treatment effects but elicit opposing conclusions from their research.

Practical significance. According to Peterson (2008), practical significance (or practical

importance) involves the employment of a finite method of calculating the influence of a

treatment through a quantitative measure of magnitude called effect size. This method stands in

sharp contrast to the standard scientific exercise of merely stating that treatments produced

ambiguous change. Research studies, in particular, apply effect size to examine the extent to

which treatment statistics diverge from the null hypothesis during the course of an intervention.

Cautin and Lilienfeld (2015) indicate that an effect size is a population parameter, meaning

estimated in a population or sample. They clarify that in order to examine a treatment

application with this method, researchers use effect size in two-group comparisons and greater

than two-group comparisons. In these group comparisons, the researchers sample subjects from

a population and use a random variable to measure all subjects with possibly different

distributions for the differing samples. They further elucidate that beyond explaining the

correlation between two random variables or the predictive value of an outcome given a set of

variables, the procedure also interprets the reliability of ordinal or binary measures. The

principles underlying effect sizes are enduring, established at the advent of statistical hypothesis-

testing. Critical contemporary discussions in the psychological community have ignited the

importance of this computational practice (Cautin & Lilienfeld, 2015). Nevertheless, Steenkamp

et al. (2015) assert that effect sizes reflect the mean outcomes of research experiments; however,

they also indicate that this procedure does not adequately capture the heterogeneity of patient outcomes.

Clinical significance. A preceding subsection saw Peterson (2008) establish that statistical significance is utilized to determine whether a change in outcomes is attributable to pure chance. In a supplement to the preceding point, the author specified that practical significance focuses on group changes, with no indication of what transpires on an individual level. In defining clinical significance (or clinical importance), however, Peterson stipulates that this distinct procedure attempts to answer whether a treatment is enough to certify the patient normal or cured concerning the diagnostic criteria in question (2008). In other words, neither the statistical nor practical significance procedures provide any factual information about how many clients truly benefited from a particular treatment nor the number of clients that shifted from dysfunctional ranges to functional ones. Thus, clinical significance is the basic statistical method for determining not only if a treatment is effective clinically, but whether the treatment affected the label or diagnosis. Over and above the former argument, Peterson (2008) recounts that since its conception, many variations on clinical significance's original theory developed under various researchers for use by clinicians. Gillani (2011) cites these five specific clinical significance approaches in particular: Edwards-Nunnally method, Gulliksen-Lord-Novick method, Hageman-Arrindell method, Jacobson-Truax method, and hierarchical linear modeling.

Outer setting. From the beginning of clinical practice, corresponding with Lightner Witmer's (See Appendix A, Figure 2, Item m) formation of the first psychological clinic in 1896, professionals interested in the function of psychological treatment have grappled with how to substantiate its precepts (APA Presidential Task Force on Evidence-Based Practice, 2006). Those who wished to prove the value of psychotherapy searched for definitive theories to

formulate causal inferences about the nature of psychological recovery and descriptors to symbolize this understanding. Consequently, terms like "treatments that work" (Nathan, Gorman, & Chambless, 1999), "best practices" (Norcross & Wampold, 2011), "promising practices" (Paul, Hassija, & Clapp, 2012), and "effectiveness" (Lambert & Bergin, 1994; Seligman, 1995) have arisen to denote the worthiness of assorted theories undergirding the foundations of treatment regimens. These labels are bantered about in the psychological community and remain present in the literature today. However, the designation, efficacious, at present, appears as canon in all disciplines associated with behavioral health services and the APA. Chambless and Ollendick (2001) related that efficacy, as a term in psychology, was initially connected to the phrase "empirically validated treatments" by the Division 12 (Clinical Psychology) Task Force on Promotion and Dissemination of Psychological Interventions, currently known as the APA Presidential Task Force on Evidence-Based Practice.

Tolin, Forman, Klonsky, McKay, and Thombs (2015) emphasized that, in the first of three reports issued under then president David Barlow, Ph.D., the Task Force identified sanctioned psychological interventions under the empirically validated treatments description. Later, the empirically validated treatments description gave way to the Empirically Supported Treatments (ESTs) classification (Clement, 2007). Subsequently, ESTs evolved into the contemporary designation, "Evidence-Based Practices" (EBP; also known as evidence-based practice in psychology [EBPP]), through the IOM in 2001 (Levant, 2004). See Table 7 (Appendix B) for the benchmarks by which the Task Force currently judges psychotherapy interventions to be efficacious. The APA Presidential Task Force on EBP Evaluation Criteria sets forth the premise that performance measurement can only occur when individual organizational psychotherapy outcomes are compared to objective industry standards.

Eye Movement Desensitization and Reprocessing (EMDR) appraisal (Medical Model or Contextual Model). The APA's Clinical Practice Guidelines, updated July 31, 2017, records their sanctioned PTSD Treatments. Within the Psychological Treatments section of the website, the APA ranks EMDR as "Conditionally Recommended," beneath their four "Strongly Recommended" interventions (CBT, CPT, Cognitive Therapy, and PE). However, no data was available to determine whether or how the four criteria identified in the APA Presidential Task Force on Evidence-Based Practice Evaluation Criteria were utilized to rank interventions in the APA's Clinical Practice Guidelines. In addition, the following statement was recorded about EMDR for PTSD within the treatments section of the Division 12 website:

> The efficacy of EMDR for PTSD is an extremely controversial subject among researchers, as the available evidence can be interpreted in several ways. On one hand, studies have shown that EMDR produces greater reduction in PTSD symptoms compared to control groups receiving no treatment. On the other hand, the existing methodologically sound research comparing EMDR to exposure therapy without eye movements has found no difference in outcomes. Thus, it appears that while EMDR is effective, the mechanism of change may be exposure – and the eye movements may be an unnecessary addition. If EMDR is indeed simply exposure therapy with a superfluous addition, it brings to question whether the dissemination of EMDR is beneficial for patients and the field. However, proponents of EMDR insist that it is empirically supported and more efficient than traditional treatments for PTSD. In any case, more concrete, scientific evidence supporting the proposed mechanisms is necessary before the controversy surrounding EMDR will lift (Eye Movement Desensitization and Reprocessing for Post-Traumatic Stress Disorder, n.d.; Eye Movement Desensitization

and Reprocessing for Post-Traumatic Stress Disorder section, para. 2)

Psychology's entanglement with the medical model has long demarcated Western cultural psychotherapy practice. Evidence-based medicine's philosophical origins extend back beyond the mid-19th century. However, this period, noted for French medical studies and the burgeoning British measurement tradition, which involved taking measurements of patients (Wampold & Bhati, 2004), marked one of the foundational nexuses of efficacy and evidence-based practice (Sackett, Rosenberg, Gray, Haynes, & Richardson, 1996). The other connection undoubtedly began with Freud, as he was a physician committed to evidencing a new procedure, known as psychoanalysis, which was used as a cure for hysteria, a label imposed on countless psychological conditions among women during the Victorian Age (Elkins, 2009).

Following the aforesaid paradigm in a more recent era, the Division 12 Task Force committed to continuing its efforts to evaluate the efficacy and effectiveness (See Appendix A, Figure 2, Item n) of psychological interventions by transforming the Task Force into a standing committee. By a vote of the membership, this transition was approved and took effect in January 1999 (Chambless & Ollendick, 2001). Dozois et al. (2014), indicated that in 2001the Board of Directors of the Canadian Psychological Association (CPA) likewise launched their Task Force on Evidence-Based Practice of Psychological Treatments to support and guide practice as well as to inform stakeholders. More recently, according to Stamoulos, Reyes, Trepanier, and Drapeau (2014) the Australian Psychological Society and British Psychological Society began to design their own medically-inspired clinical practice guidelines (CPGs; See Appendix A, Figure 2, Item o) to inform their clinical practice.

An important point of examination is the compelling influence of the medical model on the field of psychology. Elkins (2009) insisted that the medical model lends a type of status and

respectability to psychotherapy, which the profession does not intrinsically possess, by means of the model's association with two powerful systems in Western society: medicine and science. Further, Elkins (2009) declares that for emerging interventions to be taken seriously outside of the medical model is impossible without exiling a body from the mainstream constituency and making them vulnerable to political and economic repercussions from the forces that keep the model in place. An illustration of this, Thaul's (2012) report to the U.S. Congress on how the Food and Drug Administration (FDA) approves treatments and regulates their safety and effectiveness indicated that the mere mention of the term efficacy denotes medicine and science in the form of tightly controlled Randomized Clinical Trials (RCTs) and the superiority of treatments endorsed by them. More specifically, Chambless and Hollon (1998) echoed the APA Presidential Task Force on Evidence-Based Practice Evaluation when they stated that RCTs are the best means to demonstrate efficacy.

In opposition to EBP, Wampold et al. (1997), pioneers in the psychotherapy integration (See Appendix A, Figure 2, Item p) movement, published their influential writing, *A Meta-Analysis of Outcome Studies Comparing Bona Fide Psychotherapies: Empirically, "All Must Have Prizes."* According to Levant (2004), the paper was the first direct admonishment of the Task Force's contention that their ensemble was formed strictly "to consider methods to educate clinical psychologists, third party payers, and the public about effective psychotherapies" (p. 2). Rather, authentic therapies were now identified through medical and scientific sanction, employed to bring the populace into alignment with the medical model's philosophy as well as delimit financial benefit (Levant, 2004). In contrast to those utilizing RCTs to demonstrate the efficacy of EBP intervention, psychotherapy integrationists tend to cite meta-analyses as the means by which to advocate for common factors. Lambert and Barley (2002) spoke to this

dichotomy; maintaining that meta-analysis is superior in summarizing large quantities of empirical data. Thus, the authors challenged, this research technique is better utilized to estimate the actual treatment effects size to calculate the percentage of patients who improve under a variety of treatments.

Wampold et al. (1997) re-introduced Saul Rosenzweig's July 1938 article, *Some Implicit Common Factors in Diverse Methods of Psychotherapy*. The Rosenzweig article presented the common factors model, otherwise known as the contextual model, is not to be confused with the contextual model from the field of family studies. This model, dubbed the Dodo Bird Verdict (or Dodo Bird Conjecture) by Rosenzweig, proposed that common factors were actually responsible for efficacy in psychotherapy and used the analogy of the Dodo bird from *Alice in Wonderland*, who announces, "Everybody has won, and all must have prizes." The analogy refers to the claim that all psychotherapies, regardless of their specific components, produce equivalent outcomes (Wampold, 2015). More to the point, Smith, Pols, Lavis, Battersby, and Harvey (2016) disclosed that for many, therapeutic alliance, one of the identified common factors, accounts for most of the variance in therapeutic outcomes. Furthermore, the Wampold et al. (1997) paper denounced APA Division 12 by accusing the group of a stratagem, through establishment of EBPP, to determine the future course of psychotherapy.

Wampold and Bhati (2004) emphasized that the clinical trials which underscore EBP and its devotion to the measurement of treatment effects on patients dogmatically accentuate the symptoms of disorders. Consequently, they feel this emphasis diverts the field from reliance on expert observations from trained clinicians as well as on the clients' own experience. Allied with this summary of the clinical performance of therapy, Portman (2009) described psychotherapies aligned with the medical model as representing psychotherapists who use techniques with the

demonstrated ability to alleviate a patient's condition. In contrast, the author correlated the

contextual model with an interpersonally competent psychotherapist whose treatment approach is

compatible with the client's worldview. Miller, Hubble, Chow, and Seidel (2013) found that 90

percent of states within the U.S. are, at present, implementing strategies to support the use of

EBPs and their overarching philosophy that specific disorders require specific treatments.

Regardless of the philosophical orientation of the clinician, in reference to psychotherapy, use of

the term efficacy appears evocative and political.

Inner setting. Nathan, Stuart, and Dolan (2000) offered a definition of efficacy perhaps

even more nuanced. They emphasized that the meaning of the term is most useful when

explicitly united with outcome measures (sometimes referred to under the umbrella term

"feedback interventions"). Mentioning outcome measures here is essential, as they are the

pivotal benchmark for any empirical conclusion on intervention efficacy. Outcome measures are

inquiries of clinical status concerning degrees of disability, quality of life, or personality in the

client, or the relative success of specific treatment protocols for a particular disorder (Nathan et

al., 2000). Moreover, Lambert and Barley (2002) explained that outcome measures perform the

important step of documenting client functioning before, during, and after participating in

psychotherapy. They also reveal that this type of documentation may include the following:

clinician rating scales, scales completed by the client's family, self-report questionnaires, or

significant records (e.g., employment history, insurance, medical, or school).

Process of implementation. Scheepers (2014) indicated that the use of outcome

measures to collect outcome data in the research of psychotherapy has become increasingly

popular during the last two decades. Hatfield and Ogles (2004) observed that clinicians who

assess material outcome in practice tend to be younger, have a cognitive-behavioral orientation,

conduct more hours of therapy per week, provide services for children and adolescents, and work in institutional settings. Contrasting this, they found that clinicians who forgo outcome measures cite practical (e.g., cost and/or time) and philosophical (e.g., relevance) barriers to their use. Both users and non-users of outcome measures were interested in similar types of information, including client progress since entering treatment, treatment strengths and weaknesses, and determining need to alter treatment (Hatfield & Ogles, 2004).

Lambert and Barley (2002) recounted that early efforts to document client outcome also relied heavily on unstandardized procedures and therapists' ratings of the clients' general improvement in one dimension. More recent efforts have focused instead on measuring outcome in many areas of functioning and from a variety of viewpoints. These viewpoints could include samples from the client, outside observers, relatives, physiological indices, and institutional information (e.g., employment or school records). Current outcome measures have also improved in that they focus on specific symptoms without being theory-bound. Some measures can be used to examine patterns of change over time because they are brief and can be repeated many times through the course of therapy. When outcome measures are chosen to assess treatment efficacy, they should reflect the purpose of the trial and the stage of development of the treatment (Wittes & Downs, 2009). Regarding trial purposes, Lambert and Barley (2002) affirmed that outcome measures improve intervention for the individual clinician and can be used to establish viable treatment protocols for specific disorders. Additionally, the writers indicated that outcome trials are often used to analyze performance in a myriad of domains (i.e., by clinicians, researchers, third-party payers, administrators, and policy development officials).

Lutz, De Jong, and Rubel (2015) related that in the last 15 years patient-reported outcome measures (PROMs) in particular have gained significant footing in the field of psychotherapy

research, and have demonstrated their potential to enhance treatment outcomes, especially for

patients with an increased risk of treatment failure. Implementation of PROMs center on

observing the individual client's response throughout the course of therapy and afterward. This

approach determines how each particular client is responding in therapy. Further, PROMs

concentrate on the clinical significance of the individual client's responses to interventions rather

than just the statistical significance of differences among group averages, as is common in

efficacy and effectiveness studies. Most importantly, Krägeloh, Czuba, Billington, Kersten, and

Siegert (2015) highlighted that the feedback from PROMs appears to be more effective when

integrated in a formalized and structured manner. Lambert and Barley (2002) noted that many

researchers are interested in a core battery of outcome measures to facilitate comparison and

integration of outcome research findings. Nevertheless, no battery of this nature exists, and one

may be difficult to construct, given the complexity of possible situations falling within a testable

range. Still, Lambert and Barley (2002) offered an itemized guideline for outcome research,

detailed in Table 8 (See Appendix B).

Moreover, the aforementioned status of PROMs is unacceptable for a promising

treatment program. Accordingly, Hoge et al. (2014) indicate that the inability to complete the

prescribed number of treatment sessions is clearly the most prominent predictor of treatment

failure. Therefore, any successful treatment program must implement reliable, valid, and

feasible strategies to improve engagement, therapeutic alliance, and retention to continually

improve their ameliorative procedures. Thus, a streamlined assessment of a clients' symptoms

and functioning to aid clinicians to more rapidly identify problem areas and symptom domains of

interest are required. From a clinical perspective, clinicians' and clients' use of the correct

progress monitoring measures can quickly determine current clinical severity and historical

trends over the course of treatment, heading off treatment disenrollment and subsequent

treatment breakdown. In other words, the need for progress tracking is unquestionable, as it

addresses the question that ultimately matters most (Drapeau, 2012): is this treatment, as I am

delivering it now, helping the patient sitting in front of me?

       Intervention characteristics. In addition to improved therapeutic outcomes which the

Krägeloh et al. (2015) study found surrounding guidelines for clinician-patient discussion of

feedback from outcome measures, the researchers also found other variables related to positive

therapeutic outcomes. Namely, results showed that the digital support tool software and the

frequent collection of feedback, or feedback intensity, were related to positive therapeutic

outcomes. Regarding a feedback system, Lutz et al. (2015) suggested that therapists' satisfaction

with the feedback system and their use of the feedback information are differential predictors.

Furthermore, the debate about showing feedback directly to patients versus to therapists showed

mixed results; it remains unclear whether delivering formal written feedback to patients results in

a further enhancement of outcome (De Jong et al., 2014; Shimokawa, Lambert, & Smart, 2010).

       In the final analysis, Lambert and Barley (2002) indicated that therapeutic efficacy can be

established only when sound outcome measures are employed. Individual clinicians,

interventions, specific disorders, and organizational programs can be assessed for the degree to

which they benefit from use of these instruments. Further, this study articulated that metrics

linking provider performance and specific behaviors during therapy with client outcome serve

the process of psychotherapy, leading toward objectives that define cost-effective treatment.

Additionally, Lambert and Barley (2002) conveyed that master clinicians who repeatedly

produce better outcomes could be studied so that other practitioners might learn from their

procedures.

This section focused on literature relevant to the third question of the program evaluation: What is the efficacy of the EMDR therapy employed by the Veteran Resilience Project of Minnesota? This section examined the viewpoints surrounding qualifying treatments and competence in their practice. We also examined the concept of EBP, its criteria, and the implications of efficacy. In connecting the literature specifically to the work of the Veteran Resilience Project, we examined the development, relative to efficacy, of EMDR from the vantage point of the APA. This consideration merged with the chronological explanation of the debate between the medical model and the contextual model also provide background for the present program evaluation. Finally, we engaged in a comprehensive discourse on outcome measures and their standing in the debate on treatment efficacy, in order to provide context for the efficacy assessment undertaken with the current investigation.

Chapter III: Methodology

Chapter III of this dissertation describes the research procedures used during the program evaluation conducted for the Veteran Resilience Project (VRP) as well as the existing intervention methods employed by the VRP. Because the VRP is indeed concerned with increasing the scope of an operational project, an implementation program evaluation was completed. Nevertheless, this review can be technically referred to as a formative program evaluation, as one of the purposes of a formative evaluation is to conduct an organizational appraisal with the primary purpose of gathering information to improve or strengthen the implementation of a program that is already underway. Thus, both types, formative program evaluations and implementation program evaluations, assist in showing implementers where to adjust, so a program can eventually achieve significantly improved results. In consequence, either designation is applicable here. Moreover, no affiliation between this program evaluator

and the VRP, as an organization, exists other than during completion of this evaluation.

Therefore, this organizational assessment is of an applied external variety. Thereby injecting

neutrality, objectivity, individual responsibility, and a separate point of view into the program

evaluation process. At the same time, VRP stakeholders are vital in considering essential aspects

of the program through the investigation methods employed in this chapter, which commences

with a formal analysis of the program theory.

Veteran Resilience Project Intervention Methodology

   Program theory. The NPO's program theory is embodied in its function and

corresponding objectives, which have a bearing on the methods and procedures to be employed

in the present investigation. A program theory is used to explain the major services that a

program will provide and the intended benefits of those services in simple terms. The program

theory, detailed below, explains why and how a program is expected to function and is further

streamlined by an accompanying logic model (See Appendix A, Figure 3, Item a).

   Program conception. The Veteran Resilience Program began with the assembly of a

Veteran Committee. This group was created to formulate the most effective means by which

outreach to the veteran cohort could conceivably be conducted within the greater Minnesota area.

Twenty-five EMDR therapists were recruited mostly throughout the Metropolitan Minneapolis

and St. Paul regions, which represented 17 locations around the state. Therapists who enrolled in

the program had at least five years of experience in the use of EMDR in conjunction with

treating trauma.

   Outreach procedure. The Veteran Committee members reached out to all military

sources within Minnesota to establish relationships. In conjunction with outreach, committee

members attended monthly meetings with veteran organizations, veteran groups, and veteran

community events (e.g., Wounded Warrior Project program dinners, Mankato Stand Down

booth). Additionally, the organization made great efforts to reunite with veterans and service

connected personnel previously engaged in services. The World Veteran Café served to access

veteran community contacts for the exchange of information on various projects and programs

available to veterans. The participants engaged in brainstorming about possible barriers to care,

applicable outreach applications, and the unmet needs of veterans across Minnesota. A

newsletter was developed to summarize the meeting.

Training and intervention procedures. Two psychologists provided two advanced

trainings for treating military and combat trauma, and pro bono consultation for the therapists in

the project. A total of 27 veteran clients, 20 male and seven females, participated in EMDR

therapy. Of those, 21 completed the EMDR therapy and six dropped out. The clients were

allocated ten individual visits and two complimentary family visits per EMDR psychotherapy

regimen. Additional methodological and procedural information about the VRP is available for

reference in Appendix B.

Measures. In addition to the interviews and their associated questions (See Appendix C,

Figure 4), four primary measures were used during data collection by the VRP.

Impact of Event Scale – Revised (IES-R). Rash, Coffey, Baschnagel, Drobes, and

Saladind (2008) indicate that the Impact of Events Scale-Revised (IES-R) is a 22 item self-report

measure of trauma-related distress grounded in Milton Horowitz's emotional processing trauma

model on a five-point Likert-like scale with labels ranging from zero ("not at all") to four

("extremely"). According to Beck et al. (2008), within this model, individuals with trauma will

alternate between the experience of intrusive thoughts and feelings in one moment and avoidance

strategies in the next, until traumatic experiences are psychologically assimilated. The IES-R is

often used as a brief measure within veteran populations presenting at clinics to assess for PTSD

and can be administered in six minutes by a trained evaluator (Murphy, Ross, Ashwick, Armour,

& Busuttil, 2017; Robinson et al., 2017). The IES-R is also considered a psychometrically sound

measure for clinical and research purposes with a 6-month test-retest reliability of .94 (Haagen,

van Rijn, Knipscheer, van der Aa, & Kleber, 2017). The item list and protocol for the IES-R are

available in Appendix C (See Figure 1).

   Posttraumatic Stress Disorder Checklist, Military Version (PCL-M). The Posttraumatic

Stress Disorder (PTSD) Checklist – Military Version (PCL-M) is a 17-item self-report rating

scale measure designed to detect re-experiencing of symptoms in military associated individuals

to assess DSM-IV PTSD symptom severity (Wilkins, Lang, & Norman, 2011). Three PCL

versions exist; however, the PCL-M is anchored to items pertaining to stressful military

experiences. Individuals are required to rate the degree to which they were bothered by

symptoms on a five-point Likert-like scale in the past month labels one ("not at all") to five

("extremely"). The PCL-M also anchors the PTSD severity ratings range from one ("not at all")

to five ("extremely"). The PCL is useful for a variety of clinical and research assessment

contexts, especially when information about PTSD symptoms is desired but administering a

structured interview is not feasible (Weathers, Litz, Herman, Huska, & Keane, 1993). Wilkins et

al. (2011) indicate that the PCL-M demonstrates good temporal stability, internal consistency,

test-retest reliability, and convergent validity. They also signify that little is available on

discriminant validity and sensitivity to change. The PCL-M is also the most widely used PTSD

outcome measure in the VA (Acierno et al., 2017). The item list and protocol for the PCL-M are

available in Appendix C (See Figure 2).

   Posttraumatic Growth Inventory (PTGI). The Posttraumatic Growth Inventory (PTGI)

is a 21-item measure of posttraumatic growth reported by individuals after experiencing various types of traumatic events (e.g., acts of terrorism and exposure to war; Kaur et al., 2017). The PTGI detects changes in perception of self (which include: a greater sense of personal strength, resiliency/self-reliance, and developing a new path/opportunities), interpersonal relationships (which consist of: increased compassion/altruism or a greater sense of closeness in relationships), and changes in philosophy of life (which involve: a greater appreciation for each day and possible changes in religious or spiritual/existential beliefs; Calhoun & Tedeschi, 1999; Taku, Calhoun, Cann, & Tedeschi, 2008). Shakespeare-Finch, Martinek, Tedeschi, and Calhoun (2013) maintain that the PTGI is the most commonly used measure of positive psychological change from negotiating a traumatic experience. They relate that although the PTGI has strong internal reliability, validity studies are still sparse. This comparts with Roepke and Seligman's assertion that when the PTGI was used to measure growth and deterioration it was a reliable and valid five-factor measure (2015). Tedeschi & Calhoun (1996) observed studies which indicate that the PTGI has good internal consistency, acceptable test-retest reliability, and scores which are approximately normally distributed among persons reporting a variety of life difficulties on the scale. Notably, however, while the PTGI is considered a reliable scale (Feder et al., 2008; Mystakidou, Tsilika, Parpa, Galanos, & Vlahos, 2008; Tedeschi & Calhoun, 1996), there is dissent within literature regarding its validity (Shakespeare-Finch, Martinek, Tedeschi, & Calhoun, 2013). Shakespeare-Finch et al. (2013) remark that multiple studies establish the PTGI as an empirically valid measure of posttraumatic growth. Additionally, the authors relate that volunteers understanding of the meaning of PTGI statements had no dependence on experiencing growth for one's self in statement domains. However, participants understanding did support having had the posttraumatic growth experience. Subjects experiencing traumatic events also

reported perceiving the discrete factors of relating to others, appreciation of life, new possibilities, personal strength, and spiritual change in their interpretation of PTGI phrasing. The item list and protocol for the PTGI are available in Appendix C (See Figure 3).

Dissociative Experiences Scale (DES-II). The Dissociative Experiences Scale–II (DES-II) is a 28-item, self-report measure of dissociative traits (e.g., experiences of absorption, emotional detachment, amnesia, depersonalization, derealization, identity confusion, and compartmentalization; Granieri, Guglielmucci, Costanzo, Caretti, & Schimmenti, 2018). Hallings-Pott, Waller, Watson, and Scragg (2005) indicate that the instrument has good psychometric properties, which include a split-half reliability of 0.83 and a test-retest reliability of 0.79– 0.96. They also specify that it has good construct validity (demonstrated by the high scores of examinees diagnosed with dissociative disorders) and good convergent validity in conjunction with other measures of the trait dissociation. Lastly, they reveal that the DES-II has strong discriminant and criterion validity, demonstrated by associations with non-dissociation measures and DSM-IV diagnoses, respectively. The item list and protocol for the IES-R are available in Appendix C (See Figure 4).

Program Evaluation Data Collection

Evaluation conception. This evaluation was initially undertaken in June 2014 in response to a request by VRP founder Elaine Wynne to Antioch University Seattle Faculty Member Dr. Mark Russell regarding having a Doctoral Candidate review their data through statistical analysis. A letter of understanding was generated in order to begin the project through a research grant (See Appendix D, Figure 1).

Recruitment of veterans for mental health treatment. This series of interviews, which took place between May 18, 2015, and August 6, 2015, explored VRP clients' experiences

pertaining to EMDR, including themes such as clients' perspectives on how EMDR promotion

occurred, how this treatment benefited the armed forces linked community, and what the VRP

could adjust to provide improved resources and PTSD concentrated training to veterans in

Minnesota. The interviews were conducted face-to-face, through telephone contact, and by

email. Candidates were initially contacted by Elaine Wynne, the founder of Veteran Resilience

Project of Minnesota, Inc. and Board President, who provided prospective respondents with

initial information relating to the follow up process of participation in the interviews. Participant

contact information was subsequently given to the interviewer, who set up individual

appointments.

Prior to participating, clients filled out a waiver and release form recognizing the

appreciative risks and benefits (See Appendix D, Figure 5). Interview questions were drafted,

developed, and edited by VRP representatives, including Elaine Wynne. Transcribed client

names were redacted such that the interview record would conform with Health Insurance

Portability and Accountability Act of 1996 (HIPAA; See Appendix A, Figure 3, Item b)

regulations. Accordingly, researchers conducted interviews with study participants post-

treatment. Respondents were assigned study identification terms (i.e., Respondent A, B, C, etc.).

For a complete interview schedule and list of questions, see Figure 6 (See Appendix C).

First, respondents were asked about how they found out about EMDR. This line of questioning

included queries asking respondents if they sought treatment on their own, someone invited

them, or whether they were encouraged to seek help. And, if the latter two cases had pertained

to them, whether this person was a family member, friend, or fellow veteran. Additionally,

respondents were asked whether they knew anything about EMDR before they were referred,

and whether they had encountered any challenges in this process that they would be willing to

share. This final question sought clients' suggestions regarding ways in which the process could

be improved for availability and access to services as well as their former pre-treatment posture

on the EMDR therapeutic procedure used.

This program evaluator was not given identifying information relating to any individuals

in the VRP process. Instead, a transcript of the responses was provided, categorized by

respondent. The VRP stated, however, that these individuals were provided with and signed

waiver and release forms discussing the risks and benefits of participation in the interviews.

Retention strategies. Preparatory interview letters accomplished initial facilitation of

interview candidate contact. Letters were addressed to 25 potential interviewees whose names

were obtained directly from VRP founder Elaine Wynne. Each preparative letter contained an

Informed Consent Form, approved by the Antioch Seattle Institutional Review Board (IRB; See

Appendix A, Figure 3, Item c), to participate in the interview, a schedule of interview questions,

and prepaid postage/pre-addressed envelope. Five VRP EMDR treatment providers returned the

consent forms and submitted to the interviews. Hence, this program evaluator conducted a series

of five separate interviews with EMDR treatment providers on the second program evaluation

question. Correspondingly, providers were asked additional sets of inquiries to assist in

elucidating program evaluation questions one and three. The therapist interviews took place

between September 7th, 2014 and February 20th, 2015. These interviews were conducted face-

to-face, over the phone, and through email. Interviewee names were amended to assist them in

remaining anonymous by referring to these participants as individual components of the provider

grouping (i.e., Respondent 1, 2, 3, 4, and 5). At the start of the exchange, the interviewees

responded to a set of questions concerning how the VRP could increase the number of veterans

treated.

Efficacy of EMDR treatment. Data from the evaluation of the VRP's EMDR therapy program was collected and entered into the organization's database throughout January of 2013 via program representatives. Though executing an external program evaluation, the evaluator was involved in efforts by VRP representatives to make data access more user friendly, after VRP data collection and data entry, without involvement in direct manipulation of the archived data. Drawn from this database, a keynote database query, Termination Summary Data Query, focused on client satisfaction as well as completion rates. It was primarily through this query, as well as other historical program documents that a determination was made that 27 clients from the original 30 veteran and service connected clients in the project, ultimately contributed data to the evaluation of treatment information collected.

Data analyses. The analyses conducted for this study consisted of a series of descriptive statistics along with paired-samples *t*-tests whose purpose was to determine whether significant changes were present over time. With respect to the descriptive statistics conducted, sample sizes and percentages of response were calculated and reported in relation to the categorical variables included in this study, which consisted of study completion, with the mean, standard deviation, and standard error of the mean reported for the study variables of avoidance, intrusion, hyperarousal, and total score on the PCL-M. The mean was selected for use as a measure of central tendency, with the standard deviation selected for use as a measure of variability. Means and standard deviations were also calculated and reported in relation to DES-II percentage and for how long the respondent has had a problem, with the minimum, maximum, and range also reported in these cases.

As these data were repeated-measures, paired-samples *t*-tests were then conducted in order to determine whether a significant change in the mean of these measures were found over

time, with an alpha of .05 used as the standard for statistical significance. The paired-samples *t*-test was an appropriate choice in this case as the focus was on the change in the mean of some continuous measure between two time points with the same sample of respondents surveyed twice. Paired-samples *t*-tests were also conducted in relation to the PCL-M data, with descriptive statistics, incorporating the mean, median, standard deviation, range, and minimum and maximum scores also calculated and reported for these data.

Chapter IV: Results

This chapter contains a presentation and discussion of results from two modes of analysis conducted for this applied external implementation program evaluation. A qualitative analysis was conducted on the interview data collected from participants, including both face-to-face, telephone, and email interviews conducted by the Veterans Resilience Project (VRP) with treatment recipients; and face-to-face, telephone, and email interviews conducted by this program evaluator on VRP treatment providers of Eye Movement Desensitization and Reprocessing (EMDR). This work entailed reviewing and piecing together the responses obtained. This was done to assist in developing insight, at a deeper level, into the nature and value of the therapeutic EMDR intervention utilized by the VRP as well as its drawbacks and areas for needed enhancement. Following this, quantitative data were gathered, consisting of descriptive statistics along with paired-samples *t*-tests to determine whether significant changes took place over time. These analyses serve to present an initial illustration of the sample of participants included in this program evaluation along with a picture of the efficacy of the treatment they received. Responses are categorized and organized by themes, topics, and respondent, and use gender-neutral pronouns (i.e., they/them) for discussions not pertaining specifically to gender.

Results of Recruitment Strategy Investigation

Regarding clients' first learning of the EMDR modality, Respondent A mentioned that they became aware of the existence of EMDR through their graduate school studies and mentioned finding out about the VRP through their employer. Consequently, they went through treatment in the Twin Cities after receiving a referral from their supervisor. Respondent B shared that they had been looking for a PTSD-specific therapy through Military One Source (See Appendix A, Figure 4, Item a), but began to search independently after being unable to find anything suitable. Following this, they found a specialist through TRICARE who recommended EMDR. While this modality was not their first choice, Respondent B noted that at this time, they were at such a low point that they were willing to try anything. Up until this point, they had known nothing of EMDR therapy and believed that Military One Source, a significant source of referrals for veterans, would not provide treatment for PTSD due to a funding problem. Additionally, Respondent B offered that their spouse had been supportive, encouraging them to continue looking for resources when other therapies failed to work.

Respondent C said that this therapy "fell into my lap," explaining that they spoke at a meeting with Elaine Wynne, founder of Veteran Resilience Project of Minnesota, Inc. and Board President, whom they knew through work, and, having qualified for the free EMDR sessions, completed treatment. They reported using the Mayo Clinic's website as a resource for information about EMDR after having scheduled sessions for treatment. Respondent D first learned about EMDR at a women's veteran retreat and a health fair where VRP was promoted. They hoped that treatment, which was something new for them, might help them live a better life. Respondent E imparted that their spouse had searched via Google and found a private practice resource affiliated with the VRP in the Rosemont area. They explained that their

struggle with specific posttraumatic symptoms had led their spouse to research treatment options.

A researcher asked respondents whether they could provide any input regarding use of technology for promotions, as the VRP was exploring social media and updating its website. Respondent A indicated that veterans look to the VA for consultation, which lends informational power to the VA. They felt that the VA had promoted EMDR only minimally due to a lack of evidence regarding its efficacy. As a result, in Respondent A's opinion, veterans were less likely to use this form of therapy as they trusted the VA to discern which treatments were and were not credible regardless of promotion type. However, Respondent A also felt that EMDR does comprise a valid form of therapy due to their own experiences through the Veterans Affairs system and based on opinions they had heard from other veterans.

Respondent A also discussed the issue of social media and privacy. Respondent A noted the effectiveness of platforms such as Facebook but mentioned that the freely available nature of social media fails to protect the activity profiles of individuals who are actively serving. For example, if someone who is suffering from posttraumatic symptoms engages with something (i.e., "likes" it) on Facebook, their activity will then show up in the newsfeeds of their fellow soldiers who are part of the same network. When this happens, attention can be drawn to that individual, assumptions made, and rumors quickly spread. Respondent A then suggested that, if social media were to come into use, it should be heavily regulated and stripped down, further suggesting that such websites should be easy to navigate, gather minimal information, and feature strong privacy controls for the protection of the user.

Respondents were asked how the VRP could advance the promotion of EMDR. Respondent B said that social media could be used appropriately for promotion, referring specifically to using social media one-dimensionally for advertising purposes. They suggested

that in this way, the bi-directional communication involved in commenting would not be

required which would eliminate issues of profile security. This individual emphasized the

challenge of keeping social media content relevant and encouraging interest without raising

privacy concerns. Following these remarks, Respondent C pointed out that VRP had an

excellent website which could reach prospective patients and increase the organization's

credibility. In Respondent C's opinion, a good website, along with the use of social media, could

serve as an alternative to providing a referral directly on a piece of paper, which creates a trail of

documentation. Additionally, Respondent E described that Facebook provides a significant

advantage, indicating that an advertisement for an organization, an affiliate, or other resources

that could connect them to EMDR could "really catch someone's eye." Respondent E disagreed

that privacy was a substantial concern, stating that "you always have the naysayers and those

who put it down…but in the end, it's giving them help." Responded E reported that they also

felt that the most significant benefit of a website would be the ability to comment on the process

as a method of constant feedback.

Another topic of query for respondents was how they would describe the process of

EMDR to someone who had not been through it. Prompted by this question, Respondent A

suggested the importance of providing EMDR to veterans living in more rural areas, stating that

such a measure might heighten the incentive for veterans to participate in this form of therapy.

Notably, they explained that driving in congested areas can be a significant trigger and that

greater availability in rural areas would make it easier for veterans living in less populated

regions to participate in this form of therapy by lessening the chances of their being triggered en

route. More relevant to the question, Respondent B stated that:

EMDR is not: a method of re-experiencing but resetting. While going through the

process, you're living more comfortably than [during] other therapies... But it's

something where you feel things, preprocessing and reconnecting in different manners.

It's not as draining a session [as those of other therapies], but it's powerful. You come

away with a small sense of comfort each time and slowly, for whatever scientific reason,

triggers start to disappear, [and you] become less sensitive to things.

Respondent C mentioned having referred a friend to the therapy who dropped out after

two sessions. Based on the friend's experience, Respondent C had known that "… it was going

to be hard work." They mentioned not having been prepared for the degree of stress they

experienced and felt that the lack of warning about the emotional discomfort associated with

EMDR created an "unnecessary risk." Instead, Respondent C asserted that clarifying the risks

and difficulties of the therapy was crucial to offering it for veterans. They noted that, for them,

the first few sessions were so intense that they felt like they were "…back in combat again."

Talking through traumas and memories led to severe emotional and physical discomfort after the

first few sessions, which placed a significant strain on the respondent's marriage. Further,

Respondent C said that they felt that the difficulty in processing specific points of stress caught

them off guard, describing the recovery process as going through "a lot of suck to get to a

superpower." However, they also affirmed the ability of EMDR to enable a person to

successfully sort through painful emotions and triggers while reconnecting with good memories.

Respondent D noted that EMDR caused them stress, because this type of therapy is

"…based on trying to reveal what the trauma is, it can be a distressing thing in itself."

Respondent E shared that during the time of the first two or three sessions, they had more intense

nightmares, would find themselves on edge, and experienced some of the same emotional and

physical discomfort they had experienced in combat stress. However, they also described the

EMDR therapy itself as calm and low key; "It's not what you're expecting it to be. It's more relaxed, it's at your pace, and someone's there to guide you through the process." They also described the process as tailored to the individual, with traumas being sorted one piece at a time with intermittent breaks, in which the therapist asks the patient to discuss happier memories. This respondent felt there was a sense of empowerment for the patient, as they have the option to discuss or evade traumatic material, determine how far they want to go, and choose what measures to take. Overall, Respondent E reported a positive personal experience concerning this therapy's level of relaxation, stating, "I could just sit and think and therefore go into a deeper level of thought."

Later, the therapy process became the focus of the interview. Queries addressed what went well in the therapy process for respondents, with questions bypassing the more technical aspects of the process to focus on matters relating to specific traumas not presented. Additionally, researchers asked respondents about EMDR's use as a modality and whether they felt that the therapist was adequately prepared and knowledgeable. Past clients also fielded questions about what they felt could be improved. Respondent D discussed earlier life trauma within the context of their "testing anxiety." They mentioned that other therapeutic means had led to resolution of specific past traumas that they had experienced. In therapy, this respondent discovered that they did not focus on any significant or debilitating problem with their traumas or triggers, as these had not been causing any major quandaries.

Broadly, respondents indicated that spouses, friends, and family members were important in the process of therapy. Questions addressed respondents' feelings about the support they received from these individuals when they first began the process of seeking EMDR therapy. Concerning the idea of social support systems generally, Respondent C referenced people they

considered "battle buddies" (See Appendix A, Figure 4, Item b) or those who had previously experienced this modality of therapy. They expressed that clients need time to regroup and process layers of emotion after each session. This recalibrating process, Respondent C maintained, would be helped if therapists alerted clients that the time directly following therapy sessions is best not spent with family. Further adding to the focus on spouses and partners, Respondent C indicated that VRP should reach out to spouses and partners, inviting them to become an element of the evaluation process, as they can contribute an added perspective. Session notes related that VRP also hoped to provide answers to spouses' questions. Ultimately, respondents had an opportunity to disclose whether they supported a spousal focus and, if so, why, as well as acknowledge any reservations they might have.

Respondent B was very supportive of the spousal focus idea, asserting that "Veterans are always going to be headstrong in saying, 'I can do this. I don't need help.'" They pointed out the value of having a spouse, significant other, or family member step in and say that an individual needs further support, or that they are improving and should stay in therapy for that reason. Respondent B also noted that the objectivity of family members and spouses could make them brutally honest, which can be a necessary aspect of the evaluation process. Concerning the involvement of spouses, family, and friends, Respondent C observed that many veterans, especially males, resisted having their spouse involved in this type of process. Instead, they wished to engage in the process on their own. This point was affirmed by Respondent B. To this point, Respondent C added, "Sometimes pushing guys beyond their boundaries is what they really need." As to communication more generally, Respondent D uncovered that patients' lack of openness discouraged the involvement of support networks: "There is an assumption that whoever is receiving this therapy is communicating that they're receiving it." Due to the

assistance this individual had received from a spouse, they strongly encouraged the involvement of spouses, stating that spousal involvement would allow spouses to have a deeper understanding of how the process works.

Advancing the interview, respondents reacted to whether they would be interested in participating in larger gatherings of veterans in the VRP networking process, thus, helping to form a community and pooling assets. Worth noting, the VRP wanted to increase partnership with veteran organizations who had a similar mission. Therefore, additional queries to respondents centered around the benefits they expected this alliance would provide and possible respondent reservations. However, there were no relevant responses to this question beyond a suggestion from Respondent A wondering if association with organizations that have notoriety, funding, and a brand may provide permission to veterans to partner with the VRP. That said, some respondents discussed other possibilities for networking affiliation enlargement. Respondent A contributed promotional recommendations for branching outside the veteran network and offering assets and services to hospital systems and schools. The Respondents were then asked to deliberate about the possibility of having two tiers or levels of referrals; this could include, for example, a child consulting a guidance counselor for home issues. In this scenario, VRP would allow the counselor to provide access to EMDR therapy and other utilities for a parent facing post-traumatic symptoms.

After this, Respondent B mentioned that the St. Cloud's VA has EMDR available to veterans, while it is not available in the Twin Cities, which creates inconsistency. Furthermore, Respondent B mentioned that EMDR is not universally sponsored on a national level. Also, Respondent C mentioned that a basis in evidence is required for the treatment to receive the VA's seal of approval, asserting that the bureaucratic red tape associated with the VA prevents

progress concerning a modality of therapy viewed as being experimental. While Respondent C cited uncertainty about changing the opinion of the VA, they did mention the possibility of contacting affiliate organizations and their subsidiaries.

In the end, Respondent D began considering and remarking on some of EMDR's formal methods. They started by predicting that multiple sessions were not necessary to establish a history and instead alleged that focusing on the present would be a more useful approach. They suggested that the therapists should provide tools relating to dealing with the stress of being in the office and experiencing discomfort from the first session. They also deliberated on the communication of possible risks of one experiencing heighten anxiety before or when undergoing therapy. Moreover, they applauded focusing on the veteran-specific population with EMDR as they commented that they believed the treatment could work exceptionally well with that cohort. To conclude, Respondent D believed that EMDR lacks a spiritual component, they supposed that fostering spiritual connectivity is crucial in achieving a more positive and meaningful outlook.

Summary. The VRP representatives conducted face-to-face, phone, and email interviews with post-treatment recipients of their program. Respondents recounted becoming involved with the VRP in preliminary recruitment scenarios as varied as initial spousal enrollment of a client, attendance at health fairs, and referral through employment as well as recommendations out of more traditional government healthcare programs sources such as TRICARE. Respondents indicated that service connected personnel generally looked to another larger governmental entity, the VA, to discriminate treatments of value. Thus, the VA was perceived to be influential in the recruitment process. Social media and consequent privacy concerns surrounding veteran and service-connected individual's recruitment for treatment were

essential topics for the participants. The importance of providing EMDR to veterans living in

more rural areas was also discussed, asserting that concentrating VRP services in these areas

could increase the encouragement for veterans to participate in EMDR therapy. Respondents

also disclosed their personal experiences of EMDR within the VRP program. The interviews

concluded with questions about the involvement of significant others, use of networking to

promote a veteran and service-connected treatment community, and consideration of EMDR's

formal methods.

Results of Retention Strategies Investigation

For clarity, it should be noted that this section refers to Respondents 1 through 5, who are

the professionals involved with VRP, not the patients or veterans who were referred to as

Respondents A through E in the previous section. Respondent 1 said that they felt that the best

way to strengthen treatment numbers was through "people talking to people" (i.e., veterans

talking to veterans, especially among younger veterans). They further recalled the value of

clients speaking with someone who had experienced EMDR therapy and felt that it had been

helpful to them. They also spoke of "the challenges of getting the word out." Respondent 2

reported feeling that a cyclical recruitment evaluation process might reveal hidden factors not

currently considered and allow for sustained generation of original ideas. Moreover, Respondent

2 mentioned that some currently utilized client recruitment strategies are not maintainable but

did not identify them. Nevertheless, Respondent 2 suggested that the leading staff member for

such an evaluation project have substantial experience with EMDR. Furthermore, they called for

having a veteran on staff, though there are currently veterans representing the VRP which hold

dual board and treatment provider positions with the organization. Still, this respondent could

simply have desired a veteran as a provider with their specific service location. Lastly, they

advocated for more substantial resources to support the program.

Regarding ways that the providers might participate in increased program enrollment through outreach, Respondent 1 divulged that they already did so informally by speaking with people they met and providing a brochure if the person expressed interest. Respondent 2 appealed for continuing with what they were currently doing but potentially allowing the therapists to have some input into the components of recruitment and outreach. Given that some providers are members of the VRP board, this respondent was probably alluding to providers having contribution to recruitment and outreach mechanisms as a group. Respondent 3 assumed that assisting with outreach was rendered impracticable due to the isolation of their treatment facility. Though, regarding VRP recruiting, Respondent 3 expressed that "compared to the rest of the world, they're doing great." However, this comment is difficult to categorize as either a positive or negative assessment of VRP client recruitment. Respondent 4 endorsed being unsure of how client recruitment takes place. They only recalled having received a phone call informing them that there was currently a new veteran client in the area and asking whether they could take them.

Respondent 3 noted that outreach was limited, citing little accomplishment pertaining to "going out and finding people that need services." They also saw little success from information fairs despite numerous VRP advertising attempts. Nonetheless, the idea of developing a website to be used to connect with veterans was discussed, along with the merit of having veterans involved in that website's development and testing—notwithstanding the VRP currently employing a dedicated website. Respondent 4 supported the need for marketing, specifically Internet marketing, and the use of social media. Conversely, Respondent 2 conceded that they considered the VRP website, social media, and funding less than effective and efficient but had

potential for amendment. Conclusively, as an adjunct to outreach, Respondent 5 underscored the need for continued marketing to vets, increased awareness in the community, and more training and opportunities for additional therapists.

In the second set of queries regarding which systems are least productive, efficient, and satisfactory, Respondent 1 believed that the problem related to finding more and superior ways to show veterans that EMDR is a "worthwhile thing for them to do." Correspondingly, they proposed that having a "…full-time, competent administrator running the program would be a benefit," mentioning that Elaine, who they felt sustained the program through her personal effort, at the time of this interview, often became overloaded. The respondent suggested that Elaine could instead become the clinical director, "…directing only the work that therapists do, with no one else running therapy." Data forms seemed less than effective in the opinion of Respondent 2. As the most satisfactory part of the program, Respondent 5 publicized "…the amazing growth and recovery of a given client in what is truly a fairly short time, given the incredible amount of both combat-related and historical trauma they had experienced." As a therapist, they communicated that this experience made them want to continue to work with EMDR for all their clients.

Regarding how well Respondents felt their organization served the target community, Respondent 1 felt that people received assistance in many ways, but that this form of therapy was the most effective and should be available to everyone. Respondent 2 felt that their performance with clients had been outstanding so far, but acknowledged that they had only recently started, while Respondents 3 and 4 felt that they were performing very well. Next, respondents were queried regarding their thoughts about how to improve the client data collection process. Respondent 2 commented: "Just make sure the system works." They also suggested conducting

an analysis each month, along with hiring a reliable professional such as a secretary or office

manager who could come in once a month, "run through everything," and "complete office

work." They asserted that the data collection system could be improved upon, specifying

computerized input rather than the current manual data input. Respondent 4 subsequently

brought up streamlining the documentation and making advanced use of technology to answer

questions, along with additional clarity as to why they are proceeding in their current approach.

The final and primary set of queries to respondents established their knowledge of what

the process of retaining EMDR therapists involved and whether additional therapists were

desired to meet an unmet need. Respondent 1 admitted to being unaware of the details of the

process of therapist retention, but regarding whether additional therapists were needed, they cited

the importance of obtaining more client referrals, versus preserving current provider staffing,

mainly out of the Twin Cities area. Respondent 2 asserted that in almost every case, they knew

the therapist and their treatment setting, applauded provider commitment to clients, experience,

and expertise, and noted that they covered an extensive area when recruiting therapists. They

also opined that currently, "VRP does not need additional clients." Instead, they expressed the

need for more therapists. An additional respondent idea was to increase provider stipends which

they believed would "…expand the pool of therapists available for this type of work."

Regarding the types of assistance from the VRP which would be most beneficial to them,

Respondent 2 named additional funding, including grants, while Respondent 4 invited

consideration of higher levels of compensation, and Respondent 5 called for help with organizing

paperwork thoroughly and efficiently. Regarding the types of challenges currently experienced

in their position within VRP, Respondent 2 described fatigue and anxiety, particularly anxiety

concerning their workload, with deadlines and schedules posing problematic issues. They also

described individuals on the advisory council as having become disenchanted over what the latter considered the bullying of a peer. Concerns over monitory resources ensued, specifically the lack of a sufficient budget, along with the lack of support staff and not being able to count on people needed for support and advice. Respondents agreed that the ability to hire additional staff with good work experience would be beneficial. Finally, Respondent 5 spoke of financial difficulties in a nonprofit organization that is trying to cope with an enormous under- and uninsured population, circumstances which produce difficulties in accepting clients as well as meeting their needs, particularly in those of individuals with low socioeconomic status in the community.

Considering policies regarding outside employment, interviewees generally concurred, saying there were no restrictions. While Respondent 5 cited a workplace policy disallowing them from engaging in any other employment that would compete with their current services. Concerning conflicts with their outside employment relating to their current position within VRP, the five interviewees cited none. When queried about positives to be found in their present employment and areas for further scrutiny and possible change, Respondent 2 cited the need for building stronger relationships with colleagues over time. Correspondingly this interviewee affirmed that the system for therapists needed scrutiny for possible change—not only concerning a needed influx of funding but perhaps regarding structure. Additionally, they spoke of the VRP's obligation to create a functional way to maintain organizational relationships. Respondent 4 explained that what works well for preserving organizational relationships is the fundamental balance of the project and the motivation to help veterans. This respondent cited communication as a possible area for modification, stating, for example, that some meetings had seemed to follow no agenda and that some organizational problems had no resolution, with the

awkward situations dismissed as a non-issue. Respondent 5 brought up a lack of additional time, stating that "With a young child and a very full-time job, I just didn't have enough time or energy to pick up additional hours."

Summary. Ostensibly, the VRP therapists interpreted the interview as a positive solution because it was an evidence-based decision-making process used by management to demonstrate a practice of persistent improvement. Though, the necessity for increased communication with other provider-staff was a reoccurring theme in the interviews as well. Because the therapists are immediately engaged in the treatment objective of the VRP, any productive solutions or ideas in the retention process will likely be inspired by, if not come directly from them. Nonetheless, a few clinicians revealed that they were unaware of VRP enterprise operations details. Of positive note, the providers reference their client focus; however, issues outside of conventional treatment (e.g., time constraints, family obligations, monetary or compensation difficulties, administrative issues [to include resource funding], and disconnection from the larger association) were also a concern for them. Providers felt general leadership was a strength of the organization, but the part-time status of management gave some in the group pause. A process approach leveraging technology to engage the staff better internally, a streamlined comprehensive administrative process, and an emphasis on relationship management seemed to be crucial factors advised for augmentation throughout these interviews.

Results of Treatment Efficacy Investigation

Statistics regarding completion of the treatment program regimen, also derived from the Termination Summary Data Query, indicated that 73.27 percent of participants ($n = 17$) definitively completed the treatment program with success, and three percent of participants ($n = 1$) completed treatment with only some success, and 25.93 percent of participants ($n = 7$) failed

to complete the program, having stopped treatment.

Subsequently, the demographic intake data collected from the Intake Data Query consisting of all 27 participants who had been engaged in the data collection were analyzed, with these measures consisting of phenotypically descriptive and other possibly related measures. Demographic and sample composition data are further detailed in Figures 1 through 4 (See Appendix E). First, of data entered regarding gender, 17 participants were male and six were female. Seventeen participants were white-identifying of European descent, one participant endorsed both American Indian (Native American) and White ethnic identity, two participants were African American, and one identified as Southeast Asian. Regarding marital status, seven participants were single, six reported being married, two reported cohabiting with a partner, and six were divorced.

Pertaining to branch of service, seven participants had been in the Army, eight were in the National Guard (with a member of this group concurrently endorsing Navy, perhaps pertaining to past military service), four were Marines, one was still in the Reserves (branch not stated), and two were in the Navy. Dates of service ranged from 1982 to 2008, while discharge dates ranged from 2003 to 2014. A total of 19 participants had been discharged honorably, with three having a medical discharge, two were retired, and one was still serving in the MN National Guard. Concerning the military operations in which participants had participated, 13 had taken part in Operation Iraqi Freedom (OIF), with five having participated in Operation Enduring Freedom OEF), and two in other military tours since 2001, including Desert Shield/Desert Storm, Iraq/Afghanistan, Kosovo Force (KFOR)-Kosovo, OIF and OEF, and Operation New Horizon (ONH; see Appendix A, Figure 4, Item e).

This sample of participants also reported having endured a wide variety of physical

injuries, with the majority related to head trauma. A total of eight participants had been in

explosions, four had been rendered unconscious, two sustained head wounds, three were

diagnosed with a brain injury (mild in one participant and moderate in two), and four stated that

they had sustained physical wounds. When reporting current medical illnesses, a total of six

participants conveyed that they were experiencing maladies consisting of the following: foot, leg,

and ankle problems related to gunshot wounds from shrapnel; Gulf War Syndrome (See

Appendix A, Figure 4, item c)/nerve damage in their connective tissues; declining health and

vitality; peripheral neuropathy; Postural Orthostatic Tachycardia Syndrome (POTS; See

Appendix A, Figure 4, item d); and a combination of PTSD and anxiety.

A total of 13 participants met diagnostic criteria for PTSD. Six were diagnosed with

other mental health concerns, including the following: anxiety, major depressive disorder

(MDD), memory loss, personality disorders, and depression. Five participants endorsed

addiction problems centered on alcohol, situational substance abuse, and sugar as well as

compulsive gambling to cope. Three participants endorsed having attempted suicide. As noted

previously, this is a representative sample given that comorbidities are common.

Participants endorsed a variety of reasons for engaging in treatment (See Appendix E,

Table 1). A total of 12 participants had previously undergone psychotherapy, with the dates at

which participants had experienced therapy ranging from 1992 to 2012. The number of sessions

varied from three to currently ongoing, however, in the latter case, the number of sessions was

not disclosed. Three participants endorsed having undergone EMDR therapy, with one

participant indicating their treatment had taken place in 2011 and one in 2012. The number of

sessions reported included three, approximately six and nine, while one of the participants

endorsed eight hours.

Medications (as well as alternative ingested substances) that participants were currently taking along with their associated dosages consisted of Adderall (20 milligrams), propranolol as needed (20 milligrams), and sertraline (50 milligrams). Participants also endorsed engaging in alternative medical practices such as use of essential oils and juicing.

Some indeterminate comments made by clients emerged from the data concerning why participants did not complete the treatment. For example, a non-completing participant indicated that their experience with the therapy to date had been very negative. This participant cited numerous and undefined personal issues. However, they asked if they could resume later. An additional participant was found to have moved to another state as the rationale for exiting the program. And, in a separate individual's experience with sessions, they explained that alcohol abuse and a volatile relationship with their partner had impacted therapy negatively. Nevertheless, current difficulty outside the therapy room did not necessarily pose a definitive factor in client outcomes. In one case, a participant cited a conflict of beliefs, criticizing the EMDR modality's focus on past disturbances. According to the participant, this course went against their spiritual belief system which they disclosed was connected to the present. A positive change was evident when comparing this participant's pretest and posttest data. In another case, a participant explained that they had experienced intense pain and had to interrupt therapy for surgery. Still, this participant felt that EMDR therapy was very beneficial, with scores indicating improvement on the Impact of Event Scale-Revised (IES-R) and the Posttraumatic Stress Disorder (PTSD) Checklist – Military Version (PCL-M) despite falling short of finishing the 10-session treatment regimen. The improved scores endorsed by this individual on these interrelated assessments demonstrated a reported occurrence of experiencing feelings and sensations for the first time since the onset of their trauma.

Finally, Dissociative Experiences Scale (DES-II) percentages from the Intake Data Query had a mean of 17.28 percent (*SD* = 10.88 percent,), with a range of two percent to 44 percent. Regarding how long participants had suffered such a problem, the mean was found to be 5.55 years (*SD* = 3.55 years), with a minimum of .25 years and a maximum of 12.75 years.

A series of inferential statistical tests were conducted to determine whether significant improvement appeared over time. First, regarding IES-R, the subscales of avoidance, intrusion, and hyperarousal were calculated. Subscales are calculated using specific items from the IES-R. The subscale of avoidance was calculated as the mean of Impact of Events Data Query items 5, 7, 8, 11, 12, 13, 17 and 22, with the intrusion subscale calculated as the mean of Impact of Events Data Query items 1, 2, 3, 6, 9, 14, 16 and 20. Finally, the hyperarousal subscale was calculated as the mean of Impact of Events Data Query items 4, 10, 15, 18, 19 and 21. The total mean IES-R scale was then calculated as the sum of each of the subscales. These metrics were calculated separately for the pretest and posttest administrations.

Table 2 (See Appendix E) presents the descriptive statistics associated with these analyses. Avoidance, intrusion, and hyperarousal were all substantially reduced in the posttest measures. This suggests efficacy regarding the treatment provided to participants. Regarding the total score, the mean of this measure was also substantially decreased in the posttest measure, further suggesting the efficacy of the treatment provided.

A series of paired-samples *t*-tests were conducted on the measures to determine whether a significant mean difference was present between the pretest and posttest IES-R data. First, regarding avoidance, the paired samples correlation was not statistically significant; $r(17) = .26$, p = .286. However, the *t*-test found a significant mean decrease over time; $t(18) = 4.74$, p < .001. Next, concerning intrusion, the paired-samples correlation was not statistically significant; $r(17)$

= .12, p = .631. However, the *t*-test conducted did achieve statistical significance, indicating that a significant mean decrease was present over time; $t(18) = 4.57$, p < .001. With respect to hyperarousal, the paired samples correlation did not achieve statistical significance; $r(17) = -.05$, p = .839, but the *t*-test indicated a significant decrease over time; $t(18) = 6.49$, p < .001. Finally, relevant to the IES-R total scale measures, the paired samples correlation was not statistically significant; $r(17) = .06$, p = .806, but the *t*-test conducted indicated a significant decrease over time: $t(18) = 5.59$, p <.001. Data from the IES-R is detailed in Figures 5 and 6 (See Appendix E).

A paired-samples *t*-test was used also for the PCL-M data. First, referring to the descriptive statistics associated with this measure, the pretest mean was 54.71 (*SD* = 16.22, *SEM* = 3.93), with a lower posttest mean of 31.71 (*SD* = 12.64, *SEM* = 3.07). The paired samples correlation was not statistically significant; $r(15) = .35$, p = .165. However, the *t*-test conducted indicated a significant mean decrease in this measurement over time: $t(16) = 5.69$, p < .001.

Finally, regarding the Posttraumatic Growth Inventory (PTGI), only one set of measurements was taken, so an inferential statistical test could not be conducted comparing pretest and posttest scores. The PTGI consists of five subscales, with these subscales being calculated as the mean of the following items: subscale 1: Posttraumatic Growth Inventory items 6, 8, 9, 15, 16, 20, 21; subscale 2: Posttraumatic Growth Inventory items 2: 3, 7, 11, 14, 17; subscale 3: Posttraumatic Growth Inventory items 4, 10, 12, 19; subscale 4: Posttraumatic Growth Inventory item 5; subscale 5: Posttraumatic Growth Inventory items 1, 2, 13. Specific items are detailed further in Table 3 (See Appendix E). Additionally, the PTGI total scale is calculated as the sum of these constituent subscales. The means of these subscales ranged from approximately two to 20, with the PTGI total score having a mean slightly above 62.

Summary. The qualitative data presented in this chapter probed and described essential issues relating to the EMDR therapy applied by the VRP as well as possible areas for its alteration. However, this could not generally obtain the extent to which the characteristics of these matters occurred without the utilization of numerical measurement. Therefore, the quantitative data provided in this section was needed to delineate numerical information about the participants included in this treatment program, along with indications of this therapy's efficacy. Still, the qualitative data combined with the outcomes of the quantitative data provided here, helped to highlight this treatment's efficacy, along with its positives and negatives, in addition to the difficulties experienced by participants. Ultimately, the results of the quantitative analyses did find substantial and significant improvements over time, which provides a strong argument for the efficacy of this therapy. Despite this, current limitations were also emphasized, thus providing a platform for adjudication along with possibilities for revision supporting this intervention. The ensuing chapter will discuss these results in light of previous literature and theory, as well as the limitations of this program evaluation and possibilities for future research.

Chapter V: Discussion

This dissertation was undertaken as an applied external implementation program evaluation for the Veteran Resilience Project (VRP) of Minnesota. This program aims to provide mental health services, specifically EMDR interventions, to veterans and armed forces connected individuals who experience PTSD. The purpose of the program evaluation was to evaluate three primary questions pertaining to the effectiveness of veteran recruitment, effectiveness of retention of therapists, and efficacy of the EMDR intervention. These questions, while specifically pertinent to VRP in clinical applications as resolution of the questions pertaining to veteran recruitment and therapists' retention are a means by which clinical capacity

is expected to be increased by the non-profit's (NPO) management, and more presently, are also

valuable in research. Given the scope and focus of the dissertation as a program evaluation, first

and foremost, attention in this chapter is directed to the dissemination of the results of that

evaluation. The other primary focus of this chapter is to present and discuss the broad

implications of the findings of this evaluation relative to both empirical study and clinical

interventions. Further, this chapter details the strengths and limitations of this investigation both

as a program evaluation and as a functional piece of empirical research.

Effectiveness of veteran recruitment. Veteran participants reported finding out about

the VRP via local avenues as varied as spouse's direct networking toward introductory

enrollment of a client for treatment, a Minnesota area clinic's website, presence at a women's

veteran community exhibition, and referral through employment as well as recommendations out

of more traditional government healthcare programs sources such as TRICARE. The synopsis of

Respondent experiences in the interviews may assist the VRP in better discerning the patterns of

treatment seeking behavior employed by the organization's veteran clients in the Minnesota area.

Effectiveness of therapist retention strategies. Feedback provided by the clinicians

involved in the VRP indicate that there are various means by which the VRP can increase

retention of therapists. Clinicians suggested that those with substantial EMDR experience

should coordinate the efforts of the VRP. Further, they noted the potential value of having a

veteran on staff or as a provider. Funding and compensation were also noted as ways to maintain

or increase therapist retention at VRP. Additionally, clinicians noted the need for greater

resources, both financial and otherwise. This includes the notion that additional support staff,

clinicians, and an engaged advisory board would be beneficial to retaining therapists. Broadly,

clinicians also shared that greater levels of organization are necessary. This includes both job-

oriented and interpersonal organization; increased communication between providers and staff, increased involvement of management and advisors, and increased streamlining of administrative processes are necessary.

Efficacy of EMDR treatment intervention. Veteran participants completed both quantitative and qualitative data measures to assess efficacy of the EMDR intervention. Broadly, pre- and post-test data for the PCL-M suggested improvement over time. Similarly, pre- and post-test comparisons for the IES-R demonstrated symptom reduction over time.

Recommendations for the Veteran Resilience Project

Given that this investigation is a program evaluation of an existing organization, particular attention is devoted in this section to address the recommendations for the organization based on the results of the evaluation. These recommendations are organized by the primary evaluation questions regarding effectiveness of veteran recruitment, effectiveness of therapist retention, and efficacy of the EMDR intervention.

Recommendations to improve effectiveness of veteran recruitment. Discovering the obscured psychosocial circumstances behind why veterans and current service members suffering from PTSD are not utilizing existing mental health treatment is imperative, as it is the initial access point to formulate an effective treatment recruitment strategy for the VRP. For instance, Respondents related that it is important to provide EMDR to veterans living in more rural areas, as they felt that this might heighten the incentive for veterans to participate in this form of therapy. However, negative attitudes toward behavioral health services constitute the most significant predictor of those experiencing PTSD but, counterintuitively, avoiding care. Another common reason cited by individuals who avoid mental health treatment is an inclination to manage emotional concerns on their own. Further, outside pressures, or triggers, in the

veterans' or service members' environment act to encourage or discourage health-seeking behavior. Therefore, predisposing factors such as sociodemographic identification, the social structure of their support system, and their mental healthcare literacy are important determinants that exist before the onset of a disorder which contribute to the individual's propensity to seek or avoid mental healthcare services once afflicted. It is also important to note that Respondents indicated in the interviews that veterans depend heavily on the VA for mental healthcare information. Further, the quantity of enabling resources such as wealth, income, and insurance obstruct or improve a PTSD sufferer's access to behavioral health services. Nevertheless, several veteran or service member characteristics such as younger age, male gender, and interestingly, being married, are associated with a decreased likelihood of behavioral health treatment utilization in veterans and service connected personnel with PTSD.

Changes in the composition of the military personnel engaged in combat operations are also relevant to inclusive PTSD rates, as a high proportion of those now serving in combat are National Guard and Reserve personnel. This is an important factor for the VRP as the recent suicides of a large number of active National Guard members in Minnesota have been publicized. The need for VRP treatment promotion efforts toward this group may be outsized as deployed guard/reservists develop symptomatic PTSD one to two years sooner than active service members. Additionally, they are the predominate group of service connected personnel in the Minnesota area. This difference may point to a potential vulnerability in the way that guard/reservists are either trained or utilized, leaving them at higher risk for the disorder. Moreover, National Guard and Reserve personnel frequently experience irregular interactions with members of their units before deployment and may live and train in areas geographically remote from their assigned duty locations while discontinuing unit integrity again upon

demobilization and return to post-deployment civilian life. This factor points to a possible

systemic vulnerability in their social support networks.

Female veterans and service members often move unrecognized as military or service

members within U.S. culture, with many civilians remaining unaware of the extent to which

female service members currently engage in activities in hostile conflict conditions.

Nevertheless, an unprecedented and growing number of female service members have been

deployed to combat areas within Iraq and Afghanistan to fulfill combat support roles.

Technically barred from serving in combat until recently, women now comprise a significant

percentage of forces deployed in war zones. Women also constitute a unique population within

the broader veteran and military communities and thus can pose a challenge to integration with

general military and veteran outreach efforts. One challenge centers on the fact that some female

veterans do not consider themselves "real" veterans and often maintain low visibility within the

veteran community. As a result, female veterans and military affiliated individuals are less likely

to take advantage of VA healthcare.

Female veterans tend to suffer significantly higher rates of in-service sexual assault with

African-American female service members, in particular, experiencing sexual coercion at high

rates. Therefore, it is likely that a significant proportion of this percentage of female combatants

suffer PTSD symptoms related to the experience of MST which is strongly associated with

development of this disorder. However, regardless of whether they are male or female, MST is

profoundly damaging for service members causing them to feel betrayed by the perpetrator, the

military, and often by the government support organizations responsible to assist them. Some

women with MST histories associate their lack of treatment-seeking to a military culture that

silences the reporting of sexual assault. In the end, many MST sufferers have not officially

reported an assault and often feel that they will face social and professional retaliation for disclosing.

Veterans and service connected personnel who identify as LGBTQ+ comprise another group that may feel alienated from standard channels of available treatment. Numerous chronologically proximate policies formally declared homosexuality to be "incompatible with military service" and have led several individuals to be discharged from military service by the DoD over many decades (e.g., DADT and the current DoD transgender policy). Service members who identify as LGBTQ+ who served during these decades may still feel the lingering hostility to sexual minorities in veteran and military communities. Moreover, LGBTQ+ veterans and service members may feel that their relationships, political affiliations, and even identities are incongruous with the traditionally conservative military community and exhibit tenuous relationships with some organizations that serve the broader veteran community. Although LGBTQ+ veterans are entitled to care at VA facilities, these veterans experience barriers to care related to their identified gender or sexual identity. Thus, LGBT+ veterans and service members may feel disaffected from the general military aligned communities and may be disinclined to seek treatment through the VA.

Disabled veterans often experience physical and mental challenges that can limit their access to services and resources. These issues may create elusive barriers that separate or marginalize veterans with disabilities from the rest of the veteran and military communities. It is important to consider that there may be a variety of service-connected disabilities that are invisible yet impact veterans' ability to access critical services in tangible ways.

Incarcerated veterans are more likely to have been involved in combat than non-incarcerated veterans. Consequently, the intersection of incarceration and mental illness

particularly impacts veterans. Roughly half of all nationally imprisoned veterans identified

having a mental health disorder or recently experienced symptoms. And, imprisoned veterans

who experienced combat were more likely to be diagnosed with a mental disorder. However, it

is difficult to determine the exact number of veterans released from incarceration nationally on

an annual basis. Additionally, past incarceration is a significant risk factor for homelessness.

Moreover, destitute adults with a history of imprisonment face particularly arduous obstacles

when attempting to escape homelessness because their previous incarceration stigmatizes them.

Homeless veterans tend to suffer from healthcare trends which are inversely proportional to their

histories of homelessness. Long-term homeless veterans are distrustful of conventional social

services. That said, homeless veterans appear more likely to engage with caregivers through

street outreach programs.

Some veterans from traditionally underrepresented or marginalized groups serve in the

military as a mechanism to gain full rights, societal privileges, and social mobility, if not

American citizenship itself. Furthermore, veterans and service members who are not U.S.

citizens may feel marginalized by mainstream veteran and military communities. It is important

to understand that some minority groups, though contained in the ranks of those who participated

in military service, continue to face discriminatory treatment or perceive a disparity in reception

and may therefore feel apprehensive about receiving government healthcare. In addition,

Muslims and other religious minorities report being harassed or criticized in the military due to

their religious beliefs and practices. Consequently, these impediments to religious expression,

vulnerability to coercion, and susceptibility to bias may remain ongoing issues in their veteran

status when seeking governmental mental healthcare. Veterans from traditionally

underrepresented groups who need support but are reluctant to cooperate with the VA may prove

more receptive to a program specific to their communal needs.

A significant proportion of student veterans screened positive for PTSD compared to non-veteran students. Student veterans are often married with children. Because student-veterans tend to be busy with these obligations and commitments, they often cannot attend educational events or activities. Student-veterans are also more likely than non-veteran students to spend ten hours or more per week working at off-campus jobs. Student veterans are older than their civilian counterparts due to having spent their typical college years in the military. Though the general population of veterans are overwhelmingly male, women are over-represented among student veterans enrolled in colleges and universities. Student-veterans are more racially diverse and likely to be first-generation students than their civilian counterparts. It is also probable that an appreciation of the combination of some of the group characteristics presented above as well as various group communication preferences are key to a successful recruitment strategy in relation to this multifaceted cohort.

The information technology space is ubiquitous in our contemporary era, and as such, any treatment recruitment strategy employed by the VRP would need to speak to this communication sphere. Thus, it is crucial to recognize that social media and social networking have changed the ways that online users of all ages obtain behavioral healthcare comprehension. An overwhelming majority (89 percent) of online 18- to 29-year-olds use social media, with Facebook alone visited by 70 percent of young adults on a typical day. Age is also a factor in that extraversion, as a personality trait, is particularly vital for younger users, while openness to new experiences is central for older users. Diversity beyond age also appears to be a determinate factor among users of social media and social networking. Some studies show that social media and social networking users are disproportionately from lower-income households. Moreover,

female veterans may be more attracted to the use of social network sites than males. In a

connected point, gender is a consideration in social media usage around healthcare, in that

extraverted women and men are equally likely to engage, but men are more likely to use social

media when addressing emotional instability. Various studies indicate that individuals with

severe mental illness use the Internet less than the general population. Perhaps this relates to the

fact that, neurocognitive deficits, including impairments in higher-level executive functioning,

working memory, and sustained attention may hamper compromised individuals' ability to use

technologies such as computers and mobile phones, as well as to access the Internet and the

ability to navigate websites successfully.

Within the post-treatment Respondent interviews in Chapter IV, the effectiveness of

Internet media platforms such as Facebook were lauded; however, it was also mentioned that the

freely available nature of internet based social media fails to protect the activity profiles of

individuals who are actively serving because their social media activity shows up in the

newsfeeds of their fellow service members who are part of the same network. Addressing this

situation in particular is important as the VRP's future is dependent upon its ability to formulate

a plan that provides a foundation for innovation. The use of current technology will allow for an

enriched and broader connection with potential clients and affiliate organizations. One option,

Ning, allows for user feedback, privacy, and a tighter community (See Appendix A, Figure 5,

Item a). Additionally, separate social media web pages could be created and funneled back to a

single website, as suggested by Respondents. Furthermore, privacy and moderation controls

available with SaaS platforms like Ning can allow for the elevated protection of identities as well

as input from multiple board members, which would help to alleviate the privacy concerns

expressed by some interview Respondents. In short, the generation of client's targeted by the

VRP are proficient in communication through cyberspace. Therefore, communication with this cohort should heavily lean toward the virtual. The Respondents also expressed that websites, when used, should be heavily regulated, restrained or minimized in presentation, as well as be easy to navigate, gather minimal information and feature strong privacy controls for the protection of the user.

It is important to recognize that a degree of intersectionality likely exists within the larger veteran and service member population as a whole or any of the special populations mentioned above. Expression of PTSD among veterans and military-affiliated personnel is often aggravated by an invalidating societal, social, or cultural atmosphere following trauma exposure. In spite of this, they can be encouraged to seek treatment through approaches like establishing social networks. There may be many veteran subgroups who feel marginalized and thus reject services customarily perceived as helpful to veterans. It would be of value to consider special populations and whether those populations feel included in general outreach efforts or would respond more to a tailored form of outreach. Pervasive assumptions that veterans and service members are a monolithic type may create an unwelcoming environment for clients who fall outside the classic military affiliated representation. In conclusion, recruitment facilitation targeting the improvement of public awareness regarding the causes and treatment of PTSD could reduce the delay in treatment seeking and improve treatment outcomes in Minnesota veterans and service-connected persons.

Recommendations to improve effectiveness of therapist retention. As was true with attracting more veterans and service members for treatment, ascertaining the psychosocial circumstances behind the retention of practicing therapists is imperative as it is the initial access point to formulate a retention strategy for the VRP. This is important, as supply is a decisive

factor in both recruitment and retention of any behavioral healthcare providing labor pool. Emotional strain, tension, and exhaustion are unavoidably intertwined with the behavioral healthcare profession. Behavioral health professionals, when compared to healthcare professionals employed in other fields, are particularly affected by stressful employment situations. Relatedly, low tolerance of distress, inflexibility with respect to the application of therapeutic models, and need for control in therapy are destructive to careers in psychotherapeutic populations. In other words, engaging with trauma is an exceedingly demanding form of stress within behavioral health services professions which often leads to career burnout and is linked to lower self-perceived effectiveness. This situation is a growing trend within the U.S.

Psychotherapists of all stripes are adversely affected by workload and lack of autonomy in their roles. Workload may be an issue for the VRP as Respondent therapists called for outside help with organizing paperwork thoroughly and efficiently. Along this same theme, Respondents a described fatigue and anxiety as a problem, particularly anxiety concerning their workload, with deadlines and schedules posing problematic issues. They cited concerns over monetary resources, specifically the lack of a sufficient budget, along with the lack of support staff and not being able to count on people needed for support and advice. Respondents agreed that the ability to hire additional staff with good work experience would be beneficial—with only a single Respondent disagreeing.

An array of behavioral health professional specializations occupy today's community behavioral health positions. These clinicians are drawn most commonly from the contiguous disciplines of psychology; which includes counselors, marriage and family therapists, traditional psychotherapists, and psychologists, social work, occupational therapy (which includes physical

therapists), and nurses. Though diversity in specialty is not a significant issue within the psychotherapeutic workforce, there is a primary issue of deficiency in quantity of practicing providers. Stress is identified as unusually high among clinical psychologists, especially for those with less experience, and may lead to career departure. Clinical psychologists who have high levels of perfectionism are more likely to engage with clients while succumbing to stress and subsequently experience burnout. Psychologists employed by a variety of public institutions reveal that burnout and job dissatisfaction occurred more frequently among psychologists from correctional facilities and community behavioral health hospitals.

Social workers are also exceptionally sensitive to stress and burnout, as they tend to report higher levels of work-related tension than many other similar occupational groups. This contributes to the growing retention problems within their profession. One of the most prominent reasons for social workers leaving the field is the stressful nature of the work. This stress is often derived from a shifting role in multidisciplinary teams, which puts social workers in competition with other professionals. The type of stressor alluded to here may be exemplified in a Respondent's complaint that individuals on the advisory council have become disenchanted over what the contributor considered the bullying of a peer. Earlier cited research within this dissertation argues that the longevity of a newly-qualified social worker is roughly eight years.

The theories and practices of occupational therapy can also make use of counseling and psychotherapy in the context of assisting clients to engage in improved vocational performance and behavior, activities of daily living, and purposeful normative activities. Even a slight shortage of staff in the occupational therapy arena presents a challenge to managers in that it creates a stressful work environment for any remaining therapists and may lead to a higher exit rate. Nursing shares the occupational therapy characteristic of high turnover rates and few

opportunities for promotion. Nurses leave their profession for a wide variety of reasons, such as seeking a new job, providing personal-childcare, or taking early retirement. Nurses are also markedly vulnerable to compassion fatigue, such emotional fatigue is derived from their frequent witnessing of tragedy during their work, which amounts to vicarious, indirect, exposure to trauma on a regular basis.

Stressors affecting behavioral health professionals overall emanate from a wide range of sources. These include confrontations with violent, aggressive, or suicidal patients, challenging interactions with other professionals, heavy workloads and administrative responsibilities, lack of resources, inappropriate referrals, an absence of positive feedback, low pay, sub-standard work environment, and lack of supervision. Moreover, behavioral health professionals suffer more stigma and enjoy lower professional prestige when compared to other healthcare professionals. Previous research indicates that compensation alone should not be the focus of an organizational retention plan as it does not translate into better patient outcomes in the mental health field. However, therapist interviewed within this work ask for consideration of higher levels of compensation, therein exposing that it may be a factor for consideration by the VRP.

Concerns over monetary resources ensued, specifically the lack of a sufficient budget and structure, along with the lack of support staff and not being able to count on people needed for support and advice (i.e., communication as a possible area for modification). Financial difficulties in the VRP were cited as significant with an organization trying to cope with an enormous under- and uninsured population, circumstances which produce difficulties in accepting clients as well as meeting their needs, particularly in those of individuals with low socioeconomic status in the community. Therapists also cite the need to build stronger relationships with colleagues. Some Respondents cited a lack of additional time within their

personal lives as a reason for cutting back.

There is a strong argument to be made for bundles of therapist retention interventions which include attention to living environments, working conditions and environments, and development opportunities. More to the point, organizational advancement is a valued feature for workers in any successful organization. That said, focusing attention on single incentives, such as remuneration, often ignores the need to maintain adequate staffing, provide appropriate infrastructure, and supply career incentives. A need to reward management and clinical expertise equally, noting that care should also be taken to guarantee that only those deserving recognition receive promotion. Thus, a promotion on the clinical ladder should be challenging enough for those who advance to perceive a change in status once the upgrade occurs. Hierarchy should be structured to retain those clinicians who make a significant contribution to the organization rather than promoting all clinicians indiscriminately. Some attrition is healthy for an organization as it provides the opportunity for the injection of new ideas.

Recommendations to improve efficacy of EMDR treatment. A defining practice of professional psychology since the field's inception is the need to qualify treatments and subsequently position them in a hierarchy. Within this structure, competence in delivering psychological treatments is defined as the degree to which a psychotherapist demonstrates the general therapeutic and treatment-specific knowledge and skills required to appropriately deliver an intervention, given the treatment's formulated process. On balance, a professional's obligation consists of understanding the limits of their clinical knowledge, and in turn, making use of these proficiencies, and passing on their expertise to others. As a result, an objective standard for treatment by which assessors may identify practitioner competence within the field of psychology has brought forth both interest and criticism and illuminates the intersections in

interpretations of existing research literature as well as the merits of some research processes.

The use of outcome measures to collect outcome data in the research of psychotherapy has become increasingly popular. As noted previously, patient-reported outcome measures (PROMs), in particular, have gained a significant footing in the field of psychotherapy research and have demonstrated their potential to enhance treatment outcomes, especially for patients with an increased risk of treatment failure. Implementation of PROMs center on observing the individual client's response throughout therapy. This approach determines how each particular client responds to therapy. Further, PROMs concentrate on the clinical significance of the individual clients' responses to interventions rather than just the statistical significance of differences among group averages, as is common in efficacy and effectiveness studies. Most importantly, the feedback from PROMs appears to be more effective when integrated in a formalized and structured manner.

One outcome tracking mechanism which may aid in providing this critical structure is CelestHealth System – Mental Health (CHS-MH), which is a secure web-based interface used to track clinical outcomes across various clinical orientations and practices (Bryan, Kopta, & Lowes, 2012; Kopta, Owen, & Budge, 2015). The CHS-MH tracks outcomes using an algorithm of number of sessions attended and percentage improved at either an individual (client) or organization (institution) level (Bryan et al.,2012; Kopta et al., 2015). This system uses four instruments: a) the Behavioral Health Measure – 20 (BHM-20) which assesses well-being, mental health symptoms, and functioning, b) the Behavioral Health Measure – 43 (BHM-43) which assesses more comprehensively the same three subscales as the BHM-20 (well-being, symptoms, functioning), and an added personal effectiveness scale, c) the Psychotherapy Readiness Scale, which predicts response to therapy at the outset of therapy services, and d) the

Therapeutic Bond Scale, which assesses the quality of the therapeutic relationship during the therapeutic process (Bryan et al., 2012; CelestHealth Solutions, 2018). The measures within the CHS-MH are optional, providing clinicians the ability to select which instruments to use and the frequency with which they wish to measure each construct. The CHS-MH is currently used by mental health professionals deployed to Iraq and in several U.S. Military primary care medical clinics (Bryan et al., 2012). This measurement system is recommended in the context of the VRP because of the ability to track individual client outcomes, but also organization-wide outcomes. In addition, this measure is specifically utilized among military-personnel, and is easily adapted to fit the needs of VRP clients and therapists. An additional benefit of using this system is that it is quickly completed, with an average completion time of three minutes per patient (Bryan et al., 2012). The CHS-MH would allow the VRP to effectively track the efficacy of the EMDR intervention for individual clients, as well as more broadly as an organization. Ultimately, this system would allow the VRP to identify areas of strength and weakness within the current intervention protocol and make changes based on outcome data.

In practice at the VRP, employing outcome tracking measures such as the CSH-MH can be used in tandem with traditional pre- and post-intervention measures which are used on an individual basis with patients. This allows for ongoing monitoring of outcomes at both an individual level and an organization level; broadly, this tracks individual symptom response throughout treatment, and also tracks treatment outcomes for the cohort or organization. This would also allow for further analysis of the population served at the VRP, how individuals respond to treatment relative to others served at the VRP (or similar organizations), and would allow the VRP to broadly compare their veteran cohort to other initiatives to further evaluate efficacy. For example, the VRP may choose to use CSH-MH data to compare their own

outcomes to those of similar organizations in Minnesota or other states who serve veterans and service-connected persons.

Ultimately, therapeutic efficacy is only established when sound outcome measures are employed. Individual clinicians, interventions, specific disorders, and organizational programs are assessed for the degree to which they benefit from the use of these instruments. Further, this study articulated that metrics linking provider performance and specific behaviors during therapy with client outcome serve the process of psychotherapy, leading toward objectives that define cost-effective treatment. Additionally, clinicians who repeatedly produce better outcomes could be studied so that other practitioners might learn from their procedures.

Today's users of outcome measures are generally interested in information which advances clinical judgment, including client progress since entering treatment, treatment strengths and weaknesses, and determining need to alter treatment. Contemporary outcome measures focus on measuring outcomes in many areas of functioning and from a variety of viewpoints. These measures have also improved in that they focus on specific symptoms without being theory-bound. Some measures can be used to examine patterns of change over time because they are brief and can be repeated many times through the course of therapy. When outcome measures are chosen to assess treatment efficacy, they should reflect the purpose of the trial and the stage of development of the treatment.

Comparable recent research. During the course of this program evaluation, which began in 2014, the National Academies of Sciences, Engineering, and Medicine conducted a comprehensive assessment to evaluate the quality, capacity, and access to mental health services for veterans who served in OEF, OIF, and OND. Results of this large-scale investigation, which was published in 2018, following the completion of this program evaluation for the VRP, are

detailed here, as they are congruent with the findings of the present program evaluation and warrant discussion relative to the results of this evaluation.

The National Academies of Sciences, Engineering, and Medicine are made up of three private, non-governmental institutions which provide independent, objective analysis, and advice to the nation by bringing together their separate fields of expertise to solve complex problems and inform public policy decisions (National Academies of Sciences, Engineering, and Medicine [NASEM], 2018). According to the National Academies of Sciences, Engineering, and Medicine (2018), Congress passed Section 726 of the National Defense Authorization Act in fiscal year 2013 which obligated the Department of Veterans Affairs (VA) to enter into an agreement with them via committee to implement a study to assess veterans' access to mental health services at the VA. The subsequent committee was also anticipated to evaluate the quality of mental health services within the VA and to therefore provide recommendations to improve problems with access and quality of services. The committee, thus, analyzed relevant scientific literature and other documents, to include interviews with VA mental health professionals, survey data provided by the VA, and results from surveys of veterans which were conducted independently by the committee. They also performed site visits at VA medical centers in each of 21 Veterans Integrated Service Networks (VISNs) across the country. Finally, the committee held open meetings with experts to discuss the Secretary's plan for the development and implementation of ensuing performance metrics and staffing guidance. The committee then provided a concluding report which contains recommendations to the Secretary of the VA regarding overcoming barriers and improving access to mental health care in the VA, as well as increasing efficiency.

Conclusions of the evaluation indicated that there is a considerable unmet need for

mental health services for the OEF/OIF/OND population, as approximately half of these veterans surveyed by the committee need mental health services, yet do not use VA or non-VA mental health services (NASEM, 2018). As per the NASEM, several factors exist that may be barriers to willingness to seek care. Firstly, there is a pervasive lack of awareness of how to establish mental health care through the VA. Many veterans are unsure of whether they are eligible for treatment, or unawares that the VA offers mental health services. And, secondly, many veterans surveyed indicated that the process of accessing mental health services through the VA is complicated. Another barrier in care-seeking among veterans is lack of support; veterans with support systems are more likely to use VA health services than those without (NASEM, 2018). Transportation to VA medical facilities may also impose challenges for veterans who are geographically remote or have chronic health conditions which preclude traveling long distances (NASEM, 2018). In addition, employment concerns such as harm to career, denial of security clearances, mandatory work stoppage, and impaired reputation all represent barriers to care-seeking among veterans, as per NASEM (2018). Veterans also reported fearing interruption of their ability to own guns, contact or retain custody of their children, and access to medical and disability benefits (NASEM, 2018). Recommendations to mitigate these barriers to accessing care include better coordination of resources by VA leadership (NASEM, 2018). They also recommend simplifying the process of scheduling appointments and improving customer service (NASEM, 2018). In addition, results showed that approximately half of veterans surveyed were receptive to Internet and phone-based mental health care (NASEM, 2018) which may be an avenue to reduce burdens associated with travel to VA medical centers.

As per the surveyed veterans, NASEM (2018) reports that veterans appreciate the evidence-based mental health services offered by the VA. However, they also note that there are

challenges and limitations associated with the delivery of high-quality care across facilities and subpopulations (NASEM, 2018). Inadequate staffing, physical infrastructure, and provision of timely care are responsible for the variability in delivery of services at VA medical centers, which, in turn, contribute to systemic vulnerabilities such as burnout, job-related stress, and a high rate of turnover among providers (NASEM, 2018).

The findings from the NASEM investigation provide additional support and scaffolding for the results of the VRP program evaluation. Their results identified issues of stigma, barriers to care-seeking, and recommendations for improving accessibility for veterans seeking mental health services. They also noted a major area of concern with staffing, burnout, and provider turnover, which was a primary finding of the VRP evaluation. It is noteworthy that veterans surveyed by NASEM (2018) reported valuing evidence-based mental health services. This represents an area of investigation regarding efficacy of treatment, and essentially acts as the mirror of stigma. If veterans know that certain types of treatment are offered at VA medical centers, this may serve to increase their care-seeking behavior. Conversely, they may avoid seeking care if services are not evidence-based. This was beyond the scope of the present evaluation, but is discussed further below relative to future research.

Strengths and Limitations

Duality of data sources. A strength within this study is the sources from which data were derived. Specifically, qualitative and quantitative data were collected, and data were collected from both veterans and clinicians involved with the VRP.

Qualitative data on EMDR from veteran participants. The feedback provided by veterans about their experience with EMDR is valuable and is a strength of the present investigation.

Mixed-methods research design. Another primary strength of this investigation is that it employed both qualitative and quantitative measures. The qualitative data gathered from both veterans and clinicians provides rich and unique perspective relative to the questions posed by the VRP for investigation. These qualitative data also provide direct suggestions for improvement, which is a key component of data collection for a program evaluation. The qualitative data, specifically, can be used to directly affect change within the VRP by implementing strategies to improve procedure as per feedback from both veterans and clinicians.

Generalizability. Ability to apply the findings from this investigation is an additional strength of this research. The Minnesota veteran populations and incidence of PTSD are representative of these factors nationally, which means that the program evaluation conducted for the VRP can serve as a model for similar outreach and intervention organizations for veterans. Further, it is likely that the results of this evaluation are generalizable on a national scale, specifically regarding strategies for effective recruitment of veterans and retention of therapists. Relatedly, however, it is important to note that we do not aim to generalize these findings more broadly due to the small sample size. Program evaluation initiatives, such as this one, are not undertaken in order to provide data for broad generalizability or dissemination. Rather, we use this data conservatively to make recommendations to the VRP, per their request, and we encourage the use of this data comparatively with other similar organizations. Given that Minnesota, and the population served at the VRP is a representative sample of the veteran population broadly in the U.S., data from this investigation could be compared to similar organizations in other parts of the country to evaluate the recruitment, retention, or treatment efficacy.

Najavits (2015) noted the important issue of dropout among PTSD therapies such as PE

and CPT. While Najavits did not specifically report on the dropout rates associated with short-term EMDR therapy, the article compared EMDR to CPT and PE as "gold standard" treatments for PTSD (2015). It is noteworthy, however, that most patients with PTSD do not complete CPT or PE for the entire course of treatment (Najavits, 2015). In the context of the present evaluation, the VRP had a relatively low rate of dropout. For PE and CPT, Najavits suggests that there are clinician factors such as insufficient training, resistance to specific EBTs for veterans due to concern for complications or increased symptoms, and general tolerability, which influence dropout rates in PTSD therapy studies (2015). It may be that the training and buy-in on the part of the therapists at the VRP is influential in retaining clients for the whole course of EMDR treatment.

Per Steenkamp et al. (2015), extant research on EMDR is focused on civilians. As such, it is difficult to compare the findings from the VRP data to literature on EMDR. Further, the sample size of the present investigation is insufficient for adequate comparison to larger RCTs. Relatedly, EMDR demonstrates comparable efficacy to other PTSD therapies, but Steenkamp et al. (2015) emphasize the need for studies in military populations in order to gain a greater understanding of the efficacy of EMDR in those with military-related trauma. Given the paucity of literature that would be in the appropriate vein for comparison for the VRP data, rather than comparing the data to existing RCTs, we instead address generalizability and comparison to real-world studies in the below section on directions for future research.

Sample composition. A strength of this investigation is the diversity in composition of the veteran sample. While women generally comprise ten percent of the broader veteran population, our sample is approximately 25 percent women. Further, the sample included veterans from a variety of military service branches; this aspect of diversity is important in

demonstrating the heterogenous population that comprises the broader veteran culture and

population. Along this same vein, a limitation of the investigation is that our veteran sample was

comprised of largely White-identifying individuals, at approximately 75 percent. This may not

be entirely representative of the veteran population nationally.

      Sample size. A potential limitation of the study is the small sample of veterans and

clinicians from whom data was collected. This limitation is mentioned regarding the quantitative

statistical analyses, given that qualitative research generally includes lower sample sizes.

      Medical and mental health comorbidities. In evaluating the efficacy of the EMDR

intervention, it is important to acknowledge that many veterans engaged in VRP services have

PTSD in addition to other physical and psychological conditions. This is not necessarily a

limitation of the study; PTSD, as many psychological conditions, is often comorbid with other

conditions (APA, 2013).

Future Research

      Additional efficacy evaluation. The scope of this evaluation included qualitative

interview questions about the efficacy of recruitment from the perspective of veterans and

therapists, but with very little input from the therapists. Future research would benefit from

inquiring further with clinicians, in addition to veterans, about perceived recruitment efficacy.

Seeking feedback from veterans' family members, caregivers, or other informants could also be

useful in identifying areas of strength and weakness in the current recruitment efforts for the

VRP and programs like it.

      Comparative efficacy data. An important outlet for future research is comparing the

efficacy of EMDR with other types of therapy used in treatment of PTSD among veterans and

service-connected persons in organizations such as the VRP. In particular, it may be useful to

compare the EMDR efficacy data from the VRP with efficacy data from similar organizations, or to efficacy outcome data for other types of therapy such as Cognitive Processing Therapy (CPT) or Prolonged Exposure (PE). While larger-scale research (i.e., randomized-controlled trials [RCT], etc.) efforts may focus on efficacy, it is important to also evaluate efficacy outcomes on a smaller scale, using both qualitative and quantitative data with both the patients and practitioners, such as the work done for this program evaluation. This serves as a rich source of data for addressing the efficacy of EMDR and other interventions with direct input from veteran patients, beyond the scope of what is addressed in an RCT format.

Development of feedback measures for EMDR. The qualitative data provided by the veteran participants in the VRP could inform development of additional qualitative or self-report measures for veterans to reflect on their experiences of EMDR treatments. PROMs are one avenue for this as its application focuses on observing the client's response throughout the progress of treatment and beyond.

Stigma and barriers to mental health service seeking. Future research should investigate the impact of stigma in recruitment of veterans to mental health service programs such as the VRP. The scope of this investigation did not include specific barriers to mental health service access, which may be particularly salient in the veteran population given the expectations and attitudes surrounding mental health concerns within military culture. Relatedly, accessibility to services does not ensure that military-connected personnel will seek out services. Future research should focus on means of tailoring service advertisement, recruitment, and outreach in order to better address the specific needs of service-connected personnel and veterans. One way that organizations such as the VRP can engage in this type of data collection is to ask their patients or clients how they heard about the VRP, and why they chose to initiate

services. Some service-connected persons may initiate treatment on their own, while others may

need to be accessed via outreach services, and future investigations should include mechanisms

of letting veterans and service-connected persons know about what services are available via

organizations such as the VRP.

As mentioned previously, results from the NASEM (2018) investigation provide structure

for future research in the area of increasing access and reducing stigma. Research on which

types of treatment may be more appealing to veterans (i.e., evidence-based versus non-evidence

based, etc.) may be an important place to start investigating. Relative to the VRP investigation,

this has implications for questions about treatment efficacy and patient recruitment.

Post-treatment administration of the PTGI. Only one measurement of the PTGI was

available for veteran participants in this investigation. Future research should employ repeated

administration of the PTGI pre- and post-intervention in order to determine positive growth

relative to PTSD symptoms. This will serve to further elucidate the impact of EMDR and other

interventions on PTSD symptoms among veterans.

Branch-specific investigation. This investigation provides grounding for further

evaluation of the veteran population relative to EMDR treatment and participation in veteran

outreach and intervention programs such as the VRP. One specific area of research that may be

particularly useful is the examination of veterans from different branches of military service.

Given the unique experiences and microcultures that are present within the various branches of

the military, it may be valuable to evaluate the efficacy of EMDR (or other types of

interventions) among members of different types of service.

Projected changes in the structure of healthcare. As the healthcare system continues

to adapt and change in response to political, cultural, financial, and care demands, further

research should focus on the role of organizations such as the VRP in care provisions for service-connected persons. In efforts to broadly increase accessibility, efficiency, effectiveness, and satisfaction related to healthcare services, there are demands to consider relative to the veteran and service-connected population. For example, future studies should focus on the role of organizations such as the VRP if the military healthcare system is privatized. And, additionally, future research should focus on identifying the needs of the service-connected population relative to the changing healthcare system and trajectory of the veteran population (i.e., aging, incidence and prevalence of PTSD, etc.).

Conclusion

This dissertation served as a program evaluation for the Veteran Resilience Project (VRP) of Minnesota. The primary aims of the investigation were to evaluate the efficiency of veteran recruitment, efficiency of therapist retention, and efficacy of the EMDR interventions employed by the VRP. A thorough review of the literature relevant to the climate of the VRP served as the introduction for the dissertation, with a focus on veteran populations, PTSD, EMDR interventions, and broad program evaluation methodologies. Both qualitative and quantitative data were collected from veterans and therapists associated with the VRP to inform the outcomes of the program evaluation. The results section provided comprehensive data that is relevant for application at the VRP, as well as more broadly in clinical and research settings. Additionally, these data served to formulate recommendations for the VRP as per the program evaluation framework, as well as the broader implications of these findings as the discussion for the present dissertation.

References

Acierno, R., Knapp, R., Tuerk, P., Gilmore, A. K., Lejuez, C., Ruggiero, K., ... Foa, E. B. (2017). A non-inferiority trial of prolonged exposure for posttraumatic stress disorder: In person versus home-based telehealth. *Behavior Research and Therapy*, *89*, 57-65. http://dx.doi.org/10.1016/j.brat.2016.11.009

Acosta, J. D., Becker, A., Cerully, J. L., Fisher, M. P., Martin, L. T., Vardavas, R., ... Schell, T. L. (2014). *Mental health stigma in the military*. [RAND Corporation]. Retrieved from https://www.rand.org/pubs/research_reports/RR426.html

Acosta, J. D., Becker, A., Cerully, J., Fisher, M. P., Martin, L. T., Vardavas, R., ... Schell, T. (2016). *Assessing the Department of Defense's approach to reducing mental health stigma* [Research Brief]. Retrieved from RAND Corporation: https://www.rand.org/pubs/research_briefs/RB9881.html

Advisory Committee on Interdisciplinary, Community-Based Linkages. (2008). *An examination of the healthcare workforce issues in rural America*. Retrieved from https://www.hrsa.gov/sites/default/files/hrsa/advisory-committees/community-based-linkages/reports/eighth-2008.pdf

Aktepy, S. L. (2010). *A rhetoric of betrayal: Military sexual trauma and the reported experiences of Operation Enduring Freedom and Operation Iraqi Freedom women veterans* (Doctoral dissertation). Retrieved from https://scholarworks.iupui.edu/bitstream/handle/1805/2118/AKTEPY%20FINAL%20THESIS.pdf;sequence=1

Albright, D. L., & Thyer, B. (2010). Does EMDR reduce post-traumatic stress disorder symptomatology in combat veterans? *Behavioral Interventions*, *25*(1), 1-19. http://dx.doi.org/10.1002/bin.295

Albright, D. L., & Thyer, B. (2010). EMDR is not an empirically supported treatment for combat-related PTSD...yet: A response to Elisha C. Hurley, D.Min., Colonel, USA (Retired). *Behavioral Interventions*, *25*(4), 355-360. http://dx.doi.org/10.1002/bin.304

Altschul, D. B., Bonham, C. A., Faulkner, M. J., Pearson, A. W., Reno, J., Lindstrom, W., & Larson, R. (2018). State legislative approach to enumerating behavioral health workforce shortages: Lessons learned in New Mexico. *American Journal of Preventative Medicine*, *54*(6), S220-S229. http://dx.doi.org/10.1016/j.amepre.2018.02.005

Amano, T., & Toichi, M. (2016). The role of alternating bilateral stimulation in establishing positive cognition in EMDR therapy: A multi-channel near-infrared spectroscopy study. *PLoS ONE*, *11*(10), e0162735. http://dx.doi.org/10.1371/journal.pone.0162735

American Psychiatric Association. (1980). *Diagnostic and statistical manual of mental disorders* (3rd). Arlington, VA: American Psychiatric Publishing.

American Psychiatric Association. (2010). Practice guideline for the treatment of patients with acute stress disorder and posttraumatic stress disorder. Retrieved from https://psychiatryonline.org/pb/assets/raw/sitewide/practice_guidelines/guidelines/acutest ressdisorderptsd.pdf

American Psychiatric Association. (2013). *Diagnostic and statistical manual of mental disorders* (5th). Arlington, VA: American Psychiatric Publishing.

American Psychiatric Association. (2017). Prolonged exposure (PE). Retrieved from http://www.apa.org/ptsd-guideline/treatments/prolonged-exposure.aspx

American Psychological Association. (n.d.). The critical need for mental health professionals trained to treat post-traumatic stress disorder and traumatic brain injury. Retrieved from http://www.apa.org/about/gr/issues/military/critical-need.aspx

Andrilla, C. H., Patterson, D. G., Garberson, L. A., Coulthard, C., & Larson, E. H. (2018). Geographic variation in the supply of selected behavioral health providers. *American Journal of Preventative Medicine*, *54*(6), S199-S207. http://dx.doi.org/10.1016/j.amepre.2018.01.004

Ani, C., Bazargan, M., Hindman, D., Bell, D., Farooq, M. A., Akhanjee, L., ... Rodriguez, M. (2008). Depression symptomatology and diagnosis: Discordance between patients and physicians in primary care settings. *BMC Family Practice*, *9*(1). http://dx.doi.org/10.1186/1471-2296-9-1

Antal, C. J. (2017). *Patient to prophet: Building adaptive capacity in veterans who suffer military moral injury* (Doctoral dissertation). Retrieved from https://pqdtopen.proquest.com/doc/1949718538.html?FMT=ABS

APA Presidential Task Force on Evidence-Based Practice. (2006). Evidence-based practice in psychology. *The American Psychologist*, *61*(4), 271. http://dx.doi.org/10.1037/0003-066X.61.4.271

Aschbrenner, K. A., Bobak, C., Schneider, E. J., Naslund, J. A., Brunette, M. F., & O'Malley, A. J. (2018). Egocentric social networks and smoking among adults with serious mental illness. *Translational Behavioral Medicine*, *8*(4), 531-539. http://dx.doi.org/10.1093/tbm/ibx014

Atkinson, J. (2009). *An evaluation of the Gardening Leave Project for ex-military personnel with PTSD and other combat related mental health problems*. Retrieved from Gardening Leave: https://www.researchgate.net/profile/Jacqueline_Atkinson/publication/265575473_AN_E VALUATION_OF_THE_GARDENING_LEAVE_PROJECT_FOR_EX-MILITARY_PERSONNEL_WITH_PTSD_AND_OTHER_COMBAT_RELATED_ME NTAL_HEALTH_PROBLEMS/links/55094b960cf26ff55f852b50.pdf

Atkinson, M. P., Guetz, A., & Wein, L. M. (2009). A dynamic model for posttraumatic stress disorder among US troops in Operation Iraqi Freedom. *Management Science*, *55*(9), 1454-1468. http://dx.doi.org/10.1287/mnsc.1090.1042

Bagalman, E. (2014). *The number of veterans that use VA health care services: A fact sheet* (7-5700). Washington, DC: Government Printing Office.

Baiocchi, D. (2013). *Measuring army deployments to Iraq and Afghanistan*. Retrieved from RAND Corporation: https://www.rand.org/pubs/research_reports/RR145.html

Bartlett, Y. K., & Coulson, N. S. (2011). An investigation into the empowerment effects of using online support groups and how this affects health professional/patient communication. *Patient Education and Counseling*, *83*(1), 113-119. http://dx.doi.org/10.1016/j.pec.2010.05.029

Beck, J. G., Grant, D. M., Read, J. P., Clapp, J. D., Coffey, S. F., Miller, L. M., & Palyo, S. A. (2008). The Impact of Events Scale-Revised: Psychometric properties in a sample of motor vehicle accident survivors. *Journal of Anxiety Disorders*, *22*(2), 187-198. http://dx.doi.org/10.1016/j.janxdis.2007.02.007

Bloom, D. E., Boersch-Supan, A., McGee, P., & Seike, A. (2011). Population aging: Facts, challenges, and responses. *Benefits and Compensation International*, *41*(1), 22. Retrieved from https://www.aarp.org/content/dam/aarp/livable-communities/old-learn/demographics/population-aging-facts-challenges-and-responses-2011-aarp.pdf

Boston University Vet Change. (2017). https://vetchange.org/home/about

Boyle, D. A. (2011). Countering compassion fatigue: A requisite nursing agenda. *The Online Journal of Issues in Nursing*, *16*(1). http://dx.doi.org/10.3912/OJIN.Vol16No01Man02

Brandt, W. A., Bielitz, C. J., & Georgi, A. (2016). The impact of staff turnover and staff density on treatment quality in a psychiatric clinic. *Frontiers in Psychology*, *7*, 457. http://dx.doi.org/10.3389/fpsyg.2016.00457

Brink, S. (2014). Mental health now covered under ACA, but not for everyone. Retrieved from http://www.usnews.com/news/articles/2014/04/29/ mental-health-now-covered-under-aca-but-not-for-everyone

Bronson, J., Carson, A., Noonan, M., & Berzofsky, M. (2015). *Veterans in prison and jail, 2011-12* (NCJ249144). Washington, DC: Government Printing Office.

Brunswick, M. (2011). Minnesota Guard leader confronts high rate of suicides. Retrieved from http://www.startribune.com/minnesota-guard-leader-confronts-high-rate-of-suicides/135888703/

Bruyere, S. M., VanLooy, S., von Schrader, S., & Barrington, L. (2016). Disability and employment: Framing the problem and our transdisciplinary approach. In *Disability and*

employer practices: Research across the disciplines (pp. 1-26). http://dx.doi.org/10.7591/cornell/9781501700583.001.0001

Bryan, C. J., Kopta, S. M., & Lowes, B. D. (2012). The CelestHealth system. *Integrating Science and Practice*, *2*(2), 7-11. Retrieved from http://citeseerx.ist.psu.edu/viewdoc/download?doi=10.1.1.679.4061&rep=rep1&type=pdf

Buchanan, N. T., Settles, I. H., & Woods, K. C. (2008). Comparing sexual harassment subtypes among Black and White women by military rank: Double jeopardy, the Jezebel, and the cult of true womanhood. *Psychology of Women Quarterly*, *32*(4), 347-361. http://dx.doi.org/10.1111/j.1471-6402.2008.00450.x

Calhoun, L. G., & Tedeschi, R. G. (1999). *Facilitating posttraumatic growth: A clinician's guide*. New York, NY: Routledge.

Camara, W. J., Nathan, J. S., & Puente, A. E. (2000). Psychological test usage: Implications in professional psychology. *Professional Psychology: Research and Practice*, *31*(2), 141. http://dx.doi.org/10.1037/0735-7028.31.2.141

Canadian Agency for Drugs and Technologies in Health. (2018). Post-traumatic stress disorder: Summary of evidence of the clinical effectiveness of treatments. Retrieved from https://www.cadth.ca/sites/default/files/pdf/2018_ptsd_summary_of_reports_e.pdf

Capone, C., McGrath, A., Reddy, M. K., & Shea, M. T. (2013). Trauma-related correlates of alcohol use in recently deployed OEF/OIF veterans. *Journal of Traumatic Stress*, *26*(3), 354-360. http://dx.doi.org/10.1002/jts.21817

Cate, C. A., Lyon, J. S., Schmeling, J., & Bogue, B. Y. (2017). *National veteran education success tracker: A report on the academic success of student veterans using the Post-9/11 GI Bill*. Washington, DC: Student Veterans of America.

Cautin, R. L., & Lilienfeld, S. O. (Eds.). (2015). *The encyclopedia of clinical psychology: 5 volume set*. http://dx.doi.org/10.1002/9781118625392.wbecp048

CelestHealth Solutions. (2018). https://www.celesthealth.com

Chambless, D. L., & Hollon, S. D. (1998). Defining empirically supported therapies . *Journal of Consulting and Clinical Psychology*, *66*(1), 7.

Chambless, D. L., & Ollendick, T. H. (2001). Empirically supported psychological interventions: Controversies and evidence. *Annual Review of Psychology*, *52*(1), 685-716.

Chambless, D. L., Baker, M. J., Baucom, D. H., Butler, L. E., Calhoun, K. S., Crits-Cristoph, P., ... Woody, S. R. (1998). Update on empirically validated therapies, II. *The Clinical Psychologist*, *51*(1), 3-16.

Chard, K. M., Schumm, J. A., Owens, G. P., & Cottingham, S. M. (2010). A comparison of OEF and OIF veterans and Vietnam veterans receiving cognitive processing therapy. *Journal of Traumatic Stress*, *23*(1), 25-32. http://dx.doi.org/10.1002/jts.20500

Chou, R. J., & Robert, S. A. (2008). Workplace support, role overload, and job satisfaction of direct care workers in assisted living. *Journal of Health and Social Behavior*, *49*(2), 208-222. http://dx.doi.org/10.1177/002214650804900207

Chou, W. H., Lai, Y. T., & Liu, K. H. (2013). User requirements of social media for the elderly: A case study in Taiwan. *Behaviour & Information Technology*, *32*(9), 920-937. http://dx.doi.org/10.1080/0144929X.2012.681068

Christman, S. D., Garvey, K. J., Propper, R. E., & Phaneuf, K. A. (2003). Bilateral eye movements enhance the retrieval of episodic memories. *Neuropsychology*, *17*(2), 221. http://dx.doi.org/10.1037/0894-4105.17.2.221

Clement, P. W. (2007). Story of "Hope": Successful treatment of obsessive-compulsive disorder. *Pragmatic Case Studies in Psychotherapy*, *3*(4), 1-36. http://dx.doi.org/10.14713/pcsp.v3i4.910

Collins, C., Hewson, D. L., Munger, R., & Wade, T. (2010). *Evolving models of behavioral health integration in primary care*. New York, NY: Milbank Memorial Fund.

Committee on the Assessment of Ongoing Efforts in the Treatment of Posttraumatic Stress Disorder. (2011). *Treatment for posttraumatic stress disorder in military and veteran populations: Final assessment*. [The National Academies Press]. Retrieved from https://www.ncbi.nlm.nih.gov/books/NBK224878/pdf/Bookshelf_NBK224878.pdf

Constable, N. (2014). Migrant motherhood, 'failed migration', and the gendered risks of precarious labour. *TRaNS: Trans-Regional and-National Studies of Southeast Asia*, *3*(1), 135-151. http://dx.doi.org/10.1017/trn.2014.13

Cook, J. M., Biyanova, T., Elhai, J., Schnurr, P. P., & Coyne, J. C. (2010). What do psychotherapists really do in practice? An Internet study of over 2,000 practitioners. *Psychotherapy: Theory, Research, Practice, Training*, *47*(2), 260. http://dx.doi.org/10.1037/a0019788

Corrigan, P. W., & Rao, D. (2012). On the self-stigma of mental illness: Stages, disclosure, and strategies for change. *The Canadian Journal of Psychiatry*, *57*(8), 464-469. http://dx.doi.org/10.1177/070674371205700804

Cosgrave, C., Hussain, R., & Maple, M. (2015). Factors impacting on retention amongst community mental health clinicians working in rural Australia: A literature review. *Advances in Mental Health*, *13*(1), 58-71. http://dx.doi.org/10.1080/18374905.2015.1023421

Coubard, O. A. (2015). Eye movement desensitization and reprocessing (EMDR) re-examined as cognitive and emotional neuroentrainment. *Frontiers in Human Neuroscience*, *8*, 1035. http://dx.doi.org/10.3389/fnhum.2014.01035

Cronk, M. T. (2016). Transgender service members can now serve openly, Carter announces. Retrieved from https://dod.defense.gov/News/Article/Article/822235/transgender-service-members-can-now-serve-openly-carter-announces/

Cukor, J., Olden, M., Lee, F., & Difede, J. (2010). Evidence-based treatments for PTSD, new directions, and special challenges. *Annals of the New York Academy of Sciences*, *1208*(1), 82-89. http://dx.doi.org/10.1111/j.1749-6632.2010.05793.x

Damschroder, L. J., Aron, D. C., Keith, R. E., Kirsh, S. R., Alexander, J. A., & Lowery, J. C. (2009). Fostering implementation of health services research findings into practice: A consolidated framework for advancing implementation science. *Implementation Science*, *4*(1), 50. http://dx.doi.org/10.1186/1748-5908-4-50

De Jong, K., Timman, R., Hakkaart-Van Roijen, L., Vermeulen, P., Kooiman, K., Passchier, J., & Busschbach, J. (2014). The effect of outcome monitoring feedback to clinicians and patients in short and long-term psychotherapy: A randomized controlled trial. *Psychotherapy Research*, *24*(6), 629-639. http://dx.doi.org/10.1080/10503307.2013.871079

Defense Manpower Data Center. (2016). Demographics: Profile of the military community. Retrieved from http://download.militaryonesource.mil/12038/MOS/Reports/2016-Demographics-Report.pdf

Department of Defense. (2014). Military health system review: Final report to the secretary of defense. Retrieved from http://www.defense.gov/Portals/1/Documents/pubs/140930_MHS_Review_Final_Report_Main_Body.pdf

Department of Defense. (2018). TRICARE mental health and substance use disorder services . Retrieved from https://tricare.mil/-/media/Files/TRICARE/Publications/FactSheets/Mental_Health_FS.ashx

Devebakan, N., Dogan, O., Ceylan, V., Akin, E., & Kose, S. (2018). Relationship between temperament and character dimensions of personality and burnout and management in healthcare organization workers. *Psychiatry and Clinical Psychopharmacology*, *28*(1), 73-79. http://dx.doi.org/10.1080/24750573.2017.1403712

DeViva, J. C., Sheerin, C. M., Southwick, S. M., Roy, A. M., Pietrzak, R. H., & Harpaz-Rotem, I. (2016). Correlates of VA mental health treatment utilization among OEF/OIF/OND veterans: Resilience, stigma, social support, personality, and beliefs about treatment. *Psychological Trauma: Theory, Research, Practice, and Policy*, *8*(3), 310. http://dx.doi.org/10.1037/tra0000075

Dinucci, D. (1999, April). Fragmented future. *Print*. Retrieved from http://darcyd.com/fragmented_future.pdf

Dozois, D. J., Mikail, S., Alden, L. E., Bieling, P. J., Bourgon, G., Clark, D. A., ... Johnston, C. (2014). The CPA presidential task force on evidence-based practice of psychological treatments. *Canadian Psychology/Psychologie Canadienne*, *55*(3), 153. http://dx.doi.org/10.1037/a0035767

Drapeau, M. (2012). The value of tracking in psychotherapy. *Integrating Science and Practice*, *2*, 2-6. Retrieved from https://mpprg.mcgill.ca/Articles/10%20tools%20PDF.pdf

Druss, B. G., Ji, X., Glick, G., & von Esenwein, S. A. (2014). Randomized trial of an electronic personal health record for patients with serious mental illnesses. *American Journal of Psychiatry*, *171*(3), 360-368. http://dx.doi.org/10.1176/appi.ajp.2013.13070913

D'Souza, F., Egan, S. J., & Rees, C. S. (2011). The relationship between perfectionism, stress and burnout in clinical psychologists. *Behaviour Change*, *28*(1), 17-28. http://dx.doi.org/10.1375/bech.28.1.17

Ehlers, A., Bisson, J., Clark, D. M., Creamer, M., Pilling, S., Richards, D., ... Yule, W. (2010). Do all psychological treatments really work the same in posttraumatic stress disorder? *Clinical Psychology Review*, *30*(2), 269-276. http://dx.doi.org/10.1016/j.cpr.2009.12.001

Eklund, M., & Hallberg, I. R. (2001). Psychiatric occupational therapists' verbal interaction with their clients. *Occupational Therapy International*, *8*(1), 1-16. http://dx.doi.org/10.1002/oti.128

Elbogen, E. B., Wagner, H. R., Johnson, S. C., Kinneer, P., Kang, H., Vasterling, J. J., ... Beckham, J. C. (2013). Are Iraq and Afghanistan veterans using mental health services? New data from a national random-sample survey. *Psychiatric Services*, *64*, 134-141. http://dx.doi.org/10.1176/appi.ps.004792011

Elkins, D. N. (2009). The medical model in psychotherapy: Its limitations and failures. *Journal of Humanistic Psychology*, *49*(1), 66-84. http://dx.doi.org/10.1177/0022167807307901

Embrey, E. P. (2009). *Policy memorandum implementation of the 'Patient-Centered Medical Home' model of primary care in MTFs* [Memorandum for Assistant Secretary of the Army, Assistant Secretary of the Navy, Assistant Secretary of the Air Force]. Retrieved from Office of the Assistant Secretary of Defense: http://www.pdhealth.mil/policy-memorandum-implementation-patient-centered-medical-home-model-primary-care-mtfs

Emerson, T. (2017). *Inside the VA: How workplace training evaluation impacts employee performance* (Doctoral dissertation). Retrieved from https://irl.umsl.edu/cgi/viewcontent.cgi?article=1648&context=dissertation

Emery, S., Wade, T. D., & McLean, S. (2009). Associations among therapist beliefs, personal resources and burnout in clinical psychologists. *Behaviour Change*, *26*(2), 83-96. http://dx.doi.org/10.1375/bech.26.2.83

Engel, C. C. (2014). Compromised confidentiality is harmful: Military owes proof to the contrary. *Psychiatric Times*, *31*(12), 30.

Fair, C. C. (2018). Afghanistan in 2017: Another year of running in place. *Asian Survey*, *58*(1), 110-119. http://dx.doi.org/10.1525/as.2018.58.1.110

Feder, A., Southwick, S. M., Goetz, R. R., Wang, Y., Alonso, A., Smith, B. W., ... Hain, R. (2008). Posttraumatic growth in former Vietnam prisoners of war. *Psychiatry: Interpersonal and Biological Processes*, *71*(4), 359-370. http://dx.doi.org/10.1521/psyc.2008.71.4.359

Figley, C. R. (2002). Compassion fatigue: Psychotherapists' chronic lack of self care. *Journal of Clinical Psychology*, *58*(11), 1433-1441. http://dx.doi.org/10.1002/jclp.10090

Figueiredo Filho, D. B., Paranhos, R., Rocha, E. C., Batista, M., Silva Jr., J. A., Santos, M. W., & G, M. J. (2013). When is statistics significance not significant? *Brazilian Political Science Review*, *7*(1), 31-55. http://dx.doi.org/10.1590/S1981-38212013000100002

Fleury, M. J., Bamvita, J. M., Grenier, G., & Chiocchio, F. (2017). Variables associated with work performance in multidisciplinary mental health teams. *SAGE Open Medicine*, *5*. http://dx.doi.org/10.1177/2050312117719093

Forbes, D., Creamer, M., Bisson, J. I., Cohen, J. A., Crow, B. E., Foa, E. B., ... Ursano, R. J. (2010). A guide to guidelines for the treatment of PTSD and related conditions. *Journal of Traumatic Stress*, *23*(5), 537-552. http://dx.doi.org/10.1002/jts.20565

Ford, J. D., & Landoll, R. R. (2018). Treating active duty service members outside of the military health system. *Journal of Health Service Psychology*, *44*, 125-130.

Fortney, J. C., Curran, G. M., Hunt, J. B., Cheney, A. M., Lu, L., Valenstein, M., & Eisenberg, D. (2016). Prevalence of probable mental disorders and help-seeking behaviors among veteran and non-veteran community college students. *General Hospital Psychiatry*, *38*, 99-104. http://dx.doi.org/10.1016/j.genhosppsych.2015.09.007

Frankfurt, S., & Frazier, P. (2016). A review of research on moral inquiry in combat veterans. *Military Psychology*, *28*(5), 318-330. http://dx.doi.org/10.1037/mil0000132

Frost, D. M. (2011). Social stigma and its consequences for the socially stigmatized. *Social and Personality Psychology Compass*, *5*(11), 824-839. http://dx.doi.org/10.1111/j.1751-9004.2011.00394.x

Gage, M. (1991). Retention strategy: A clinical ladder for occupational therapists. *Canadian Journal of Occupational Therapy*, *58*(5), 250-253.

Gandolf, S. (2014). 15 healthcare marketing strategies that bring more patients. Retrieved from https://www.healthcaresuccess.com/blog/healthcare-marketing/healthcare-marketing-strategy.html

Gates, G. J. (2010). *Lesbian, gay, and bisexual men and women in the US military: Updated estimates* [Research brief]. Retrieved from Williams Institute: https://williamsinstitute.law.ucla.edu/wp-content/uploads/Gates-GLBmilitaryUpdate-May-20101.pdf

Gates, M. A., Holowka, D. W., Vasterling, J. J., Keane, T. M., Marx, B. P., & Rosen, R. C. (2012). Posttraumatic stress disorder in veterans and military personnel: Epidemiology, screening, and case recognition. *Psychological Services*, *9*, 361-382. http://dx.doi.org/10.1037/a0027649.

Gillani, S. W. (2011). Is statistical significance a relevant tool for assessing clinical significance? *Journal of Pharmaceutical Negative Results*, *2*, 121-122. http://dx.doi.org/10.4103/0976-9234.90227

Gordon, S. (2016). How VA healthcare outdoes private sector. Retrieved from http://beyondchron.org/31264-2/

Granieri, A., Gugielmucci, F., Costanzo, A., Caretti, V., & Schimmenti, A. (2018). Trauma-related dissociation is linked with maladaptive personality functioning. *Frontiers in Psychiatry*, *9*. http://dx.doi.org/10.3389/fpsyt.2018.00206

Graziano, R., & Elbogen, E. B. (2017). Improving mental health treatment utilization in military veterans: Examining the effects of perceived need for care and social support. *Military Psychology*, *29*(5), 359-369. http://dx.doi.org/ 10.1037/mil0000169

Haagen, J. F., van Rijn, A., Knipscheer, J. W., van der Aa, N., & Kleber, R. J. (2017). *The dissociative PTSD subtype: A treatment outcome cohort study in veterans with PTSD.* . [PDF]. Retrieved from https://dspace.library.uu.nl/bitstream/handle/1874/355276/Haagen.pdf?sequence=1#page=119

Hale, C. D. (2015). Chapter 1 program evaluation: An introduction. Retrieved from http://charlesdennishale.org/Evaluating-Education-and-Training-Services/1-EETS-Program-Evaluation-Introduction-3.0.pdf

Hallings-Pott, C., Waller, G., Watson, D., & Scragg, P. (2005). State dissociation in bulimic eating disorders: An experimental study. *International Journal of Eating Disorders*, *38*(1), 37-41. http://dx.doi.org/10.1002/eat.20146

Harada, N. D., Villa, V. M., Reifel, N., & Bayhylle, R. (2005). Exploring veteran identity and health service use among Native American veterans. *Military Medicine*, *170*(9), 782-786.

Hase, M., Balmaceda, U. M., Hase, A., Lehnung, M., Tumani, V., Huchzermeier, C., & Hoffmann, A. (2015). Eye movement desensitization and reprocessing (EMDR) therapy in the treatment of depression: A matched pairs study in an inpatient setting. *Brain and Behavior*, *5*(6), e00342. http://dx.doi.org/10.1002/brb3.342

Hatfield, D. R., & Ogles, B. M. (2004). The use of outcome measures by psychologists in clinical practice. *Professional Psychology: Research and Practice*, *35*(5), 485. http://dx.doi.org/10.1037/0735-7028.35.5.485

Hayden, J. A., Cote, P., & Bombardier, C. (2006). Evaluation of the quality of prognosis studies in systematic reviews. *Annals of Internal Medicine*, *144*(6), 427-437.

Hayes, J. P., LaBar, K. S., McCarthy, G., Selgrade, E., Nasser, J., & Dolcos, F. (2011). Reduced hippocampal and amygdala activity predicts memory distortion for trauma reminders in combat-related PTSD. *Journal of Psychiatric Research*, *45*(5), 660-669. http://dx.doi.org/10.1016/j.jpsychires.2010.10.007

Hoffman, F. G. (2017). Shaping the 21st century military. *Orbis*, *61*(1), 43-63.

Hoge, C. W. (2011). Interventions for war-related posttraumatic stress disorder: Meeting veterans where they are. *Journal of the American Medical Association*, *306*(5), 549-551. http://dx.doi.org/10.1001/jama.2011.1096

Hoge, C. W., Grossman, S. H., Auchterlonie, J. L., Riviere, L. A., Milliken, C. S., & Wilk, J. E. (2014). PTSD treatment soldiers after combat deployment: Low utilization of mental health care and reasons for dropout. *Psychiatric Services*, *65*, 997-1004.

Hoge, M. A., Stuart, G. W., Morris, J., Flaherty, M. T., Paris, Jr., M., & Goplerud, E. (2013). Mental health and addiction workforce development: Federal leadership is needed to address the growing crisis. *Health Affairs*, *32*(11), 2005-2012. http://dx.doi.org/ 10.1377/hlthaff.2013.0541

Holdeman, T. C. (2009). Invisible wounds of war: Psychological and cognitive injuries, their consequences, and services to assist recovery. *Psychiatric Services*, *60*(2), 1-52. Retrieved from https://apps.dtic.mil/dtic/tr/fulltext/u2/a480992.pdf

Hook, S. W., & Spanier, J. (2018). *American foreign policy since World War II*. Los Angeles, CA: CQ Press.

Humanitarian Assistance Programs. (n.d.). Trauma recovery/HAP history. Retrieved from https://www.emdrhap.org/content/hap-history/

Humphreys, J. S., & Smith, K. B. (2009). Healthcare accessibility. *The International Encyclopedia of Human Geography*, *5*, 71-79.

Humphreys, J., Wakerman, J., Pashen, D., & Buykx, P. (2017). Retention strategies and incentives for health workers in rural and remote areas: What works? *Australian Primary Health Care Research Institute*. Retrieved from https://openresearch-repository.anu.edu.au/bitstream/1885/119206/3/international_retention_strategies_research_pdf_10642%281%29.pdf

IHS Markit. (2017). About us. Retrieved from https://ihsmarkit.com/about/index.html

Institute of Medicine. (2011). Clinical practice guidelines we can trust. Retrieved from
https://www.awmf.org/fileadmin/user_upload/Leitlinien/International/IOM_CPG_lang_2
011.pdf

Institute of Medicine. (2012). *Treatment for posttraumatic stress disorder in military and veteran
populations: Initial assessment* [Report brief]. Retrieved from
http://www.nationalacademies.org/hmd/~/media/Files/Report%20Files/2012/PTSD-
Initial-Assessment/PTSD_I_RB.pdf

International Society for Traumatic Stress Studies . (2018). PTSD prevention and treatment
guidelines methodology and recommendations. Retrieved from
http://www.istss.org/getattachment/Treating-Trauma/New-ISTSS-Prevention-and-
Treatment-Guidelines/ISTSS_PreventionTreatmentGuidelines_FNL.pdf.aspx

Jakupcak, M., Cook, J., Imel, Z., Fontana, A., Rosenheck, R., & McFall, M. (2009).
Posttraumatic stress disorder as a risk factor suicidal ideation in Iraq and Afghanistan war
veterans. *Journal of Traumatic Stress*, *22*(4), 303-306.

Jorm, A. (2000). Mental health literacy: Public knowledge and beliefs about. *British Journal of
Psychiatry*, *177*, 317-327. http://dx.doi.org/10.1192/bjp.177.5.396

Kang, H. K., & Bullman, T. A. (2008). Risk of suicide among US veterans after returning from
the Iraq or Afghanistan war zones. *Journal of the American Medical Association*, *300*(6),
652-653. http://dx.doi.org/10.1001/jama.300.6.652

Kaplan, A., & Haenlein, M. (2014). Collaborative projects (social media application): About
Wikipedia, the free encyclopedia. *Business Horizons*, *57*(5), 617-626.
http://dx.doi.org/10.1016/j.bushor.2014.05.004

Karlin, B. E., & Cross, G. (2014). From the laboratory to the therapy room: National
dissemination and implementation of evidence-based psychotherapies in the US
Department of Veterans Affairs health care system. *American Psychologist*, *69*(1), 19.
http://dx.doi.org/10.1037/a0033888

Karlin, B. E., Ruzek, J. I., Chard, K. M., Eftekhari, A., Monson, C. M., Hembree, E. A., ... For,
E. B. (2010). Dissemination of evidence-based psychological treatments for
posttraumatic stress disorder in the Veterans Health Administration. *Journal of
Traumatic Stress*, *23*(6), 663-673. http://dx.doi.org/10.1002/jts.20588

Kaslow, N. J., Rubin, N. J., Bebeau, M. J., Leigh, I. W., Lichtenberg, J. W., Nelson, P. D., ...
Smith, I. L. (2007). Guiding principles and recommendations for the assessment of
competence. *Professional Psychology: Research and Practice*, *38*(5), 441.
http://dx.doi.org/10.1037/0735-7028.38.5.441

Kaur, N., Porter, B., LeardMann, C. A., Tobin, L. E., Lemus, H., & Luxton, D. D. (2017).
Evaluation of a modified version of the Posttraumatic Growth Inventory - Short Form.
BMC Medical Research Methodology, *17*(1), 69. http://dx.doi.org/10.1186/s12874-017-
0344-2

Keller, B., Stevens, L., Lui, C., Murray, J., & Yaggie, M. (2014). The effects of bilateral eye movements on EEG coherence when recalling a pleasant memory. *Journal of EMDR Practice and Research*, *8*(3), 113-128. http://dx.doi.org/10.1891/1933-3196.8.3.113

Kietzmann, J. H., Hermkens, K., McCarthy, I. P., & Sivestre, B. S. (2011). Social media? Get serious! Understanding the functional building blocks of social media. *Business Horizons*, *54*(3), 241-251. http://dx.doi.org/10.1016/j.bushor.2011.01.005

Kinman, G., & Grant, L. (2010). Exploring stress resilience in trainee social workers: The role of emotional and social competencies. *British Journal of Social Work*, *1*, 1-15. http://dx.doi.org/10.1093/bjsw/bcq088

Kirk, R. E. (1996). Practical significance: A concept whose time has come. *Educational and Psychological Measurement*, *56*(5), 746-759. Retrieved from https://www.researchgate.net/profile/Roger_Kirk/publication/232905756_Kirk_R_E_200 9_Practical_significance_A_concept_whose_time_has_come_S_Gorard_Ed_Quantitative _research_in_education_Thousand_Oaks_CA_Sage/links/57ffeaca08aec3e477eac7aa/Kir k-R-E-2009-Practical-significance-A-concept-whose-time-has-come-S-Gorard-Ed-Quantitative-research-in-education-Thousand-Oaks-CA-Sage.pdf

Klee, A., Stacy, M., Rosenheck, R., Harkness, L., & Tsai, J. (2016). Interest in technology-based therapies hampered by access: A survey of veterans with serious mental illnesses. *Psychiatric Rehabilitation Journal*, *39*(2), 173. http://dx.doi.org/10.1037/prj0000180

Knight, M., Abdallah, L., Findeisen, M., Melillo, K. D., & Dowling, J. (2011). Making healthy connections: Introducing nursing as a career choice to middle school students. *Nursing Forum*, *46*(2), 146-151.

Knopf-Amelung, S. M., & Jenkins, D. M. (2013). Identifying US veterans who access services from Health Care for the Homeless clinics. *American Journal of Public Health*, *103*(S2), S216-S217. http://dx.doi.org/10.2105/ajph.2013.301308

Kopta, M., Owen, J., & Budge, S. (2015). Measuring psychotherapy outcomes with the Behavioral Health Measure-20: Efficient and comprehensive. *Psychotherapy*, *52*(4), 442-448. http://dx.doi.org/10.1037/pst0000035

Krageloh, C. U., Czuba, K. J., Billington, D. R., Kersten, P., & Siegert, R. J. (2015). Using feedback from patient-reported outcome measures in mental health services: A scoping study and typology. *Psychiatric Services*, *66*(3), 224-241. http://dx.doi.org/10.1176/appi.ps.201400141

Kuhn, E., Greene, C., Hoffman, J., Nguyen, T., Wals, L., Schmidt, J., ... Ruzek, J. (2014). Preliminary evaluation of PTSD Coach, a smartphone app for post-traumatic stress symptoms. *Military Medicine*, *179*(1), 12-18. http://dx.doi.org/10.7205/MILMED-D-13-00271

Lambert, M. J., & Barley, D. E. (2002). Outcome measures. In *Encyclopedia of Psychotherapy* (pp. 307-311). [eBook]. Retrieved from http://www.encyclopedias.biz/dw/Encyclopedia%20of%20Psychotherapy.pdf

Lambert, M. J., & Bergin, A. E. (1994). The effectiveness of psychotherapy. *Handbook of Psychotherapy and Behavior Change*, *4*, 143-189.

Lee, Y. W., Dai, Y. T., Chang, M. Y., Chang, Y. C., Yao, K. G., & Liu, M. C. (2017). Quality of work life, nurses' intention to leave the profession, and nurses leaving the profession: A one-year prospective survey. *Journal of Nursing Scholarship*, *49*(4), 438-444. http://dx.doi.org/10.1111/jnu.12301.

Lehavot, K., & Simpson, T. L. (2014). Trauma, posttraumatic stress disorder, and depression among sexual minority and heterosexual women veterans. *Journal of Counseling Psychology*, *61*(3), 392. http://dx.doi.org/10.1037/cou0000019

Lehmann, U., Dieleman, M., & Martineau, T. (2008). Staffing remote rural areas in middle- and low-income countries: A literature review of attraction and retention. *BioMed Central Health Services Research*, *8*(19). http://dx.doi.org/10.1186/1472-6963-8-19

LeMire, S. (2015, March). *Beyond service: New outreach strategies to reach student veterans*. Paper presented at the Association of College and Research Libraries, Portland, OR. Retrieved from http://www.ala.org/acrl/sites/ala.org.acrl/files/content/conferences/confsandpreconfs/2015/LeMire.pdf

LeMire, S., & Mulvihill, K. J. (2017). *Serving those who served: Librarian's guide to working with veteran and military communities*. [ABC-CLIO]. Retrieved from https://www.abc-clio.com/LibrariesUnlimited/product.aspx?pc=A4622P

Levant, R. F. (2004). The empirically validated treatments movement: A practitioner/educator perspective. *Clinical Psychology: Science and Practice*, *11*(2), 219-224.

Lewis, B. (2009). New PTSD program answers need for comprehensive treatment. Retrieved from https://www.af.mil/News/Article-Display/Article/119869/new-ptsd-program-answers-need-for-comprehensive-treatment/

Lo, E. H., Au, T. A., & Hoek, P. J. (2014). A short guide to experimental design and analysis for engineers. Retrieved from https://apps.dtic.mil/dtic/tr/fulltext/u2/a611423.pdf

Lutz, W., DeJong, K., & Rubel, J. (2015). Patient-focused and feedback research in psychotherapy: Where are we and where do we want to go? *Psychotherapy Research*, 1-8. http://dx.doi.org/10.1080/10503307.2015.1079661

Luxton, D. D., Nelson, E. L., & Maheu, M. M. (2016). *A practitioner's guide to elemental health: How to conduct legal, ethical, and evidence-based telepractice*. Washington, DC: American Psychological Association.

Lyle, K. B., & Jacobs, N. E. (2010). Is saccade-induced retrieval enhancement a potential means of improving eyewitness evidence? *Memory*, *18*(6), 581-594. http://dx.doi.org/10.1080/09658211.2010.493891

Lyons, G. (2014). The effect of pranayama on test anxiety and test performance. *International Journal of Yoga*, *7*(1), 81. http://dx.doi.org/10.4103/0973-6131.123501

MacDowell, M., Glasser, M., Weidenbacher-Hoper, V., & Peters, K. (2014). Impact of a rural interprofessional health professions summer preceptorship educational experience on participants' attitudes and knowledge. *Education for Health*, *27*(2), 177. http://dx.doi.org/10.4103/1357-6283.143783

Maguen, S., Lucenko, B. A., Reger, M. A., Gahm, G. A., Litz, B. T., Seal, K. H., ... Marmar, C. R. (2010). The impact of reported direct and indirect killing on mental health symptoms in Iraq war veterans. *Journal of Traumatic Stress*, *23*(1), 86-90. http://dx.doi.org/10.1002/jts.20434

Mangold, W. G., & Faulds, D. J. (2009). Social media: The new hybrid element of the promotion mix. *Business Horizons*, *52*(4), 357-365. http://dx.doi.org/10.1016/j.bushor.2009.03.002

Mathison, S. (2004). *Encyclopedia of evaluation*. London, England: Sage.

McHugh, R. K., & Barlow, D. H. (2010). The dissemination and implementation of evidence-based psychological treatments: A review of current efforts. *American Psychologist*, *65*(2), 73. http://dx.doi.org/10.1037/a0018121

Miles, D. (2010). Officials tout post-9/11 bill benefits. Retrieved from https://search.defense.gov/search?affiliate=dod-search&query=Officials%20tout%20post-9%2F11%20bill%20benefits

Military Health System and Defense Health Agency. (n.d.). About the military health system. Retrieved from http://www.health.mil/About-MHS

Miller, S. D., Hubble, M. A., Chow, D. L., & Seidel, J. A. (2013). The outcome of psychotherapy: Yesterday, today, and tomorrow. *Psychotherapy*, *50*(1), 88-97. http://dx.doi.org/10.1037/a0031097

Milliken, C. S., Auchterlonie, J. L., & Hoge, C. W. (2007). Longitudinal assessment of mental health problems among active and reserve component soldiers returning from the Iraq war. *Journal of the American Medical Association*, *298*(18), 2141-2148.

Moorhead, S. A., Hazlett, D. E., Harrison, L., Carroll, J. K., Irwin, A., & Hoving, C. (2013). A new dimension of health care: Systematic review of the uses, benefits, and limitations of social media for health communication. *Journal of Medical Internet Research*, *15*(4), 1-16. http://dx.doi.org/10.2196/jmir.1933

Morral, A. R., Gore, K. L., & Schell, T. L. (Eds.). (2016). *Sexual assault and sexual harassment in the US military: Volume 4. Investigations of potential bias in estimates from the 2014*

RAND Military Workplace Study. [RAND]. Retrieved from https://www.rand.org/pubs/research_reports/RR870z2-1.html

Munoz, J. P., Moreton, E. M., & Sitterly, A. M. (2016). The scope of practice of occupational therapy in US criminal justice settings. *Occupational Therapy International*, *23*(3), 241-254. http://dx.doi.org/10.1002/oti.1427

Muralidharan, A., Austern, D., Hack, S., & Vogt, D. (2016). Deployment experiences, social support, and mental health: Comparison of black, white, and hispanic US veterans deployed to Afghanistan and Iraq. *Journal of Traumatic Stress*, *29*(3), 273-278. http://dx.doi.org/10.1002/jts.22104.

Murphy, D., Ross, J., Ashwick, R., Armour, C., & Busuttil, W. (2017). Exploring optimum cut-off scores to screen for probable posttraumatic stress disorder within a sample of UK treatment-seeking veterans. *European Journal of Psychotraumatology*, *8*(1), 1-9. http://dx.doi.org/10.1080/20008198.2017.1398001

Muse, K., McManus, F., Rakovshik, S., & Thwaites, R. (2017). Development and psychometric evaluation of the Assessment of Core CBT Skills: An observation-based tool for assessing cognitive behavioral therapy competence. *Psychological Assessment*, *29*(5), 542. http://dx.doi.org/10.1037/pas0000372

Mystakidou, K., Tsilika, E., Parpa, E., Galanos, A., & Vlahos, L. (2008). Post-traumatic growth in advanced cancer patients receiving palliative care. *British Journal of Health Psychology*, *13*(4), 633-646. http://dx.doi.org/10.1348/135910707X246177

Najavits, L. M. (2015). The problem of dropout from "gold standard" PTSD therapies. *F1000 Prime Reports*, *7*(43), 1-8. http://dx.doi.org/10.12703/P7-43

Nathan, P. E., Gorman, J. M., & Chambless, D. L. (1999). Treatments that work. *PsycCRITIQUES*, *44*(3), 250-252. http://dx.doi.org/10.1037/002016

Nathan, P. E., Stuart, S. P., & Dolan, S. L. (2000). Research on psychotherapy efficacy and effectiveness: Between Scylla and Charybdis. *Psychological Bulletin*, *126*(6), 964. http://dx.doi.org/10A037//0033-2909A26.6.964

National Academies of Sciences, Engineering, and Medicine. (2018). *Evaluation of the Department of Veterans Affairs mental health services*. [National Academies Press]. Retrieved from https://www.nap.edu/read/24915/chapter/1

National Alliance on Mental Illness. (n.d.). Veterans & active duty. Retrieved from https://www.nami.org/Find-Support/Veterans-and-Active-Duty

National Center for PTSD. (2016). *National Center for PTSD dissemination and training division advanced fellowship in mental health research and treatment*. Retrieved from https://societyforimplementationresearchcollaboration.org/wp-content/uploads/2015/11/NCPTSD-APPLICATION-AND-PROGRAM-DESCRIPTION-2016.pdf

National Center for PTSD. (2017). Mobile app: PTSD coach. Retrieved from
        http://www.ptsd.va.gov/public/materials/apps/PTSDCoach.asp

National Center for PTSD. (2017). Mobile applications. Retrieved from
        https://www.ptsd.va.gov/public/materials/apps/index.asp

National Center for Transgender Equality. (2015). Trans military veterans can now update
        critical records. Retrieved from https://transequality.org/blog/trans-military-veterans-can-
        now-update-critical-records

National Council for Behavioral Health. (2012). Meeting the behavioral health needs of veterans.
        Operation Enduring Freedom and Operation Iraqi Freedom. Retrieved from
        https://docplayer.net/9716376-Meeting-the-behavioral-health-needs-of-veterans-
        operation-enduring-freedom-and-operation-iraqi-freedom.html

National Defense Research Institute. (2010). *Sexual orientation and U.S. military personnel
        policy: An update of RAND's 1993 study* [Research monograph]. Retrieved from RAND
        Corporation:
        https://www.rand.org/content/dam/rand/pubs/monographs/2010/RAND_MG1056.pdf

National Institute for Health and Clinical Excellence. (2018). Post-traumatic stress disorder.
        Retrieved from https://www.nice.org.uk/guidance/ng116

Neuhauser, J. A. (2010). Lives of quiet desperation: The conflict between military necessity and
        confidentiality. *Creighton Law Review, 44*, 1003-1044.

Newcomer, K. E., Hatry, H. P., & Wholey, J. S. (2015). *Handbook of practical program
        evaluation* (4th ed.). Hoboken, NJ: John Wiley & Sons.

Nieuwenhuis, S., Elzinga, B. M., Ras, P. H., Berends, F., Duijs, P., Samara, Z., & Slagter, H. A.
        (2013). Bilateral saccadic eye movements and tactile stimulation, but not auditory
        stimulation, enhance memory retrieval. Retrieved from
        http://www.sandernieuwenhuis.nl/pdfs/NieuwenhuisEtAl_Bilateral.pdf

Nilsen, P. (2015). Making sense of implementation theories, models and frameworks.
        Implementation Science, 10(1), 53. http://dx.doi.org/10.1186/s13012-015-0242-0

Norcross, J. C., & Wampold, B. E. (2011). Evidence-based therapy relationships: Research
        conclusions and clinical practices. *Psychotherapy, 48*(1), 98.

Office of the Assistant Secretary of Defense. (2017). *Evaluation of TRICARE program: Fiscal
        year 2017 report to congress*. Retrieved from https://health.mil/Military-Health-
        Topics/Access-Cost-Quality-and-Safety/Health-Care-Program-Evaluation/Annual-
        Evaluation-of-the-TRICARE-Program

Office of the Governor, Tim Pawlenty. (2010). Governor Pawlenty appoints major general
        Richard Nash to lead Minnesota national guard. Retrieved from

https://www.leg.state.mn.us/docs/2010/other/101583/www.governor.state.mn.us/mediace
nter/pressreleases/PROD010109.html

Office of the Under Secretary of Defense. (2016). *Evaluation of TRICARE program report to
congress* (20301-4000). Washington, DC: Government Printing Office.

Ortiz, S. R. (2006). Rethinking the Bonus March: Federal bonus policy, the veterans of foreign
wars, and the origins of a protest movement. *Journal of Policy History*, *18*(3), 275-303.
Retrieved from
https://www.researchgate.net/profile/Stephen_Ortiz/publication/300624089_Rethinking_t
he_Bonus_March/links/595d093045851524687a5619/Rethinking-the-Bonus-March.pdf

Ozturkcu, O. S., Sertoz, O. O., Gokengin, G. B., Sagin, H., Gulbahar, O., & Ciceklioglu, M.
(2018). Is it possible to decrease the burnout level of hospital office staff by
communication skills training using therapy techniques? *Dusunen Adam: Journal of
Psychiatry & Neurological Sciences*, *31*(1), 61-71.
http://dx.doi.org/10.5350/DAJPN2018310106

Panangala, S. V. (2016). *Health care for veterans: Answers to frequently asked questions*
(R42747). Washington, DC: Government Printing Office.

Parker, A., & Dagnall, N. (2012). Effects of saccadic bilateral eye movements on memory in
children and adults: An exploratory study. *Brain and Cognition*, *78*(3), 238-247.
Retrieved from https://eric.ed.gov/?id=EJ958487

Paul, L. A., Hassija, C. M., & Clapp, J. D. (2012). Technological advances in the treatment of
trauma: A review of promising practices. *Behavior Modification*, *36*(6), 897-923.
http://dx.doi.org/10.1177/0145445512450733

Peterson, L. S. (2008, February). *"Clinical" significance: "Clinical" significance and
"practical" significance are NOT the same things*. Paper presented at the Southwest
Educational Research Association, New Orleans, LA. Retrieved from
https://files.eric.ed.gov/fulltext/ED499990.pdf

Phoenix Australia Centre for Posttraumatic Mental Health. (2015). Australian guidelines for the
treatment of acute stress disorder & posttraumatic stress disorder, approved by Australia's
national health and medical research council. Retrieved from
https://phoenixaustralia.org/wp-content/uploads/2015/03/Phoenix-ASD-PTSD-
Guidelines.pdf

Pickett, T., Rothman, D., Crawford, E. F., Brancu, M., Fairbank, J. A., & Kudler, H. S. (2015).
Mental health among military personnel and veterans. *North Carolina Medical Journal*,
76(5), 299-306. http://dx.doi.org/10.18043/ncm.76.5.299

Portman, M. E. (2009). *Generalized anxiety disorder across the lifespan: An integrative
approach*. New York, NY: Springer.

Propper, R. E., Pierce, J., Geisler, M. W., Christman, S. D., & Bellorado, N. (2007). Effect of bilateral eye movements on frontal interhemispheric gamma EEG coherence: Implications for EMDR therapy. *The Journal of Nervous and Mental Disease*, *195*(9), 785-788. http://dx.doi.org/10.1097/NMD.0b013e318142cf73

Ramchand, R., Schell, T. L., Karney, B. R., Osilla, K. C., Burns, R. M., & Caldarone, L. B. (2010). Disparate prevalence estimates of PTSD among service members who served in Iraq and Afghanistan: possible explanations. *Journal of Traumatic Stress*, *23*(1), 59-68. http://dx.doi.org/10.1002/jts.20486

Ramo, D. E., Rodriguez, T. M., Chavez, K., Sommer, M. J., & Prochaska, J. J. (2014). Facebook recruitment of young adult smokers for a cessation trial: Methods, metrics, and lessons learned. *Internet Interventions*, *1*(2), 58-64. http://dx.doi.org/10.1016/j.invent.2014.05.001

Randall, D., & McKeown, M. (2014). Failure to care: Nursing in a state of liquid modernity? *Journal of Clinical Nursing*, *23*(5-6), 766-767. http://dx.doi.org/10.1111/jocn.12441

Rank, M. G., Chaffin, I., Figley, C. R., & Lawrence, T. (2008). The treatment of posttraumatic stress disorder in an extended care psychiatric rehabilitation program. *Work*, *30*(2), 113-121. Retrieved from https://www.researchgate.net/publication/5438620_The_treatment_of_posttraumatic_stress_disorder_in_an_extended_care_psychiatric_rehabilitation_program

Rash, C. J., Coffey, S. F., Baschnagel, J. S., Drobes, D. J., & Saladin, M. E. (2008). Psychometric properties of the IES-R in traumatized substance dependent individuals with and without PTSD. *Addictive Behaviors* , *33*(8), 1039-1047. Retrieved from https://www.ncbi.nlm.nih.gov/pmc/articles/PMC2494706/pdf/nihms56356.pdf

Rasmussen, D. C. (2018). *The politics of United States army doctrine* (Doctoral dissertation). Retrieved from https://academicworks.cuny.edu/cgi/viewcontent.cgi?article=3540&context=gc_etds

Record, E. J., Medoff, D. R., Dixon, L. B., Klingaman, E. A., Park, S. G., Hack, S., ... Kreyenbuhl, J. (2016). Access to and use of the Internet by veterans with serious mental illness. *Community Mental Health Journal*, *52*(2), 136-141. http://dx.doi.org/10.1007/s10597-015-9868-2

Rivard, E. J. (n.d.). *Story of Veteran Resilience Project*. Unpublished manuscript.

Robinson, K. A., Davis, W. E., Dinglas, V. D., Mendez-Tellez, P. A., Rabiee, A., Sukrithan, V., ... Needham, D. M. (2017). A systematic review finds limited data on measurement properties of instruments measuring outcomes in adult intensive care unit survivors. *Journal of Clinical Epidemiology*, *82*, 37-46. http://dx.doi.org/10.1016/j.jclinepi.2016.08.014

Roepke, A. M., & Seligman, M. E. (2015). Doors opening: A mechanism for growth after adversity. *The Journal of Positive Psychology*, *10*(2), 107-115. http://dx.doi.org/10.1080/17439760.2014.913669

Roots, R. K., & Li, L. C. (2013). Recruitment and retention of occupational therapists and physiotherapists in rural regions: A meta-synthesis. *BioMed Central Health Services Research*, *13*(1), 59. http://dx.doi.org/10.1186/1472-6963-13-59

Rosland, A. M., Nelson, K., Sun, H., Dolan, E. D., Maynard, C., Bryson, C., ... Schectman, G. (2013). The patient-centered medical home in the Veterans Health Administration. *American Journal of Managed Care*, *19*, e263-e272. Retrieved from http://coping.us/images/BM_2013_Impact_of_PCC_in_VA.pdf

Rossi, P. H., Lipsey, M. W., & Freeman, H. E. (2003). *Evaluation: A systematic approach*. London, England: Sage.

Rossler, W. (2012). Stress, burnout, and job dissatisfaction in mental health workers. *European Archives of Psychiatry and Clinical Neuroscience*, *262*(2), 65-69. http://dx.doi.org/10.1007/s00406-012-0353-4

Rousseau, P. F., El Khoury-Malhame, M., Reynaud, E., Boukezzi, S., Cancel, A., Zendjidjian, X., ... Khalfa, S. (2019). Fear extinction learning improvement in PTSD after EMDR therapy: An fMRI study. *European Journal of Psychotraumatology*, *10*(1), 1568132.

Russell, L. (2010). *Mental health services in primary care: Tackling the issues in the context of health care reform*. Retrieved from Center for American Progress: https://www.americanprogress.org/wp-content/uploads/issues/2010/10/pdf/mentalhealth.pdf

Ryan, O., Murphy, D., & Krom, L. (2012). *Vital signs: Taking the pulse of the addiction treatment workforce, a national report, version 1*. Retrieved from DocPlayer.net: https://docplayer.net/94641733-Vital-signs-taking-the-pulse-of-the-addiction-treatment-profession.html

Sackett, D. L., Rosenberg, W. M., Gray, J. M., Haynes, R. B., & Richardson, W. S. (1996). Evidence based medicine: What it is and what it isn't. *BMJ*, *312*, 71-72. Retrieved from https://www.ncbi.nlm.nih.gov/pmc/articles/PMC2349778/pdf/bmj00524-0009.pdf

Saitzyk, A. R., Harvey, S., Landes, A., Long, C., & Porter, R. (2017). Becoming and being: The journey of the woman warrior. In S. V. Bowles & P. T. Bartone (Eds.), *Handbook of military psychology* (pp. 399-314). New York, NY: Springer.

Salyers, M. P., Fukui, S., Rollins, A. L., Firmin, R., Gearhart, T., Noll, J. P., ... Davis, C. J. (2015). Burnout and self-reported quality of care in community mental health. *Administration and Policy in Mental Health and Mental Health Services Research*, *42*(1), 61-69. http://dx.doi.org/10.1007/s10488-014-0544-6

Sayer, N. A., Carlson, K. F., & Frazier, P. A. (2014). Reintegration challenges in US service members and veterans following combat deployment. *Social Issues and Policy Review*, *8*(1), 33-73. http://dx.doi.org/10.1111/sipr.12001

Sayer, N. A., Frazier, P., Orazem, R. J., Murdoch, M., Gravely, A., Carlson, K. F., ... Noorbaloochi, S. (2011). Military to civilian questionnaire: A measure of postdeployment community reintegration difficulty among veterans using Department of Veterans Affairs medical care. *Journal of Traumatic Stress*, *24*(6), 660-670. http://dx.doi.org/ 10.1002/jts.20706

Sayer, N. A., Friedmann-Sanchez, G., Spoont, M., Murdoch, M., Parker, L. E., Chiros, C., & Rosenheck, R. (2009). A qualitative study of determinants of PTSD treatment initiation in veterans. *Psychiatry: Interpersonal and Biological Processes*, *72*(3), 238-255.

Sayer, N. A., Hagel, E. M., Noorbaloochi, S., Spoont, M. R., Rosenheck, R. A., Griffin, J. M., ... Murdoch, M. (2014). Gender differences in VA disability status for PTSD over time. *Psychiatric Services*, *65*(5), 663-669. http://dx.doi.org/10.1176/appi.ps.201300017

Sayer, N. A., Noorbaloochi, S., Frazier, P., Carlson, K., Gravely, A., & Murdoch, M. (2010). Reintegration problems and treatment interests among Iraq and Afghanistan combat veterans receiving VA medical care. *Psychiatric Services*, *61*(6), 589-597.

Scheepers, E. M. (2014). *Psychotherapists' use of outcome measures in psychotherapy practice: Differences related to academic background* (Doctoral dissertation). Retrieved from https://pqdtopen.proquest.com/doc/1554346177.html?FMT=AI

Schnurr, P. P., Lunney, C. A., Bovin, M. J., & Marx, B. P. (2009). Posttraumatic stress disorder and quality of life: Extension of findings to veterans of the wars in Iraq and Afghanistan. *Clinical Psychology Review*, *29*(8), 727-735. http://dx.doi.org/10.1016/j.cpr.2009.08.006

Seal, K. H., Metzler, T. J., Gima, K. S., Bertenthal, D., Maguen, S., & Marmar, C. R. (2009). Trends and risk factors for mental health diagnoses among Iraq and Afghanistan veterans using Department of Veterans Affairs health care, 2002–2008. *American Journal of Public Health*, *99*(9), 1651-1658. http://dx.doi.org/10.2105/AJPH.2008.150284

Seligman, M. E. (1995). The effectiveness of psychotherapy: The Consumer Reports study. *American Psychologist*, *50*(12), 965.

Senter, A., Morgan, R. D., Serna-McDonald, C., & Bewley, M. (2010). Correctional psychologist burnout, job satisfaction, and life satisfaction. *Psychological Services*, *7*(3), 190. http://dx.doi.org/10.1037/a0020433

Shaffer, D. R. (2000). "I do not suppose that Uncle Sam looks at the skin": African Americans and the Civil War pension system, 1865-1934. *Civil War History*, *46*(2), 132-147. http://dx.doi.org/10.1353/cwh.2000.0049

Shakespeare-Finch, J., Martinek, E., Tedeschi, R. G., & Calhoun, L. G. (2013). A qualitative approach to assessing the validity of the Posttraumatic Growth Inventory. *Journal of Loss and Trauma*, *18*(6), 572-591. http://dx.doi.org/10.1080/15325024.2012.734207

Shapiro, F., & Maxfield, L. (2002). Eye movement desensitization and reprocessing (EMDR): Information processing in the treatment of trauma. *Journal of Clinical Psychology*, *58*(8), 933-946. http://dx.doi.org/10.1002/jclp.10068

Shapiro, F., & Maxfield, L. (2003). Development and global implications. In *Healing trauma: Attachment, mind, body and brain* (pp. 196-220). New York, NY: W. W. Norton and Company.

Sharpless, B. A., & Barber, J. P. (2011). A clinician's guide to PTSD treatments for returning veterans. *Professional Psychology: Research and Practice*, *42*(1), 8. http://dx.doi.org/10.1037/a0022351

Shepardson, R. L., Tapio, J., & Funderburk, J. S. (2017). Self-management strategies for stress and anxiety used by nontreatment seeking veteran primary care patients. *Military Medicine*, *182*(7), e1747-e1754. http://dx.doi.org/10.7205/MILMED-D-16-00378

Sherman, M. D., Kauth, M. R., Shipherd, J. C., & Street, Jr., R. L. (2014). Communication between VA providers and sexual and gender minority veterans: A pilot study. *Psychological Services*, *11*(2), 235. http://dx.doi.org/10.1037/a0035840

Shimokawa, K., Lambert, M. J., & Smart, D. W. (2010). Enhancing treatment outcome of patients at risk of treatment failure: Meta-analytic and mega-analytic review of a psychotherapy quality assurance system. *Journal of Consulting and Clinical Psychology*, *78*(3), 298. http://dx.doi.org/10.1037/a0019247

Simmons, L. (2014). Profiting from punishment: Public education and the school security market. *Social Justice*, *41*(138), 81-95.

Simmons, M. M., Fincke, B. G., Drainoni, M., Kim, B., Byrne, T., Smelson, D., ... Mcinnes, D. K. (2017). A two-state comparative implementation of peer-support intervention to link veterans to health-related services after incarceration: A study protocol. *BioMed Central Health Services Research*, *17*(1), 1-10. http://dx.doi.org/10.1186/s12913-017-2572-x

Smith, D., Pols, R., Lavis, T., Battersby, M., & Harvey, P. (2016). Experiences and perceptions of problem gamblers on cognitive and exposure therapist when taking part in a randomized controlled trial: A qualitative study. *Journal of Gambling Studies*, *32*(4), 1243-1260. http://dx.doi.org/10.1007/s10899-015-9589-z

Sorenson, C., Bolick, B., Wright, K., & Hamilton, R. (2016). Understanding compassion fatigue in healthcare providers: A review of current literature. *Journal of Nursing Scholarship*, *48*(5), 456-465. http://dx.doi.org/10.1111/jnu.12229

Spelman, J. F., Hunt, S. C., Seal, K. H., & Burgo-Black, A. L. (2012). Post deployment care for returning combat veterans. *Journal of General Internal Medicine*, *27*(9), 1200-1209. http://dx.doi.org/10.1007/s11606-012-2061-1

Spoont, M. R., Sayer, N. A., Kehle-Forbes, S. M., Meis, L. A., & Nelson, D. B. (2016). A prospective study of racial and ethnic variation in VA psychotherapy services for PTSD. *Psychiatric Services*, *68*(3), 231-237. http://dx.doi.org/10.1176/appi.ps.201600086

Stamoulos, C., Reyes, A., Trepanier, L., & Drapeau, M. (2014). The methodological quality of clinical practice guidelines in psychology: A pilot study of the guidelines developed by the Ordere des Psychologues du Quebec. *Canadian Psychology/Psychologie Canadienne*, *53*(3), 177. http://dx.doi.org/10.1037/a0037287

Steel, C., Macdonald, J., Schroder, T., & Mellor-Clark, J. (2015). Exhausted but not cynical: Burnout in therapists working within improving access to psychological therapy services. *Journal of Mental Health*, *24*(1), 33-37. http://dx.doi.org/10.3109/09638237.2014.971145

Steenkamp, M. M., Litz, B. T., Hoge, C. W., & Marmar, C. R. (2015). Psychotherapy for military-related PTSD: A review of randomized clinical trials. *Journal of the American Medical Association*, *314*(5), 489-500. http://dx.doi.org/10.1001/jama.2015.8370

Substance Abuse and Mental Health Services Administration. (2014). Results from the 2013 national survey on drug use and health: Mental health findings. Retrieved from https://store.samhsa.gov/system/files/nsduhmhfr2013.pdf

Suhrcke, M., & Urban, D. M. (2006). Are cardiovascular diseases bad for economic growth? *ECONSTOR*. Retrieved from https://www.econstor.eu/bitstream/10419/25890/1/521197805.PDF

Suhrcke, M., Fahey, D. K., & McKee, M. (2008). Economic aspects of chronic disease and chronic disease management. *Caring for people with chronic conditions*, *43*. Retrieved from https://www.researchgate.net/profile/Anna_Dixon/publication/254887028_Supporting_self-management/links/564a3ffb08ae44e7a28da296.pdf#page=66

Suhrcke, M., McKee, M., Arce, R. S., Tsolova, S., & Mortensen, J. (2006). Investment in health could be good for Europe's economies. *BMJ*, *333*(7576), 1017-1019. http://dx.doi.org/10.1136/bmj.38951.614144.68

Sutton, K., Maybery, D., & Moore, T. (2011). Creating a sustainable and effective mental health workforce for Gippsland, Victoria: Solutions and directions for strategic planning. *Rural Remote Health*, *11*(1), 1585.

Szymendera, S. D. (2016). Who is a "veteran"?- Basic eligibility for veterans' benefits. Retrieved from https://fas.org/sgp/crs/misc/R42324.pdf

Taku, K., Calhoun, L. G., Cann, A., & Tedeschi, R. G. (2008). The role of rumination in the coexistence of distress and posttraumatic growth among bereaved Japanese university students. *Death Studies*, *32*(5), 428-444. http://dx.doi.org/10.1080/07481180801974745

Tanielian, T., & Jaycox, L. H. (2008). *Invisible wounds: Mental health and cognitive care needs of America's returning veterans*. [RAND Corporation]. Retrieved from https://www.rand.org/pubs/monographs/MG720.html

Tanielian, T., Batka, C., & Meredith, L. S. (2017). *Bridging gaps in mental health care*. [RAND Corporation]. Retrieved from https://www.rand.org/pubs/research_reports/RR2030.html

Taylor, A. W., Pilkington, R., Montgomerie, A., & Feist, H. (2016). The role of business size in assessing the uptake of health promoting workplace initiatives in Australia. *BioMed Central Public Health*, *16*(1), 353. http://dx.doi.org/10.1186/s12889-016-3011-3

Tedeschi, R. G., & Calhoun, L. G. (1996). The Posttraumatic Growth Inventory: measuring the positive legacy of trauma. *Journal of Traumatic Stress*, *9*(3), 455-471. Retrieved from https://sites.uncc.edu/ptgi/wp-content/uploads/sites/9/2015/01/The-Posttraumatic-Growth-Inventory-Measuring-the-positive-legacy-of-trauma.pdf

Tejani, N., Rosenheck, R., Tsai, J., Kasprow, W., & McGuire, J. F. (2014). Incarceration histories of homeless veterans and progression through a national supported housing program. *Community Mental Health Journal*, *50*(5), 514-519. http://dx.doi.org/10.1007/s10597-013-9611-9

Thaul, S. (2012). *How FDA approves drugs and regulates their safety and effectiveness* (R41983). Washington, DC: Government Printing Office.

The Office of the National Coordinator for Health Information Technology. (n.d.). *Federal health IT strategic plan: 2015-2020*. Retrieved from https://www.healthit.gov/sites/default/files/9-5-federalhealthitstratplanfinal_0.pdf

The Society for a Science of Clinical Psychology. (n.d.). The lasting benefits of cognitive-behavior therapy. Retrieved from http://www.sscpweb.org/Media-Posts/3153768

Theodoroff, S. M., Lewis, M. S., Folmer, R. L., Henry, J. A., & Carlson, K. F. (2015). Hearing impairment and tinnitus: prevalence, risk factors, and outcomes in US service members and veterans deployed to the Iraq and Afghanistan wars. *Epidemiologic Reviews*, *37*(1), 71-85. http://dx.doi.org/10.1093/epirev/mxu005

Thomas, J. L., Wilk, J. E., Riviere, L. A., McGurk, D., Castro, C. A., & Hoge, C. W. (2010). Prevalence of mental health problems and functional impairment among active component and National Guard soldiers 3 and 12 months following combat in Iraq. *Archives of General Psychiatry*, *67*(6), 614-623.

Thomas, K. C., Ellis, A. R., Konrad, T. R., & Morrissey, J. P. (2012). North Carolina's mental health workforce. *North Carolina Medical Journal*, *73*(3), 161-168.

Thomas, K. H., Haring, E. L., McDaniel, J., Fletcher, K. L., & Albright, D. L. (2017). Belonging and support: Women veterans' perceptions of veteran service organizations. *Journal of Veterans Studies*, *2*(2), 2-12.

Ticineto Clough, P. (2009). The new empiricism: Affect and sociological method. *European Journal of Social Theory*, *12*(1), 43-61. http://dx.doi.org/10.1177/1368431008099643

Tolin, D. F., Forman, E. M., Klonsky, E. D., McKay, D., & Thombs, B. D. (2015). Guidelines for identifying empirically supported treatments: Practical recommendations for clinical researchers and reviewers. *The Clinical Psychologist*, *68*(3), 16-21.

Torreon, B. S. (2015). *U.S. periods of war and dates of recent conflicts* (RS21405). Washington, DC: Government Printing Office.

Trauma Recovery. (2017). About us. Retrieved from https://www.emdrhap.org/content/about-hap/

TRICARE. (2016). *TRICARE stateside guide*. [TRICARE Publications]. Retrieved from https://www.tricare.mil/Publications

True, G., Rigg, K. K., & Butler, A. (2015). Understanding barriers to mental health care for recent war veterans through photovoice. *Qualitative Health Research*, *25*(10), 1443-1455. http://dx.doi.org/10.1177/1049732314562894

Tsai, J., & Rosenheck, R. A. (2012). Use of the internet and an online personal health record system by US veterans: Comparison of Veterans Affairs mental health service users and other veterans nationally. *Journal of the American Medical Informatics Association*, *19*(6), 1089-1094. http://dx.doi.org/10.1136/amiajnl-2012-000971

Tsai, J., Kasprow, W. J., Kane, V., & Rosenheck, R. A. (2014). Street outreach and other forms of engagement with literally homeless veterans. *Journal of Health Care for the Poor and Underserved*, *25*(2), 694-704. http://dx.doi.org/10.1353/hpu.2014.0087

Tsai, J., Whealin, J. M., & Pietrzak, R. H. (2014). Asian American and Pacific Islander military veterans in the United States: Health service use and perceived barriers to mental health services. *American Journal of Public Health*, *104*(S4), S538-S547. http://dx.doi.org/10.2105/AJPH.2014.302124

U.S. Census Bureau. (2016). American Community Survey 1-year estimates, Minnesota. Retrieved from https://factfinder.census.gov/faces/nav/jsf/pages/index.xhtml

U.S. Census Bureau. (2017). Veterans day 2017: Nov. 11. Retrieved from https://www.census.gov/newsroom/facts-for-features/2017/veterans-day.html

U.S. Department of Veterans Affairs National Center for Veterans Analysis and Statistics. (2017). Profile of veterans: 2015 data from the American Community Survey. Retrieved from https://www.va.gov/vetdata/docs/SpecialReports/Profile_of_Veterans_2015.pdf

U.S. Department of Veterans Affairs, National Center for PTSD. (2016). Fiscal year 2016 annual report: National Center for PTSD. Retrieved from https://webcache.googleusercontent.com/search?q=cache:X_NxC_DzfNQJ:https://www.ptsd.va.gov/public/ptsd-overview/basics/how-common-is-ptsd.asp+&cd=1&hl=en&ct=clnk&gl=us

U.S. Department of Veterans Affairs. (2009). Veterans organizations' priorities for the 111th congress, Hearing before the Committee on veteran' affairs, United states senate one hundred eleventh congress first session, January 28, 2009 . Retrieved from https://www.gpo.gov/fdsys/pkg/CHRG-111shrg47120/html/CHRG-111shrg47120.htm%20-during

U.S. Department of Veterans Affairs. (2013). MIRECC/CoE. Retrieved from https://www.mirecc.va.gov

U.S. Department of Veterans Affairs. (2014). *Description of organization, structure, missions, functions, tasks, and authorities* [Functional Organization Manual]. Retrieved from https://www.va.gov/ofcadmin/docs/VA_Functional_Organization_Manual_Version_2.0a.pdf

U.S. Department of Veterans Affairs. (2016). Patient aligned care team (PACT). Retrieved from https://www.patientcare.va.gov/primarycare/PACT.asp

U.S. Department of Veterans Affairs. (2017). Veteran's administration: Agency financial report fiscal year 2017. Retrieved from https://www.va.gov/oig/publications/report-summary.asp

U.S. Department of Veterans Affairs. (2018). *Profile of post 9/11 veterans: 2016* [Special report]. Retrieved from https://www.va.gov/vetdata/docs/SpecialReports/Profile_of_Veterans_2016.pdf

U.S. Department of Veterans Affairs. (2018a). *Military sexual trauma (MST) program* (VHA Directive 1115). Washington, DC: Government Printing Office.

U.S. Department of Veterans Affairs. (n.d.). About VHA. Retrieved from https://www.va.gov/health/aboutvha.asp#top

U.S. Department of Veterans Affairs. (n.d.). Center for women veterans (CWV). Retrieved from https://www.va.gov/womenvet/resources/faq09.asp

U.S. Department of Veterans Affairs. (n.d.). https://www.va.gov

U.S. Department of Veterans Affairs. (n.d.). Office of rural health. Retrieved from https://www.ruralhealth.va.gov

U.S. General Accounting Office. (1992). *DoD's policy on homosexuality* (146980). Washington, DC: Government Printing Office.

U.S. National Archives and Records Administration. (n.d.). DD form 214, discharge papers and separation documents. Retrieved from https://www.archives.gov/personnel-records-center/dd-214

Uniformed Services Academy of Family Physicians. (2013). *Military health system patient centered medical home guide* [Informational guide]. Retrieved from http://www.usafp.org/wp-content/uploads/2013/12/MHSPCMHGuide.pdf

United States Government Accountability Office. (2009). *Preliminary findings on VA's provision of health care services to women veterans* (GAO-09-884T). Washington, DC: Government Printing Office.

VA/Department of Defense. (2017). Management of posttraumatic stress. Retrieved from https://www.healthquality.va.gov/guidelines/MH/ptsd/VADoDPTSDCPGFinal012418.pdf

van den Berg, T., Heymans, M. W., Leone, S. S., Vergouw, D., Hayden, J. A., Verhagen, A. P., & de Vet, H. C. (2013). Overview of data-synthesis in systematic reviews of studies on outcome prediction models. *BioMed Central Medical Research Methodology*, *13*(42). http://dx.doi.org/10.1186/1471-2288-13-42.

Verhaeghe, M., & Bracke, P. (2012). Associative stigma among mental health professionals: Implications for professional and service user well-being. *Journal of Health and Social Behavior*, *53*(1), 17-32. http://dx.doi.org/10.1177/0022146512439453

Vermetten, E., Meijer, L., van der Wurff, P., & Mert, A. (2013). The effect of military motion-assisted memory desensitization and reprocessing treatment on the symptoms of combat-related post traumatic stress disorder: First preliminary results. *Annual Review of Cybertherapy and Telemedicine*, *191*, 125-127.

Veterans Benefits Administration. (2015). Annual benefits report, fiscal year 2014. Retrieved from https://www.benefits.va.gov/REPORTS/abr/ABR-Combined-FY14-11052015.pdf

Veterans Health Administration. (n.d.). One in ten older vets is depressed. Retrieved from http://www.va.gov/health/NewsFeatures/20110624a.asp

Veterans Health Initiatives. (n.d.). Caring for war wounded. Retrieved from https://www.publichealth.va.gov/docs/vhi/oef_oif.pdf

Veterans Integrated Service Networks. (2012). Behavioral and mental health services in interdisciplinary care at the Department of Veterans Affairs. Retrieved from https://contextualscience.org/files/Bxal%20and%20Mental%20Health.Zeiss_.ppt

Volpe, R. L., Mohammed, S., Hopkins, M., Shapiro, D., & Dellasega, C. (2014). The negative impact of organizational cynicism on physicians and nurses. *The Health Care Manager*, *33*(4), 276. http://dx.doi.org/10.1097/HCM.0000000000000026

Wampold, B. E. (2015). Routine outcome monitoring: Coming of age - with the usual developmental challenges. *Psychotherapy*, *52*(4), 458-462. http://dx.doi.org/10.1037/pst0000037

Wampold, B. E., & Bhati, K. S. (2004). Attending to the omissions: A historical examination of evidence-based practice movements. *Professional Psychology: Research and Practice*, *35*(6), 563. http://dx.doi.org/10.1037/0735-7028.35.6.563

Wampold, B. E., Mondin, G. W., Moody, M., Stich, F., Benson, K., & Ahn, H. N. (1997). A meta-analysis of outcome studies comparing bona fide psychotherapies: Empirically, "all must have prizes". *Psychological Bulletin*, *122*(3), 203. http://dx.doi.org/10.1037//0033-2909.122.3.203

Watanabe-Galloway, S., Madison, L., Watkins, K. L., Nguyen, A. T., & Chen, L. W. (2015). Recruitment and retention of mental health care providers in rural Nebraska: Perceptions of providers and administrators. *Rural & Remote Health*, *15*(4).

Watkins, L. E., Sprang, K. R., & Rothbaum, B. (2018). Treating PTSD: A review of evidence-based psychotherapy interventions. *Frontiers in Behavioral Neuroscience*, *12*, 258. Retrieved from https://www.frontiersin.org/articles/10.3389/fnbeh.2018.00258/full

Weathers, F. W., Litz, B. T., Herman, D. S., Huska, J. A., & Keane, T. M. (1993, October). *The PTSD Checklist (PCL): Reliability, validity, and diagnostic utility*. Paper presented at the Annual Convention of the International Society for Traumatic Stress Studies, San Antonio, TX.

Webb, T. L., Chang, B. P., & Benn, Y. (2013). "The ostrich problem": Motivated avoidance or rejection of information about goal progress. *Social and Personality Psychology Compass*, *7*(11), 794-807. http://dx.doi.org/10.1111/spc3.12071

Wells, T. S., LeardMann, C. A., Fortuna, S. O., Smith, B., Smith, T. C., Ryan, M. A., ... Blazer, D. (2010). A prospective study of depression following combat deployment in support of the wars in Iraq and Afghanistan. *American Journal of Public Health*, *100*(1), 90-99. http://dx.doi.org/10.2105/AJPH.2008.155432

Wells, T. S., Miller, S. C., Adler, A. B., Engel, C. C., Smith, T. C., & Fairbank, J. A. (2011). Mental health impact of the Iraq and Afghanistan conflicts: A review of US research, service provision, and programmatic responses. *International Review of Psychiatry*, *23*(2), 144-152. http://dx.doi.org/10.3109/09540261.2011.558833

Went, H. (2016). *Working with trauma: Perceived competence and burnout in mental health staff* (Master's thesis, Bangor University). Retrieved from http://e.bangor.ac.uk/9768/1/West%20thesis%202016.pdf

Wheeler, K., & Delaney, K. (2008). Challenges and realities of teaching psychotherapy: A survey of psychiatric-mental health nursing graduate programs. *Perspectives in Psychiatric Care*, *44*(2), 72-80. http://dx.doi.org/10.1111/j.1744-6163.2008.00156.x

Wheeler, K., & Haber, J. (2004). Development of psychiatric-mental health nurse practitioner competencies: Opportunities for the 21st century. *Journal of the American Psychiatric Nurses Association*, *10*(3), 129-138. http://dx.doi.org/10.1177/1078390304266218

Wilkins, K. C., Lang, A. J., & Norman, S. B. (2011). Synthesis of the psychometric properties of the PTSD Checklist (PCL) military, civilian, and specific versions. *Depression and Anxiety*, *28*(7), 596-606. http://dx.doi.org/10.1002/da.20837

Wilks, C. M., Browne, M. O., & Jenner, B. L. (2008). Attracting psychiatrists to a rural area - 10 years on. *Remote & Rural Health*, *8*(1).

Williamson, R. B. (2009). *Preliminary findings on VA's provision of health care services to women veterans* (GAO-09-899). Washington, DC: Government Printing Office.

Wittes, J., & Downs, M. (2009). Outcome measures to assess efficacy of treatments for age-related macular degeneration. *Ophthalmology*, *116*(10). http://dx.doi.org/10.1016/j.ophtha.2009.06.050

Wood, E., Ricketts, T., & Parry, G. (2018). EMDR as a treatment for long-term depression: A feasibility study. *Psychology and Psychotherapy: Theory, Research and Practice*, *91*(1), 63-78. http://dx.doi.org/10.1111/papt.12145

World Health Organization. (2013). WHO guidelines on conditions specifically related to stress. Retrieved from https://apps.who.int/iris/bitstream/handle/10665/85119/9789241505406_eng.pdf?sequence=1

Appendix A: Supplemental Material and Footnotes

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Item a. The Vietnam War is presently America's longest conflict, taking place from November 1, 1965 until January 27, 1973 with the signing of the Agreement on Ending the War and Restoring Peace in Vietnam, although the fall of Saigon occurred on April 30, 1975 and marked a significant milestone. However, some feel that the War in Afghanistan was a longer U.S. engagement if hostilities are viewed in two phases: The first from December 23, 1986 to April 4, 1988 and the second from October 7, 2001 until the present.

Item b. For this discussion, the all-inclusive term veteran(s) will be a stand-in for Armed Forces personnel. In contrast to service members, who have a current U.S. military contract, veterans are those who have served in the military in the past. It will refer not only to those who have separated from their respective components of the military services. This expression will also include soldiers, sailors, marines, and airmen as well as the Commissioned Corps of the National Oceanic and Atmospheric Administration (NOAA) and the Commissioned Corps of the Public Health Service of all states as well as Guam, Puerto Rico, the District of Columbia, and the Virgin Islands. Additionally, the term will also include those on active duty, active duty National Guard/Reserve in those same components, and those who have deployed in support of combat operations (National Guard units, in contrast to reserve units which are commanded exclusively by the federal government, are overseen by both state and federal governments). However, distinctions among subsets of veterans will also be used to highlight various points of contrast (U.S. Department of Veterans Affairs, 2016).

Item c. An assessment of social need is a program evaluation term for critiquing the program theory in relation to the perspective of the population in demand, which is that part of the population both needing and agreeing to participate in the program.

Item d. Continued to this day (TBD) refers to a period of conflict in which Congress has not yet officially decided on the end year or where the involvement of military forces by the U.S. have formally ended (LeMire & Mulvihill, 2017; Torreon, 2012).

Item e. The National Guard is a joint activity of the United States Department of Defense (DoD) composed of reserve components of the United States Army and the United States Air Force: The Army National Guard of the United States and the Air National Guard of the United States correspondingly. The U.S. president commands National Guard personnel when deployed on federal missions (e.g., combat zones or deployment in states by presidential order). However, the respective state government, which shares political power over the National Guard with the federal government, only governs command of guard personnel in operations inside their states (e.g., disaster response to natural catastrophe).

Item f. Research for the first evaluation question will focus on veterans' initial engagement as recipients of recruitment. If a paucity of research studies is found on the effectiveness of recruitment for veterans to engage in treatment, then the scope of the literature review will be expanded to examine adult outpatient treatment clinics in general.

Item g. An Institutional Review Board (IRB) is an ethical research body which reviews proposed research to determine whether it meets the ethical standard of Title 45 Code of Federal Regulations, Part 46 and as such are regulated by the Office for Human Research Protections (OHRP) a component of the Department of Health and Human Services (HHS).

Item h. The Diagnostic and Statistical Manual of Mental Disorders is an authoritative taxonomic and diagnostic volume published by the American Psychiatric Association (APA) for the fields of psychiatry and psychology which define and classify mental disorders, to improve diagnoses, treatment, and research. In 2013 an updated version of the manual known as the Diagnostic and Statistical Manual of Mental Disorders, Fifth Edition (DSM-5™) was issued (APA, 2017).

Item i. The American Psychiatric Association is an organization of psychiatrists working together to ensure humane care and effective treatment for all persons with mental illness, including substance use disorders. It is the voice and conscience of modern psychiatry. Its vision is a society that has available, accessible quality psychiatric diagnosis

and treatment (APA, 2017).

Item j. The US Department of Veterans Affairs provides patient care and federal benefits to veterans and their dependents (VA, 2017).

Item k. The National Academy of Medicine (NAM) is a non-governmental organization bestowing information about research, treatment, and lifestyle around medicine and mental health to the U.S. population as a whole. In a press release dated April 28, 2015, the Institute of Medicine (IOM) redesignated themselves the National Academy of Medicine (NAM, 2017).

Item l. The U.S. Government Accountability Office (GAO) is an independent, nonpartisan, nonideological fact-finding agency that works for the U.S. Congress. GAO supports this superior governmental body in ensuring that it meets its constitutional responsibilities, aids in improving its performance, and ensures the accountability of the federal government for the benefit of the American people (GAO, 2017).

Item m. The mission of the Department of Defense is to provide the military forces needed to deter war and to protect the security of our country (DoD, 2017).

Item n. The National Council for Behavioral Health is a 501(c)(3) association that advocates for policies which ensure that organizations that deliver mental health and addictions treatment and services (National Council for Behavioral Health, 2017)

Item o. The RAND Corporation is a non-partisan research NPO which develops answers to global public policy questions (RAND, 2017).

Item p. The Mental Health Advisory Teams (MHAT) conducts comprehensive mental health investigations of U.S. service members in combat environments.

Item q. Population at risk is a program evaluation term for individuals with a significant risk of developing the disorder.

Item r. The primary mission of the Military Health Services System (MHSS), which encompasses the Defense Department's hospitals, clinics, and medical personnel, is to maintain the health of military personnel so they can carry out their military missions, and to be prepared to deliver health care during wartime. The military medical system also provides, where space is available, health care services in Department of Defense (DOD) medical facilities to dependents of active duty service members and to retirees and their dependents.

Item s. The Veterans Health Administration is the largest integrated health care system in the United States, providing care at 1,243 health care facilities, including 170 VA Medical Centers and 1,063 outpatient sites of care of varying complexity (VHA outpatient clinics), serving more than 9 million enrolled Veterans each year (VA, 2017).

Item t. Telemental health (TMH) is a platform for videoconferencing therapies and is available on digital telephone lines (ISDN) or over a local area network (LAN), wide area network (WAN), or broadband Internet connection and is accessible through a computer or mobile device (Luxton, Nelson, & Maheu, 2016).

Item u. The National Archives and Records Administration (NARA) is the nation's record keeper. Of all documents and materials created in the course of business conducted by the United States Federal government (NARA, 2017).

Item v. The Veterans Integrated Service Networks (VISN) are the 21 areas which comprise the Veteran Health Administration (VA, 2017).

Item w. The Mental Illness Research, Education and Clinical Centers (MIRECC) were established by Congress to research the causes and treatments of mental disorders. MIRECC put this research into routine clinical at the VA (MIRECC, 2017).

Item x. The Office of Rural Health (ORH) is an office within the Veterans Health Administration (VHA). ORH is mandated with increasing care to the 3 million veterans who in rural communities and rely on VHA for health care (ORH, 2017).

Item y. The National Center for PTSD (NCPTSD) is a program within the U.S. Department of Veterans Affairs. Their mandate is to use science to progress prevention and treatment of traumatic stress disorders within the U.S. military. NCPTSD consists of seven divisions dispersed across the country which include an Executive division, along with Behavioral Science, Clinical Neuroscience, Dissemination & Training, Evaluation, and Women's Health Sciences (NCPTSD, 2017).

Item z. IHS Markit Ltd. (INFO, Information Handling Services Markit) supports business and government entities worldwide in decision-making processes through market information, research, and analysis to address strategic and operational issues (IHS Markit, 2017).

Item aa. The National Alliance on Mental Illness (NAMI) indicates that it is nation's largest grassroots mental health organization and as such is dedicated to advocating, provide referral, and educating the American public about mental illness (NAMI, 2017).

Item ab. Minneapolis, MN, Veterans Affairs Medical Center (Minneapolis VAMC) is teaching hospital within the Veterans Affairs (VA) Health Care System which provides a full-range of patient care (VA, 2017).

Item ac. Trauma Recovery, EMDR Humanitarian Assistance Programs (Trauma Recovery/HAP) is a 501(c) (3) Focused on increasing the capacity for effective treatment of psychological trauma in under-served communities throughout the U.S. and internationally. Trauma Recovery/HAP achieve their goal by developing and training local Trauma Recovery Network (TRN) chapters in the areas they wish to operate (Trauma Recovery/HAP, 2017)

Item ad. The Veteran Justice Corps is a partnership between the Council on Crime and Justice and the Corporation for National and Community Service designed to address the lack of service for our veterans at risk of involvement with the criminal justice system.

Item ae. The McCormick Foundation is a Chicago-based nonprofit charitable trust established in 1955, following the death of "Colonel" Robert R. McCormick of the McCormick family.

Item af. Population at need is a program evaluation term for the individuals with the disorder which the program wants to support.

Item ag. A Peer Specialist is a military associated person (pass or present) who is actively engaged in recovery, and volunteers or is hired to provide peer support services to others engaged in mental health treatment. In addition, Peer Support Apprentices are available. They meet all of the requirements of Peer Support Specialists, except they are not certified. This means Peer Support Apprentices also have a mental health and/or co-occurring condition, and have real-world experience in helping others deal with their issues.

Item ah. The Bonus March took place July 28th, 1932, when approximately twenty thousand World War I veterans, including many with their accompanying descended on Washington, D.C., to lobby Congress for immediate payment on their adjusted service certificates. These certificates are commonly referred to as the Bonus.

Figure A1: Footnotes for Chapter I in order of appearance

Item a. Consolidated Framework for Implementation Research (CFIR) defines *cosmopolitanism* as the degree to which an organization networks with other external organizations. Organizations that support and promote external boundary-spanning roles of their staff are more likely to implement new practices quickly. The shared network of relationships between individuals in an organization represents the social capital of the organization. Social capital is one term used to describe the quality and the extent of those relationships and includes dimensions of shared vision and information sharing. One component of social capital is external bridging between people or groups outside the organization. Nevertheless, there is a negative relationship between cosmopolitanism and implementation until clear advantages of the intervention become apparent. However, the relationship is positive once the innovation is accepted as the norm by others in a formal or informal network.

Item b. The *National Center for Veterans Analysis and Statistics (NCVAS)* carries out statistical investigations and research on a broad range of veteran-related topics. Additionally, the center falls under VA control and engages in interagency collaborations with other Federal agencies to support planning and decision-making activities surrounding veterans' issues.

Item c. The *Bureau of Justice Statistics (BJS)* is a component of the Office of Justice Programs in the U.S. Department of Justice (DOJ). This section of the Office of Justice Programs was first established on December 27, 1979 under the Justice Systems Improvement Act of 1979, Public Law 96-157 (the 1979 Amendment to the Omnibus Crime Control and Safe Streets Act of 1968, Public Law 90-351) with its mission being the collection, analyzation, publication, and dissemination of information on crime, criminal offenders, victims of crime, and the operation of justice systems at all levels of government. According to the Bureau, their mission is critical to federal, state, and local policymakers in combating crime and ensuring that justice is both efficient and evenhanded.

Item d. The *National Health Care for the Homeless Council (HCH)*, was established in 1986, and is a network of more than 10,000 doctors, nurses, social workers, patients, and advocates who share the mission to eliminate homelessness. The HCH provides support to more than 200 public health centers and Health Care for the Homeless programs in all 50 states.

Item e. The *Student Veterans of America (SVA)* is a 501(c)(3) coalition of student-veteran groups on college campuses across the globe; providing military veterans with the resources, support, and advocacy needed to succeed in higher education and following graduation.

Item f. The *National Veteran Education Success Tracker (NVEST)* is a research partnership between Student Veterans of America *(SVA)*, the Department of Veterans Affairs (VA), and the National Student Clearinghouse (a national resource for education verification and student outcomes research). The project is the first comprehensive in-depth study of the academic success of the modern student veteran using the Post-9/11 GI Bill.

Item g. *The American Council on Education (ACE),* founded in 1918, is a higher education association. The association, based in Washington, DC, consists of approximately 1,800 accredited, degree-granting colleges, universities, and higher education-related institutions. The Council implements public policy advocacy, leadership development, research, and other initiatives to support higher education.

Item h. The *World Health Organization (WHO)* came into existence in 1948, with their primary role being to direct and coordinate international health support within the United Nations system.

Item i. D'Souza, Egan, and Rees (2011) describe perfectionism as a transdiagnostic factor that is linked to numerous psychological disorders. They measured the factors composing perfectionism using the Multidimensional Perfectionism Scales (FMPS) and the Hewitt Multidimensional Perfectionism Scale (HMPS). FMPS consists of six subscales: Personal Standards (PS), Concern over Mistakes (CM), Parental Expectations (PE); Parental Criticism (PC), Doubts about Actions (DA) and Organization (O). Whereas the HMPS consists of three subscales: self-oriented perfectionism, socially-prescribed perfectionism, and other-oriented perfectionism.

Item j. The *National Institute of Mental Health (NIMH)* is the largest scientific organization in the world dedicated to research focused on the understanding, treatment, and prevention of mental disorders and the promotion of mental health (NIMH, 2018).

Item k. The *Decade of the Brain* (1990 thru 1999) was sponsored by the Library of Congress and the National Institute of Mental Health of the National Institutes of Health interagency initiative to advance the goals set forth in a proclamation by President George Bush "to enhance public awareness of the benefits to be derived from brain research" through "appropriate programs, ceremonies, and activities." As such, a variety of activities including publications and programs aimed at introducing Members of Congress, their staffs, and the general public to cutting-edge research on the brain and encouraging public dialogue on the ethical, philosophical, and humanistic implications of these emerging discoveries (LOC, 2000).

Item l. *Health Professional Shortage Areas (HPSAs) are* appointed by the Health Resources and Services Administration (HRSA; an agency of the U.S. Department of Health and Human Services, is the primary federal agency for improving health care to people who are geographically isolated, economically or medically vulnerable.) as having shortages of primary care, dental care, or mental health providers and may be geographic (a county or service area), population (e.g., low income or Medicaid eligible) or facilities (e.g., federally qualified health centers, or state or federal prisons) (HHS, 2017).

Item m. Lightner Witmer was a psychologist at the University of Pennsylvania and is widely recognized as the founder of clinical psychology and the founder of the first psychological clinic at the university in 1896 (Al-Suqri, 2018; McReynolds, 1997).

Item n. Efficacy refers to evidence of treatment effects obtained in controlled research, whereas effectiveness refers to evidence of treatment effects as evaluated in the real world (Lee & Hunsley, 2015).

Item o. Clinical practice guidelines (CPGs)are frequently defined as "systematically developed statements to assist practitioners and patient decisions about appropriate health care for specific clinical circumstances" (Stamoulos et. al., 2014).

Item p. Psychotherapy integration is an approach to treatment that goes beyond any single theory or set of techniques (Stricker & Gold, 1996).

Item q. The *Advisory Committee on Interdisciplinary, Community-Based Linkages (ACICBL)* was created by Congress to provide advice and recommendations to the Secretary of the Department of Health and Human Services concerning policy and program development and other matters of significance related to activities under Part D, Title VII of the PHS Act, as amended by the Affordable Care Act. ACICBL focuses on the targeted program areas and/or disciplines of Area Health Education Centers, Geriatrics, Allied Health, Chiropractic, Podiatric Medicine, Social Work, Graduate Psychology, and Rural Health.

Item r. As per APA, in an effort to reduce bias in language, the term *gender and sexuality minorities* is used to describe those who identify within the LGBTQ+ community. Further the "+" is meant to represent other populations who are not directly mentioned by the labels provided within the LGBTQ abbreviation (i.e., individuals who identify as asexual, individuals who identify as nonbinary, etc.) This term is meant to be inclusive of individuals who identify within a current-minority based on their gender or sexual orientation, with the recognition that each of these occur along a spectrum and cannot be fully captured in a categorical model.

Figure A2: Footnotes for Chapter II in order of appearance

Item a. A *logic model* is an articulated model of how a program is understood or intended to contribute to its specified outcomes therein focusing on immediate, intermediate, and/or long-term outcomes rather than tightly specified processes for illustrative purposes.

Item b. *The Health Insurance Portability and Accountability Act of 1996 (HIPAA)* required the Secretary of the U.S. Department of Health and Human Services (HHS) to develop regulations protecting the privacy and security of specific health information. To fulfill this requirement, HHS published what is commonly known as the HIPAA Privacy Rule and the HIPAA Security Rule. The Privacy Rule, or Standards for Privacy of Individually Identifiable Health Information, establishes national standards for the protection of specific health information. The Security Standards for the Protection of Electronic Protected Health Information (the Security Rule) establish a national set of security standards for protecting certain health information that is held or transferred in electronic form.

Item c. *Institutional Review Boards (IRB)* oversee university policy to reasonably ensure that the rights and welfare of human participants are adequately protected in research conducted under its auspices. In addition, both federal and state laws require this protection. For the university to fulfill its responsibility, all human participants research conducted under University auspices must receive appropriate review and approval.

Figure A3: Footnotes for Chapter III in order of appearance

Item a. *Military OneSource* is a military resource website providing 24/7 support resources anywhere in the world at no cost to active-duty service members, National Guard and Reserves, recently separated service members, military families and survivors.

Item b. A *battle buddy* is a U.S. Army vernacular term denoting a partnership providing assistance both in and following combat engagement.

Item c. *Gulf War syndrome* is a medical condition affecting many veterans of the 1991 Gulf War, causing fatigue, chronic headaches, and skin and respiratory disorders; however, its exact cause is uncertain.

Item d. *Postural orthostatic tachycardia syndrome (POTS)* is a form of orthostatic intolerance associated with the presence of excessive tachycardia and many other symptoms upon standing. This type of dysautonomia, disorder of autonomic nervous system (ANS) function, generally afflicts women.

Item e. *Operation New Horizons* (as known by several names in past years, including New Horizons and Beyond the Horizons) are recurring U.S. Southern Command sponsored humanitarian, and civic-action training exercise operations employing U.S. active duty, Reserve and National Guard personnel from around the nation and, held in Central and South America as well as the Caribbean Islands.

Figure A4: Footnotes for Chapter IV in order of appearance

Item a. Ning is a Software as a service (SaaS) platform (SaaS is a software distribution model in which a third-party provider hosts applications and makes them available to customers over the Internet and it is one of three main categories of cloud computing) used to create custom social networks websites for social integration (in regard to information technology refers to more informal mechanisms of inclusion, including social networks, a sense of belonging, commitment to the common good).

Figure A5: Footnotes for Chapter V in order of appearance

Appendix B: Tables and Figures

Appendix B: Tables and Figures

Table B1

Questions for the program evaluation

1.	What are efficient strategies for recruitment of veterans for treatment at VRP?
2.	What are efficient strategies for retaining therapists at VRP?
3.	What is the efficacy of the EMDR treatment employed by the VRP?

Name: _____ Terrell Shon Powell _____	**Veteran Resilience Project: Program Evaluation Logic Model**		Date: _____ 5/22/2017 _____	
RESOURCES	**ACTIVITIES/SERVICES**	**OUTPUTS/QUANTIFIABLE PRODUCTS**	**IMMEDIATE/INTERMEDIATE/LONG TERM OUTCOMES**	**IMMEDIATE/INTERMEDIATE/LONG TERM IMPACT**
- Capital - Veteran clients - Trained EMDR providers - Veteran Committee - Executive Director - Staff Time - Treatment Locations - Outcome measures	- Trained EMDR providers to engage veteran clients in therapy - VRP does outreach to trained EMDR providers - VRP does outreach through Veteran Committee to veteran clients - Establish relationships with other non-profit organizations to extend the referral base - Engage in presentations through social media, social networking, and traditional mass media - Trained EMDR providers collects data from veteran clients (outcomes measures) - Staff/volunteers collects data from trained EMDR providers (outcomes measures)	- Number of veteran clients supported (27) - Number of trained EMDR providers (25) - Number of treatment locations (17) - Number of Veteran Committee staff/volunteers (8) - Number of clients who dropped out prior to program completion (6) - Number of clients who completed the program (21) - Number of pre and post measures completed (17)	- Veteran clients successful per their own and others' definitions of overcoming trauma - Veteran clients end therapy per programs expectations - Common challenges are identified and addressed - Possible drop-out triggers identified - Enhanced publicity and public relations for VRP - Increased VRP understanding of veteran client needs and preferences - Increased Executive Director understanding of providers needs and preferences	- Improved quality of care for veterans with PTSD in MN - Increase quantity of veterans served - Improved veteran client experience - Improved provider experience - Improved Veteran Committee staff/volunteers' experience

Assumptions

- Veterans Administration does not provide EMDR as an intervention; however, they do recognize it as an effective treatment for Post-traumatic stress disorder (PTSD) along with Cognitive Processing Therapy (CPT) and Prolonged Exposure (PE) therapy (which the VRP does not offer)
- Minnesota does not contain any active duty military bases
- Financial limitations are not touched on directly in evaluation
- Willingness of both Executive Director and Veteran Committee staff/volunteers to embrace new ideas

Constraints

- Laws
- Regulations
- Funders requirements

(Kellogg, 2004)

Figure B1. Logic model of the VRP

THE MASTER PLAN: VRP											
Evaluation Question 1	Info Required	Info Source	Method for Collecting	INFO COLLECTION By Whom?	Conditions?	When?	Analysis Procedures	Interpretation Procedures and Criteria	REPORTING OF INFORMATION To Whom?	How?	When?	Evidence-basis relevant here?
1. Interview to determine key issues												
What are approaches that can be used to efficiently recruit veterans for mental health treatment?	How did you for out about EMDR? -Did someone invite you or encourage you to seek help? -Family member, friend, or fellow veteran? -Did you know anything about EMDR before you were referred? -Are there any challenges in this process that you would be willing to share? Are there ways in which we can improve our process for availability?	Veteran and service connected post-treatment clients	Face-to-face, over the phone, and email interviews to collect qualitative data using Jeffersonian transcription	VRP representative	Face-to-face, over the phone, and email with a single VRP representative and post treatment client	Collected May 18th through August 6th 2015	Open coding of raw data using a discourse analysis approach	VRP representatives tasked with transcrption; external program evaluator ensures most themes from interviews are incorporated into report	Founder of founder of VRP of Minnesota, Inc. and Board President, Elaine Wynne	Email	No later than 8/31/2018	Direct relevance (direct evidence of what was asks for), Indirect relevance (from which something can be infered about the question), Context relevance (provides background/context on the question), Comparison relevance (provides information on a similar or contrasting situation)
	How can we better promote EMDR? -Note *We are exploring social media and revamping a website. Is there any input that you have concerning using technology?	Veteran and service connected post-treatment clients	Face-to-face, over the phone, and email interviews to collect qualitative data using Jeffersonian transcription	VRP representative	Face-to-face, over the phone, and email with a single VRP representative and post treatment client	Collected May 18th through August 6th 2015	Open coding of raw data using a discourse analysis approach	VRP representatives tasked with transcrption; external program evaluator ensures most themes from interviews are incorporated into report	Founder of founder of VRP of Minnesota, Inc. and Board President, Elaine Wynne	Email	No later than 8/31/2018	Direct relevance (direct evidence of what was asks for), Indirect relevance (from which something can be infered about the question), Context relevance (provides background/context on the question), Comparison relevance (provides information on a similar or contrasting situation)
	How would you describe the process of EMDR to someone else who hasn't been through it? -The way they describe it will better inform how to promote it.	Veteran and service connected post-treatment clients	Face-to-face, over the phone, and email interviews to collect qualitative data using Jeffersonian transcription	VRP representative	Face-to-face, over the phone, and email with a single VRP representative and post treatment client	Collected May 18th through August 6th 2015	Open coding of raw data using a discourse analysis approach	VRP representatives tasked with transcrption; external program evaluator ensures most themes from interviews are incorporated into report	Founder of founder of VRP of Minnesota, Inc. and Board President, Elaine Wynne	Email	No later than 8/31/2018	Direct relevance (direct evidence of what was asks for), Indirect relevance (from which something can be infered about the question), Context relevance (provides background/context on the question), Comparison relevance (provides information on a similar or contrasting situation)
	Next we will move into what went well in the therapy process. We are not asking you to give details about specific traumas. We want to know about the technical aspects. -How do you feel about EMDR as a modality? -Did you fell that your therapist was adequately prepared and knowledgeable? -What can be improved?	Veteran and service connected post-treatment clients	Face-to-face, over the phone, and email interviews to collect qualitative data using Jeffersonian transcription	VRP representative	Face-to-face, over the phone, and email with a single VRP representative and post treatment client	Collected May 18th through August 6th 2015	Open coding of raw data using a discourse analysis approach	VRP representatives tasked with transcrption; program evaluator ensures most themes from interviews are incorporated into report	Founder of founder of VRP of Minnesota, Inc. and Board President, Elaine Wynne	Email	No later than 8/31/2018	Direct relevance (direct evidence of what was asks for), Indirect relevance (from which something can be infered about the question), Context relevance (provides background/context on the question), Comparison relevance (provides information on a similar or contrasting situation)
	When you first began this process, in what ways did support show up from your spouses, friends, and family? -Instrumental, emotional, etc?	Veteran and service connected post-treatment clients	Face-to-face, over the phone, and email interviews to collect qualitative data using Jeffersonian transcription	VRP representative	Face-to-face, over the phone, and email with a single VRP representative and post treatment client	Collected May 18th through August 6th 2015	Open coding of raw data using a discourse analysis approach	VRP representatives tasked with transcrption; external program evaluator ensures most themes from interviews are incorporated into	Founder of founder of VRP of Minnesota, Inc. and Board President, Elaine Wynne	Email	No later than 8/31/2018	Direct relevance (direct evidence of what was asks for), Indirect relevance (from which something can be infered about the question), Context relevance (provides background/context on the question), Comparison relevance (provides information on a similar or contrasting situation)
	As an organization, we are considering reaching out to spouses and partners and invite them to be part of the process of evaluation in order to give another perspective. The purpose of inviting spouses is to give them help and support to meet their own challenges and questions. Do you support this? -We are doing this to be more intentional about inviting those people who support into that system. -If so, why do you think this is a good idea? -If no, what reservations do you have? -Would doing something like this have been helpful for you?	Veteran and service connected post-treatment clients	Face-to-face, over the phone, and email interviews to collect qualitative data using Jeffersonian transcription	VRP representative	Face-to-face, over the phone, and email with a single VRP representative and post treatment client	Collected May 18th through August 6th 2015	Open coding of raw data using a discourse analysis approach	VRP representatives tasked with transcrption; external program evaluator ensures most themes from interviews are incorporated into report	Founder of founder of VRP of Minnesota, Inc. and Board President, Elaine Wynne	Email	No later than 8/31/2018	Direct relevance (direct evidence of what was asks for), Indirect relevance (from which something can be infered about the question), Context relevance (provides background/context on the question), Comparison relevance (provides information on a similar or contrasting situation)
	Would you be interested in doing larger gatherings of vets who have been in the EMDR process for networking, community, and pooling of resources? We would also invite affiliate organizations with a similar mission to be in on that process. -If you support it, what do you see as the benefit and how would you do it? -If no, what are your reservations?	Veteran and service connected post-treatment clients	Face-to-face, over the phone, and email interviews to collect qualitative data using Jeffersonian transcription	VRP representative	Face-to-face, over the phone, and email with a single VRP representative and post treatment client	Collected May 18th through August 6th 2015	Open coding of raw data using a discourse analysis approach	VRP representatives tasked with transcrption; external program evaluator ensures most themes from interviews are incorporated into report	Founder of founder of VRP of Minnesota, Inc. and Board President, Elaine Wynne	Email	No later than 8/31/2018	Direct relevance (direct evidence of what was asks for), Indirect relevance (from which something can be infered about the question), Context relevance (provides background/context on the question), Comparison relevance (provides information on a similar or contrasting situation)
2. Report written in August 2015 - August 2018, presented to VRP August 2018												

Figure B2. Master Plan for the VRP, Evaluation Question 1

THE MASTER PLAN: VRP												
Evaluation Question 2	Info Required	Info Source	Method for Collecting	INFO COLLECTION By Whom?	Conditions?	When?	Analysis Procedures	Interpretation Procedures and Criteria	REPORTING OF INFORMATION To Whom?	How?	When?	Evidence-basis relevant here?
1. Interview to determine key issues												
What are the practical strategies for retaining treating mental health clinicians and staff?	What is the volunteer recruitment process? -Do you need more?	EMDR providers	Face-to-face, telephone contact, and email interviews to collect qualitative data using Jeffersonian transcription	External program evaluator	Face-to-face, over the phone, and email with External Program Evaluator and EMDR Clinicians	September 7th, 2014 and February 20th, 2015	Open coding of raw data using a discourse analysis approach	External Program Evaluator tasked with transcription and ensures most themes from interviews are incorporated into report	Founder of founder of VRP of Minnesota, Inc. and Board President, Elaine Wynne	Email	No later than 8/31/201 8	Direct relevance (direct evidence of what was asks for), Indirect relevance (from which something can be infered about the question), Context relevance (provides background/context on the question), Comparison relevance (provides information on a similar or contrasting situation)
	What types of assistance from VRP at large would be most beneficial for you in your current position?	EMDR providers	Face-to-face, telephone contact, and email interviews to collect qualitative data using Jeffersonian transcription	External program evaluator	Face-to-face, over the phone, and email with External Program Evaluator and EMDR Clinicians	September 7th, 2014 and February 20th, 2015	Open coding of raw data using a discourse analysis approach	External Program Evaluator tasked with transcription and ensures most themes from interviews are incorporated into report	Founder of founder of VRP of Minnesota, Inc. and Board President, Elaine Wynne	Email	No later than 8/31/201 8	Direct relevance (direct evidence of what was asks for), Indirect relevance (from which something can be infered about the question), Context relevance (provides background/context on the question), Comparison relevance (provides information on a similar or contrasting situation)
	What types of challenges are being currently experienced in your current position within VRP?	EMDR providers	Face-to-face, telephone contact, and email interviews to collect qualitative data using Jeffersonian transcription	External program evaluator	Face-to-face, over the phone, and email with External Program Evaluator and EMDR Clinicians	September 7th, 2014 and February 20th, 2015	Open coding of raw data using a discourse analysis approach	External Program Evaluator tasked with transcription and ensures most themes from interviews are incorporated into report	Founder of founder of VRP of Minnesota, Inc. and Board President, Elaine Wynne	Email	No later than 8/31/201 8	Direct relevance (direct evidence of what was asks for), Indirect relevance (from which something can be infered about the question), Context relevance (provides background/context on the question), Comparison relevance (provides information on a similar or contrasting situation)
	Is there a policy regarding outside employment, and if so, what is it?	EMDR providers	Face-to-face, telephone contact, and email interviews to collect qualitative data using Jeffersonian transcription	External program evaluator	Face-to-face, over the phone, and email with External Program Evaluator and EMDR Clinicians	September 7th, 2014 and February 20th, 2015	Open coding of raw data using a discourse analysis approach	External Program Evaluator tasked with transcription and ensures most themes from interviews are incorporated into report	Founder of founder of VRP of Minnesota, Inc. and Board President, Elaine Wynne	Email	No later than 8/31/201 8	Direct relevance (direct evidence of what was asks for), Indirect relevance (from which something can be infered about the question), Context relevance (provides background/context on the question), Comparison relevance (provides information on a similar or contrasting situation)
	Are there any conflicts with your outside employment and your current position within VRP?	EMDR providers	Face-to-face, telephone contact, and email interviews to collect qualitative data using Jeffersonian transcription	External program evaluator	Face-to-face, over the phone, and email with External program evaluator and EMDR provider	September 7th, 2014 and February 20th, 2015	Open coding of raw data using a discourse analysis approach	External Program Evaluator tasked with transcription and ensures most themes from interviews are incorporated into report	Founder of founder of VRP of Minnesota, Inc. and Board President, Elaine Wynne	Email	No later than 8/31/201 8	Direct relevance (direct evidence of what was asks for), Indirect relevance (from which something can be infered about the question), Context relevance (provides background/context on the question), Comparison relevance (provides information on a similar or contrasting situation)
	What works here for you and what needs some scrutiny for possible change?	EMDR providers	Face-to-face, telephone contact, and email interviews to collect qualitative data using Jeffersonian transcription	External program evaluator	Face-to-face, over the phone, and email with External program evaluator and EMDR provider	September 7th, 2014 and February 20th, 2015	Open coding of raw data using a discourse analysis approach	External Program Evaluator tasked with transcription and ensures most themes from interviews are incorporated into report	Founder of founder of VRP of Minnesota, Inc. and Board President, Elaine Wynne	Email	No later than 8/31/201 8	Direct relevance (direct evidence of what was asks for), Indirect relevance (from which something can be infered about the question), Context relevance (provides background/context on the question), Comparison relevance (provides information on a similar or contrasting situation)
	What systems are least effective/ efficient/ satisfactory? -What systems are most effective/ efficient/ satisfactory?	EMDR providers	Face-to-face, telephone contact, and email interviews to collect qualitative data using Jeffersonian transcription	External program evaluator	Face-to-face, over the phone, and email with External Program Evaluator and EMDR Clinicians	September 7th, 2014 and February 20th, 2015	Open coding of raw data using a discourse analysis approach	External Program Evaluator tasked with transcrption and ensures most themes from interviews are incorporated into report	Founder of founder of VRP of Minnesota, Inc. and Board President, Elaine Wynne	Email	No later than 8/31/201 8	Direct relevance (direct evidence of what was asks for), Indirect relevance (from which something can be infered about the question), Context relevance (provides background/context on the question), Comparison relevance (provides information on a similar or contrasting situation)
	How well do you feel that your origination services the community you've identified?	EMDR providers	Face-to-face, telephone contact, and email interviews to collect qualitative data using Jeffersonian transcription	External program evaluator	Face-to-face, over the phone, and email with External Program Evaluator and EMDR Clinicians	September 7th, 2014 and February 20th, 2015	Open coding of raw data using a discourse analysis approach	External Program Evaluator tasked with transcrption and ensures most themes from interviews are incorporated into report	Founder of founder of VRP of Minnesota, Inc. and Board President, Elaine Wynne	Email	No later than 8/31/201 8	Direct relevance (direct evidence of what was asks for), Indirect relevance (from which something can be infered about the question), Context relevance (provides background/context on the question), Comparison relevance (provides information on a similar or contrasting situation)
2. Report written in July - August, presented to VRP September 1st												

Figure B3. Master Plan for the VRP, Evaluation Question 2

Evaluation Question 3	Info Required	Info Source	Method for Collecting	INFO COLLECTION By Whom?	Conditions?	When?	Analysis Procedures	Interpretation Procedures and Criteria	REPORTING OF INFORMATION To Whom?	How?	When?	Evidence-basis relevant here?
THE MASTER PLAN: VRP												
						1. Interview to determine key issues						
What is the efficacy of the EMDR therapy treatment employed by the Veteran's Resilience Project of Minnesota?	Intake Data Form	Ouput from VRP Database	VRP Questionnaire	EMDR Clinicians	Face-to-face with EMDR Clinicians	Collected September 2014	Code for basic themes, combine themes, recode for combined themes using a phenomenological approach	External Program Evaluator ensures most outcomes from data are incorporated into report	Founder of founder of VRP of Minnesota, Inc. and Board President, Elaine Wynne	Email	No later than 8/31/2018	Direct relevance (direct evidence of what was asks for), Indirect relevance (from which something can be infered about the question), Context relevance (provides background/context on the question)
	Termination Summary Data	Ouput from VRP Database	VRP Questionnaire	EMDR Clinicians	Face-to-face with EMDR Clinicians	Collected September 2014	Simple percentage calculations taken	External Program Evaluator ensures most outcomes from data are incorporated into report	Founder of founder of VRP of Minnesota, Inc. and Board President, Elaine Wynne	Email	No later than 8/31/2018	Direct relevance (direct evidence of what was asks for), Indirect relevance (from which something can be infered about the question), Context relevance (provides background/context on the question)
	Completion Success	Ouput from VRP Database	VRP Questionnaire	EMDR Clinicians	Face-to-face with EMDR Clinicians	Collected September 2014	Simple percentage calculations taken	External Program Evaluator ensures most outcomes from data are incorporated into report	Founder of founder of VRP of Minnesota, Inc. and Board President, Elaine Wynne	Email	No later than 8/31/2018	Direct relevance (direct evidence of what was asks for), Indirect relevance (from which something can be infered about the question), Context relevance (provides background/context on the question)
	Impact of Event Scale – Revised (IES-R) Data	Ouput from VRP Database	Protocols	EMDR Clinicians	Face-to-face with EMDR Clinicians	Collected September 2014	Subscales calculated as means along with paired-samples t-tests conducted	External Program Evaluator ensures most outcomes from data are incorporated into report	Founder of founder of VRP of Minnesota, Inc. and Board President, Elaine Wynne	Email	No later than 8/31/2018	Direct relevance (direct evidence of what was asks for), Indirect relevance (from which something can be infered about the question), Context relevance (provides background/context on the question)
	Posttraumatic Stress Disorder Checklist, Military Version (PCL-M) Data	Ouput from VRP Database	Protocols	EMDR Clinicians	Face-to-face with EMDR Clinicians	Collected September 2014	Paired-samples t-tests conducted	External Program Evaluator ensures most outcomes from data are incorporated into report	Founder of founder of VRP of Minnesota, Inc. and Board President, Elaine Wynne	Email	No later than 8/31/2018	Direct relevance (direct evidence of what was asks for), Indirect relevance (from which something can be infered about the question), Context relevance (provides background/context on the question)
	Posttraumatic Growth Inventory (PTGI) Data	Ouput from VRP Database	Protocols	EMDR Clinicians	Face-to-face with EMDR Clinicians	Collected September 2014	Subscales calculated as means along with total scale calculation	External Program Evaluator ensures most outcomes from data are incorporated into report	Founder of founder of VRP of Minnesota, Inc. and Board President, Elaine Wynne	Email	No later than 8/31/2018	Direct relevance (direct evidence of what was asks for), Indirect relevance (from which something can be infered about the question), Context relevance (provides background/context on the question)
	Dissociative Experiences Scale (DES-II) Data	Ouput from VRP Database	Protocols	EMDR Clinicians	Face-to-face with EMDR Clinicians	Collected September 2014	Simple percentage calculations taken	External Program Evaluator ensures most outcomes from data are incorporated into report	Founder of founder of VRP of Minnesota, Inc. and Board President, Elaine Wynne	Email	No later than 8/31/2018	Direct relevance (direct evidence of what was asks for), Indirect relevance (from which something can be infered about the question), Context relevance (provides background/context on the question)
			2. Report written in July - August, presented to VRP September 1st									

Figure B4. Master Plan for the VRP, Evaluation Question 3

Table B2

Diagnostic criteria for PTSD as per the DSM 5

Criterion	Description and specific symptoms
A	Exposure to actual or threatened death, serious injury, or sexual violence in one (or more) of the following ways: 1. Directly experiencing the traumatic event(s). 2. Witnessing, in person, the event(s) as it occurred to others. 3. Learning that the traumatic event(s) occurred to a close family member or close friend. In cases of actual or threatened death of a family member or friend, the event(s) must have been violent or accidental. 4. Experiencing a repeated or extreme exposure to aversive details of the traumatic event(s) (e.g., first responders collecting human remains; police officers repeatedly exposed to details of child abuse).
B	Presence of one (or more) of the following intrusion symptoms associated with the traumatic event(s), beginning after the traumatic event(s) occurred: 1. Recurrent, involuntary, and intrusive distressing memories of the traumatic event(s). 2. Recurrent distressing dreams in which the content and/or affect of the dream are related to the traumatic event(s). 3. Dissociative reactions (e.g., flashbacks) in which the individual feels or acts as if the traumatic event(s) were recurring. (Such reactions may occur on a continuum, with the most extreme expression being a complete loss of awareness of present surroundings.) 4. Intense or prolonged psychological distress at exposure to internal or external cues that symbolize or resemble an aspect of the traumatic event(s). 5. Marked physiological reactions to internal or external cues that symbolize or resemble an aspect of the traumatic event(s).
C	Persistent avoidance of stimuli associated with the traumatic event(s), beginning after the traumatic event(s) occurred, as evidenced by one or both of the following: 1. Avoidance or efforts to avoid distressing memories, thoughts, or feelings about or closely associated with the traumatic event(s). 2. Avoidance of or efforts to avoid external reminders (people, places, conversations, activities, objects, situations) that arouse distressing memories, thoughts, or feelings about or closely associated with the traumatic event(s).
D	Negative alterations in cognitions and mood associated with the traumatic event(s), beginning or worsening after the traumatic event(s) occurred, as evidenced by two (or more) of the following: 1. Inability to remember an important aspect of the traumatic event(s) (typically due to dissociative amnesia and not to other factors such as head injury, alcohol, or drugs) 2. Persistent and exaggerated negative beliefs or expectations about oneself, others, or the world (e.g., "I am bad," "No one can be trusted," "The world is completely dangerous," "My whole nervous system is permanently ruined"). 3. Persistent, distorted cognitions about the cause or consequences of the traumatic event(s) that lead the individual to blame himself/herself or others. 4. Persistent negative emotional state (e.g., fear, horror, anger, guilt, or shame) 5. Markedly diminished interest or participation in significant activities. 6. Feelings of detachment or estrangement from others. 7. Persistent inability to experiences positive emotions (e.g., inability to experience happiness, satisfaction, or loving feelings).
E	Marked alterations in arousal and reactivity associated with the traumatic event(s), beginning or worsening after the traumatic event(s) occurred, as evidenced by two (or more) of the following: 1. Irritable behavior and angry outbursts (with little or no provocation) typically expressed as verbal or physical aggression toward people or objects. 2. Reckless or self-destructive behavior. 3. Hypervigilance. 4. Exaggerated startle response. 5. Problems with concentration. 6. Sleep disturbance (e.g., difficulty falling or staying asleep or restless sleep).
F	Duration of the disturbance (Criteria B, C, D, and E) is more than 1 month.
G	The disturbance causes clinically significant distress or impairment in social, occupational, or other important areas of functioning.
H	The disturbance is not attributable to the physiological effects of a substance (e.g., medication, alcohol) or another medical condition.

Table B3

TRICARE structure and descriptions

Coverage Package	Description
TRICARE Prime	Structured as a health maintenance organization (HMO)
TRICARE Extra	Roughly equivalent to a civilian preferred provider organization (PPO)
TRICARE Standard	Traditional fee-for-service plan

Table B4

Program evaluation types and descriptions

Type of evaluation	Focus of evaluation
Needs evaluation	Priorities may be set in the decision-making process of organizational improvement or allocation of resources
Design evaluation (formative)	Conducted during the development of a program
Implementation of a program (process)	Focuses on the activities as a program is delivered
Outcome evaluation (summative)	Evaluation done at the completion of a program and reports *on* the program rather than *to* the program
Evaluation of program efficiency	Determines the extent to which program outcomes are a waste of resources

Table B5

CFIR Domains

Domain	Description
Characteristics of Individuals	Concerns the targets of the intervention (e.g., recipients of healthcare, clinicians, managers)
Outer Setting	Informed by the study subject's economic, political, and social context sets a local heuristic
Inner Setting	Encompasses the structural, political, and cultural dimensions of institutions, including networks and communications, which refer to the social, professional, formal, and informal connections among providers within an organization
Process of Implementation	Includes planning, engaging, executing, reflecting, and evaluating novel resolutions
Intervention Characteristics	Includes constructs such as evidence strength and quality, adaptability, and complexity

Table B6

Factors affecting burnout as per Ozturkcu et. al (2018)

1.	Physical environmental conditions
2.	Working conditions
3.	Health policies
4.	Institutional opportunities
5.	Occupational environment
6.	Appropriateness of the work for the skills and experience of the clinician
7.	Workload
8.	Insufficient human resources
9.	Administrative support
10.	Privileges
11.	Appreciation
12.	Encouragement
13.	Supervision
14.	Training
15.	Career development
16.	Permanent employment versus contracting
17.	Salary
18.	Occupational safety
19.	Patient relations
20.	Interpersonal professional relations

Table B7

Evidence-Based Practice Evaluation Criteria as per the APA Presidential Task Force

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APA Presidential Task Force on Evidence-Based Practice Evaluation Criteria

Criterion 1: Well-Established Treatments

> 1.1 There must be at least two good group-design experiments, conducted in at least two independent research settings and by independent investigatory teams, demonstrating efficacy by showing the treatment to be:
>
>> a) superior to pill or psychological placebo or to another treatment
>>
>> OR
>>
>> b) equivalent to (or not significantly different from) an already established treatment in experiments with statistical power being sufficient to detect moderate differences
>>
>> AND
>
> 1.2 treatment manuals or a logical equivalent were used for the treatment
>
> 1.3 treatment was conducted with a population, treated for specified problems, for whom inclusion criteria have been delineated in a reliable, valid manner
>
> 1.4 reliable and valid outcome assessment measures were used, at minimum identifying the problems targeted for change
>
> 1.5 appropriate data analyses

Criterion 2: Probably Efficacious Treatments

> 2.1 There must be at least two experiments showing the treatment is superior (statistically significantly so) to a wait-list or no treatment control group
>
>> OR
>
> 2.2 One or more experiments meeting the Well-Established Treatment Criteria with the one exception of having been conducted in at least two independent research settings and by independent investigatory teams

Criterion 3: Possibly Efficacious Treatments

> At least one good* study showing the treatment to be efficacious in the absence of conflicting evidence

Criterion 4: Experimental Treatments

Treatment not yet tested in trials meeting Task Force criteria for methodology

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Table B8

Guidelines for Outcome Research

Guideline	Description
1.	Specify what is being measured to facilitate replication in a convention which makes the objective apparent
2.	Examine the client's psychological performance from varied perspectives
3.	Use a variety of clinical scales and methods
4.	Utilize symptom-based a theoretical assessment instruments,
5.	Examine patterns of change over time with repeated administrations of consistent measure(s)
6.	Instruments should be inexpensive and uncomplicated for scoring and administration
7.	Scales should be appropriate for a diversity of clients with a range of diagnoses
8.	Measurement requires instruments which are psychometrically accurate and precise (reliable, standardized, and valid) as well as sensitivity to variation(s) in subject characteristics
9.	Utilize instruments in such a way that they are invulnerable to bias, thus focusing on the clients current "true" functioning
10.	Instruments should have enough items in the "normal" and "dysfunctional" range to correct for conceivable floor and ceiling effects
11.	Instruments should sample a variety of subject matter areas such as symptoms, interpersonal functioning, and behavioral performance in social roles

Appendix C: Measures and Materials

Appendix C: Measures and Materials

IMPACT OF EVENTS SCALE-Revised (IES-R)

INSTRUCTIONS: Below is a list of difficulties people sometimes have after stressful life events. Please read each item, and then indicate how distressing each difficulty has been for you DURING THE PAST SEVEN DAYS with respect to _____
_____(event) that occurred on _____(date). How much have you been distressed or bothered by these difficulties?

	Not at all	A little bit	Moderately	Quite a bit	Extremely
1. Any reminder brought back feelings about it	0	1	2	3	4
2. I had trouble staying asleep	0	1	2	3	4
3. Other things kept making me think about it.	0	1	2	3	4
4. I felt irritable and angry	0	1	2	3	4
5. I avoided letting myself get upset when I thought about it or was reminded of it	0	1	2	3	4
6. I thought about it when I didn't mean to	0	1	2	3	4
7. I felt as if it hadn't happened or wasn't real.	0	1	2	3	4
8. I stayed away from reminders of it.	0	1	2	3	4
9. Pictures about it popped into my mind.	0	1	2	3	4
10. I was jumpy and easily startled.	0	1	2	3	4
11. I tried not to think about it.	0	1	2	3	4
12. I was aware that I still had a lot of feelings about it, but I didn't deal with them.	0	1	2	3	4
13. My feelings about it were kind of numb.	0	1	2	3	4
14. I found myself acting or feeling like I was back at that time.	0	1	2	3	4
15. I had trouble falling asleep.	0	1	2	3	4
16. I had waves of strong feelings about it.	0	1	2	3	4
17. I tried to remove it from my memory.	0	1	2	3	4
18. I had trouble concentrating.	0	1	2	3	4
19. Reminders of it caused me to have physical reactions, such as sweating, trouble breathing, nausea, or a pounding heart.	0	1	2	3	4
20. I had dreams about it.	0	1	2	3	4
21. I felt watchful and on-guard.	0	1	2	3	4
22. I tried not to talk about it.	0	1	2	3	4

Total IES-R Score:_____

INT: 1, 2, 3, 6, 9, 14, 16, 20
AVD: 5, 7, 8, 11, 12, 13, 17, 22
HYP: 4, 10, 15, 18, 19, 21

Weiss, D.S. (2007). The Impact of Event Scale-Revised. In J.P. Wilson, & T.M. Keane (Eds.)
Assessing psychological trauma and PTSD: a practitioner's handbook (2nd ed., pp. 168-189). New York: Guilford Press.
AETR2N   22   1/13/2012

Figure C1. Items of the Impact of Events Scale, Revised (IES-R)

PTSD CheckList – Military Version (PCL-M)

Patient's Name: _____ Date: _____

SSN:_____ Service:_____Rank:_____

Instruction to patient: Below is a list of problems and complaints that veterans sometimes have in response to stressful military experiences. Please read each one carefully, put an "X" in the box to indicate how much you have been bothered by that problem *in the last month*.

No.	Problem or Complaint:	Frequency:				
		Not at all (1)	A little bit (2)	Moderately (3)	Quite a bit (4)	Extremely (5)
1.	Repeated, disturbing *memories, thoughts,* or *images* of a stressful military experience?					
2.	Repeated, disturbing *dreams* of a stressful military experience?					
3.	Suddenly *acting* or *feeling* as if a stressful military experience *were happening again* (as if you were reliving it)?					
4.	Feeling very upset when something reminded you of a stressful military experience?					
5.	Having *physical reactions* (e.g., heart pounding, trouble breathing, or sweating) when *something reminded* you of a stressful military experience?					
6.	Avoid *thinking about* or *talking* about a stressful military experience or avoid *having feelings* related to it?					
7.	Avoid *activities* or *talking about* a stressful military experience or avoid *having feelings* related to it?					
8.	Trouble *remembering important parts* of a stressful military experience?					
9.	Loss of *interest* in things that you used to enjoy?					
10.	Feeling *distant* or *cut off* from other people?					
11.	Feeling *emotionally numb* or being unable to have loving feelings for those close to you?					
12.	Feeling as if your *future* will somehow be *cut short*?					
13.	Trouble *falling* or *staying* asleep?					
14.	Feeling *irritable* or having *angry outbursts*?					
15.	Having *difficulty* concentrating?					
16.	Being "*super alert*" or watchful on guard?					
17.	Feeling *jumpy* or easily startled?					

PCL-M for DSM-IV (11/1/94)

Weathers, F.W., Huska, J.A., Keane, T.M. PCL-M for DSM-IV. Boston; National Center for PTSD – Behavioral Science Division, 1991.

This is a Government document in the public domain.

Figure C2. Items of the PTSD Checklist – Military Version (PCL-M)

Post Traumatic Growth Inventory

Client Name:_____ Today's Date:_____

Indicate for each of the statements below the degree to which this change occurred in your life as a result of the crisis/disaster, using the following scale.

0 = I did not experience this change as a result of my crisis.
1 = I experienced this change to a very small degree as a result of my crisis.
2 = I experienced this change to a small degree as a result of my crisis.
3 = I experienced this change to a moderate degree as a result of my crisis.
4 = I experienced this change to a great degree as a result of my crisis.
5 = I experienced this change to a very great degree as a result of my crisis.

Possible Areas of Growth and Change	0	1	2	3	4	5
1. I changed my priorities about what is important in life.						
2. I have a greater appreciation for the value of my own life.						
3. I developed new interests.						
4. I have a greater feeling of self-reliance.						
5. I have a better understanding of spiritual matters.						
6. I more clearly see that I can count on people in times of trouble.						
7. I established a new path for my life.						
8. I have a greater sense of closeness with others.						
9. I am more willing to express my emotions.						
10. I know better that I can handle difficulties.						
11. I am able to do better things with my life.						
12. I am better able to accept the way things work out.						
13. I can better appreciate each day.						
14. New opportunities are available which wouldn't have been otherwise.						
15. I have more compassion for others.						
16. I put more effort into my relationships.						
17. I am more likely to try to change things which need changing.						
18. I have a stronger religious faith.						
19. I discovered that I'm stronger than I thought I was.						
20. I learned a great deal about how wonderful people are.						
21. I better accept needing others.						

Figure C3. Items of the Post Traumatic Growth Inventory (PTGI)

Dissociative Experiences Scale-II (DES-II)
Eve Bernstein Carlson, Ph.D. & Frank W. Putnam, M.D.

Directions: This questionnaire consists of twenty-eight questions about experiences that you may have in your daily life. We are interested in how often you have these experiences. It is important, however, that your answers show how often these experiences happen to you when you are not under the influence of alcohol or drugs. To answer the questions, please determine to what degree the experience described in the question applies to you, and circle the number to show what percentage of the time you have the experience.

For example: 0% 10 20 30 40 50 60 70 80 90 100%
                         (Never)   (Always)

1. Some people have the experience of driving or riding in a car or bus or subway and suddenly realizing that they don't remember what has happened during all or part of the trip. Circle a number to show what percentage of the time this happens to you.
                         0% 10 20 30 40 50 60 70 80 90 100%

2. Some people find that sometimes they are listening to someone talk and they suddenly realize that they did not hear part or all of what was said. Circle the number to show what percentage of the time this happens to you.   0% 10 20 30 40 50 60 70 80 90 100%

3. Some people have the experience of finding themselves in a place and have no idea how they got there. Circle a number to show what percentage of the time this happens to you.
                         0% 10 20 30 40 50 60 70 80 90 100%

4. Some people have the experience of finding themselves dressed in clothes that they don't remember putting on. Circle the number to show what percentage of the time this happens to you.
                         0% 10 20 30 40 50 60 70 80 90 100%

5. Some people have the experience of finding new things among their belongings that they do not remember buying. Circle the number to show what percentage of the time this happens to you.
                         0% 10 20 30 40 50 60 70 80 90 100%

6. Some people sometimes find that they are approached by people that they do not know, who call them by another name or insist that they have met them before. Circle the number to show what percentage of the time this happens to you   0% 10 20 30 40 50 60 70 80 90 100%

7. Some people sometimes have the experience of feeling as though they are standing next to themselves or watching themselves do something and they actually see themselves as if they were looking at another person. Circle the number to show what percentage of the time this happens to you.
                         0% 10 20 30 40 50 60 70 80 90 100%

8. Some people are told that they sometimes do not recognize friends of family members. Circle the number to show what percentage of the time this happens to you.
                         0% 10 20 30 40 50 60 70 80 90 100%

9. Some people find that they have no memory for some important events in their lives (for example, a wedding or graduation). Circle the number to show what percentage of the time this happens to you.
                         0% 10 20 30 40 50 60 70 80 90 100%

1

10. Some people have the experience of being accused of lying when they do not think that they have lied. Circle the number to show what percentage of the time this happens to you.

0% 10 20 30 40 50 60 70 80 90 100%

11. Some people have the experience of looking in a mirror and not recognizing themselves. Circle the number to show what percentage of the time this happens to you.

0% 10 20 30 40 50 60 70 80 90 100%

12. Some people have the experience of feeling that other people, objects, and the world around them are not real. Circle the number to show what percentage of the time this happens to you.

0% 10 20 30 40 50 60 70 80 90 100%

13. Some people have the experience of feeling that their body does not seem to belong to them. Circle the number to show what percentage of the time this happens to you.

0% 10 20 30 40 50 60 70 80 90 100%

14. Some people have the experience of sometimes remembering a past event so vividly that they feel as if they were reliving that event. Circle the number to show what percentage of the time this happens to you.

0% 10 20 30 40 50 60 70 80 90 100%

15. Some people have the experience of not being sure whether things that they remember happening really did happen or whether they just dreamed them. Circle the number to show what percentage of the time this happens to you.   0% 10 20 30 40 50 60 70 80 90 100%

16. Some people have the experience of being in a familiar place but finding it strange and unfamiliar. Circle the number to show what percentage of the time this happens to you.

0% 10 20 30 40 50 60 70 80 90 100%

17. Some people find that when they are watching television or a movie they become so absorbed in the story that they are unaware of other events happening around them. Circle the number to show what percentage of the time this happens to you.

0% 10 20 30 40 50 60 70 80 90 100%

18. Some people find that they become so involved in a fantasy or daydream that it feels as though it were really happening to them. Circle the number to show what percentage of the time this happens to you.

0% 10 20 30 40 50 60 70 80 90 100%

19. Some people find that they sometimes are able to ignore pain. Circle the number to show what percentage of the time this happens to you.

0% 10 20 30 40 50 60 70 80 90 100%

20. Some people find that they sometimes sit staring off into space, thinking of nothing, and are not aware of the passage of time. Circle the number to show what percentage of the time this happens to you.

0% 10 20 30 40 50 60 70 80 90 100%

21. Some people sometimes find that when they are alone they talk out loud to themselves. Circle the number to show what percentage of the time this happens to you.

0% 10 20 30 40 50 60 70 80 90 100%

2

22. Some people find that in one situation they may act so differently compared with another situation that they feel almost as if they were two different people. Circle the number to show what percentage of the time this happens to you.   0%   10   20   30   40   50   60   70   80   90   100%

23. Some people sometimes find that in certain situations they are able to do things with amazing ease and spontaneity that would usually be difficult for them (for example, sports, work, social situations, etc.). Circle the number to show what percentage of the time this happens to you.
0%   10   20   30   40   50   60   70   80   90   100%

24. Some people sometimes find that they cannot remember whether they have done something or have just thought about doing that thing (for example, not knowing whether they have just mailed a letter or have just thought about mailing it). Circle the number to show what percentage of the time this happens to you.
0%   10   20   30   40   50   60   70   80   90   100%

25. Some people find evidence that they have done things that they do not remember doing. Circle the number to show what percentage of the time this happens to you.
0%   10   20   30   40   50   60   70   80   90   100%

26. Some people sometimes find writings, drawings, or notes among their belongings that they must have done but cannot remember doing. Circle the number to show what percentage of the time this happens to you.   0%   10   20   30   40   50   60   70   80   90   100%

27. Some people sometimes find that they hear voices inside their head that tell them to do things or comment on things that they are doing. Circle the number to show what percentage of the time this happens to you.   0%   10   20   30   40   50   60   70   80   90   100%

28. Some people sometimes feel as if they are looking at the world through a fog, so that people and objects appear far away or unclear. Circle the number to show what percentage of the time this happens to you.
0%   10   20   30   40   50   60   70   80   90   100%

3

Figure C4. Items of the Dissociative Events Scale

Informed Consent Form to Participate in Interview

The evaluators of the Veterans' Resilience of Minnesota (VRP) support the practice of protection for human participants in research and related activities. The following information is provided so that you can decide whether you wish to participate in the present pilot study. You should be aware that even if you agree to participate, you are free to withdraw at any time, and that if you do withdraw from the study, you will not be subjected to reprimand or any other form of reproach.

Procedures to be followed in the study:

The researcher will be conducting a pilot study to identify what could be beneficial for the evaluation of the VRP. The group interview forum will be between 2 to 4 hours. During this time, you are encouraged to express not only what has been working for you within the program, but also how you feel the VRP could adapt to help you succeed in your present goals.

Description of Risk:

Conceivably, our discussion may create discomfort for some participants; therefore, you have the right to withdraw from the pilot study at any time, including refusing to answer any questions.

Description of benefits to be expected from the study or research:

The benefits of you participating in the group interview are numerous. First of all, your opinion matters. What you say and feel has the potential of informing VRP policy and program development. Second, your input may help other volunteers succeed. Your input helps to establish data about what volunteers would like their experience to be like in the VRP.

Appropriate Alternatives:

You can speak within the Healing Military/Combat Trauma Workshop forum, with other volunteers and staff members about your experience at VRP. Additionally, there are alternative ways for you to express your concerns and praise about your experience in the VRP. For example you may also speak of other VRP volunteers and staff members before the workshop or you may speak with the researcher in private.

I have read the above statement and have been fully advised of the procedures to be used in this pilot study. I have been given sufficient opportunity to ask any questions I had concerning the procedures and possible risks involved. I understand the potential risks involved, and I assume them voluntarily. I likewise understand that I can withdraw from the study at any time without being subjected to reproach. I may also ask for a summary of the results of this pilot study. If I have questions I may contact the investigator, Shon Powell at tpowell@antioch.edu.

Signature _____ Date _____
           Participant and/or Authorized Representative

Signature _____ Date _____

Figure C5. Informed consent for participation

Interview Questions

1. How can the VRP develop their ability to increase the number of Veterans who can be served?
2. What is the volunteer recruitment process? Do you need more?
3. What types of assistant from VRP at large would be most beneficial for you in your current position?
4. What types of challenges are being currently experienced in your current position within VRP?
5. Is there a policy regarding outside employment, and if so, what is it?
6. Are there any conflicts with your outside employment and your current position within VRP?
7. What works here for you and what needs some scrutiny for possible change?
8. What systems are least effective/ efficient/ satisfactory? What systems are most effective/ efficient/ satisfactory?
9. How well do you feel that your origination services the community you've identified?

Figure C6. Interview schedule

Appendix D: Supplemental Materials from the Veteran Resilience Project

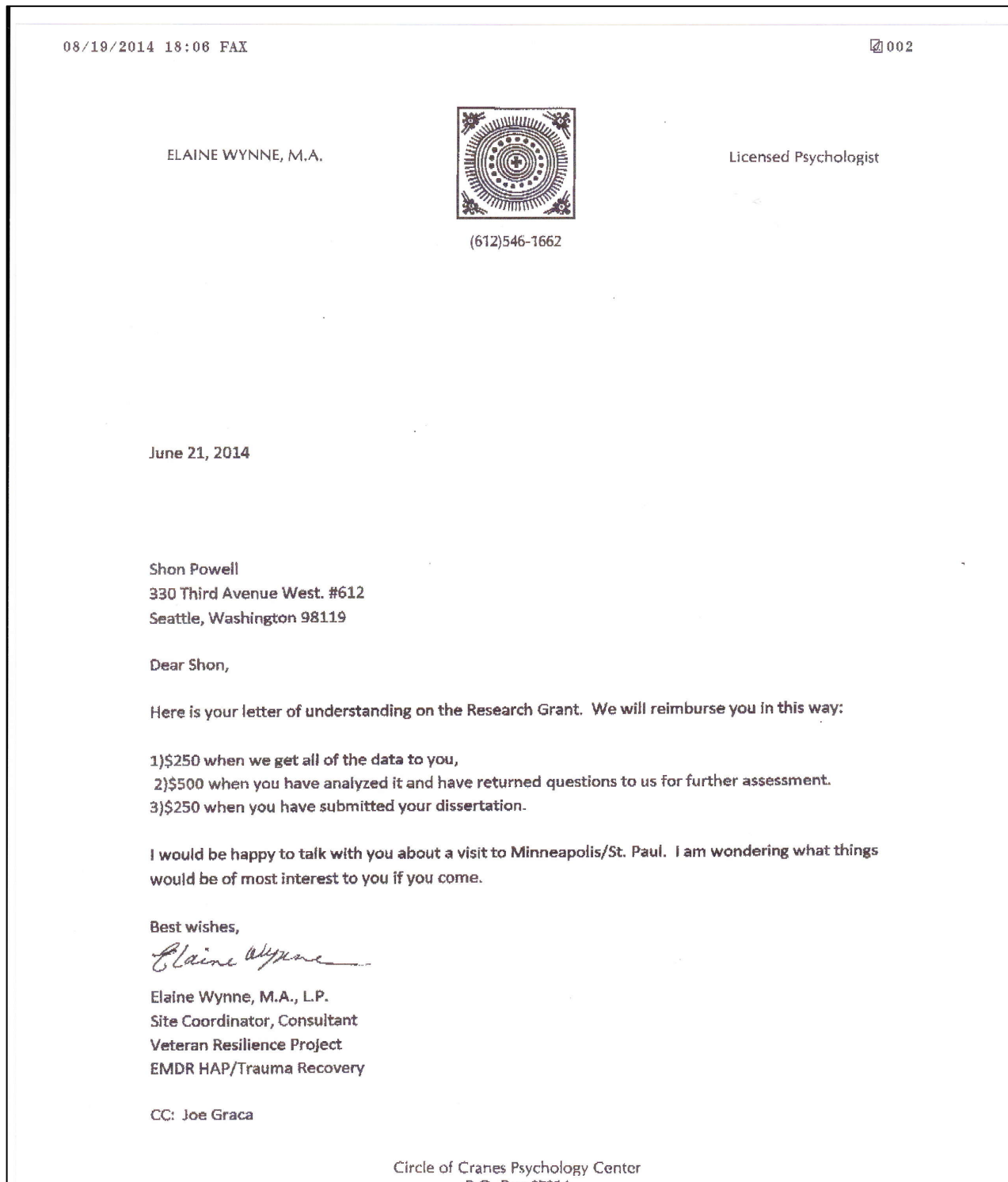Appendix D: Supplemental Materials from the Veteran Resilience Project

ELAINE WYNNE, M.A.   Licensed Psychologist

(612)546-1662

June 21, 2014

Shon Powell
330 Third Avenue West. #612
Seattle, Washington 98119

Dear Shon,

Here is your letter of understanding on the Research Grant. We will reimburse you in this way:

1)$250 when we get all of the data to you,
2)$500 when you have analyzed it and have returned questions to us for further assessment.
3)$250 when you have submitted your dissertation.

I would be happy to talk with you about a visit to Minneapolis/St. Paul. I am wondering what things would be of most interest to you if you come.

Best wishes,

Elaine Wynne, M.A., L.P.
Site Coordinator, Consultant
Veteran Resilience Project
EMDR HAP/Trauma Recovery

CC: Joe Graca

Circle of Cranes Psychology Center
P.O. Box 27314

Figure D1. Grant funding letter

Appendix E: Results

Appendix E: Results

Table E1

Reasons for seeking treatment

| Reason	Description
1	Seeking a better way of life for themselves and their spouse
2	Combat trauma causing nightmares
3	PTSD and depression
4	Seeking help with anxiety and sleep issues
5	Discussing significant concerns with someone objective
6	Seeking control over emotions and anxiety
7	Managing stress
8	Seeking an alternative to current dissatisfactory treatment at the VA
9	Treating anxiety and depression from PTSD
10	Treating panic attacks
11	Recent deterioration in ability to cope with PTSD
12	Addressing an inability to work
13	Seeking help with worsening anxiety, inability to work, and depression
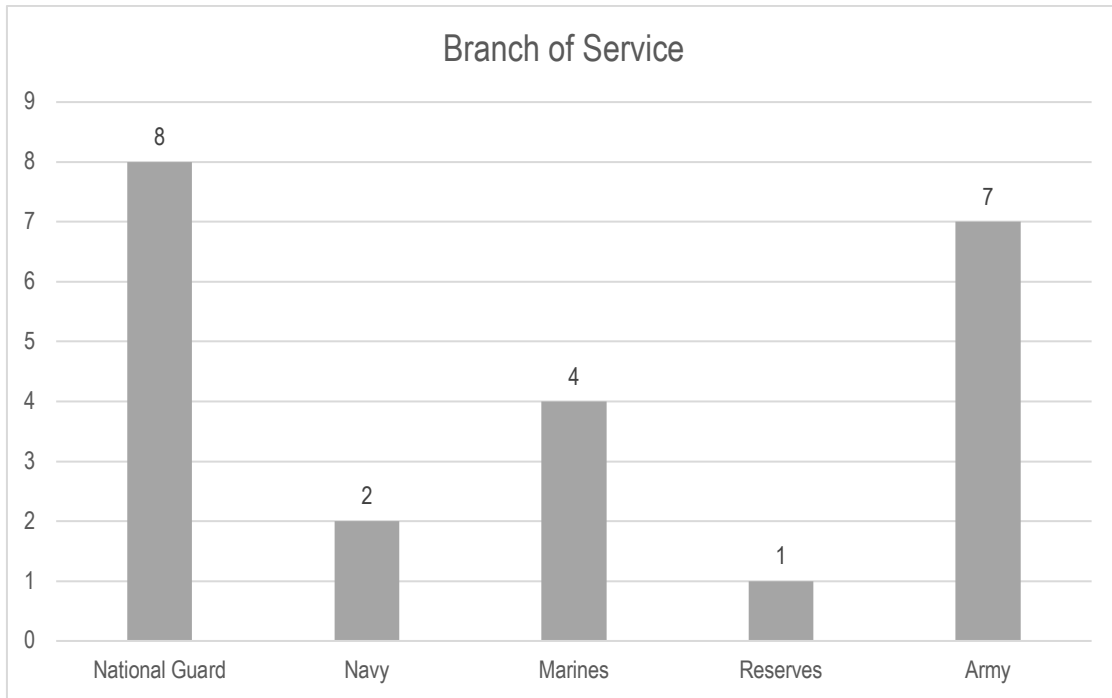
Figure E1. Branch of service reported by veteran sample
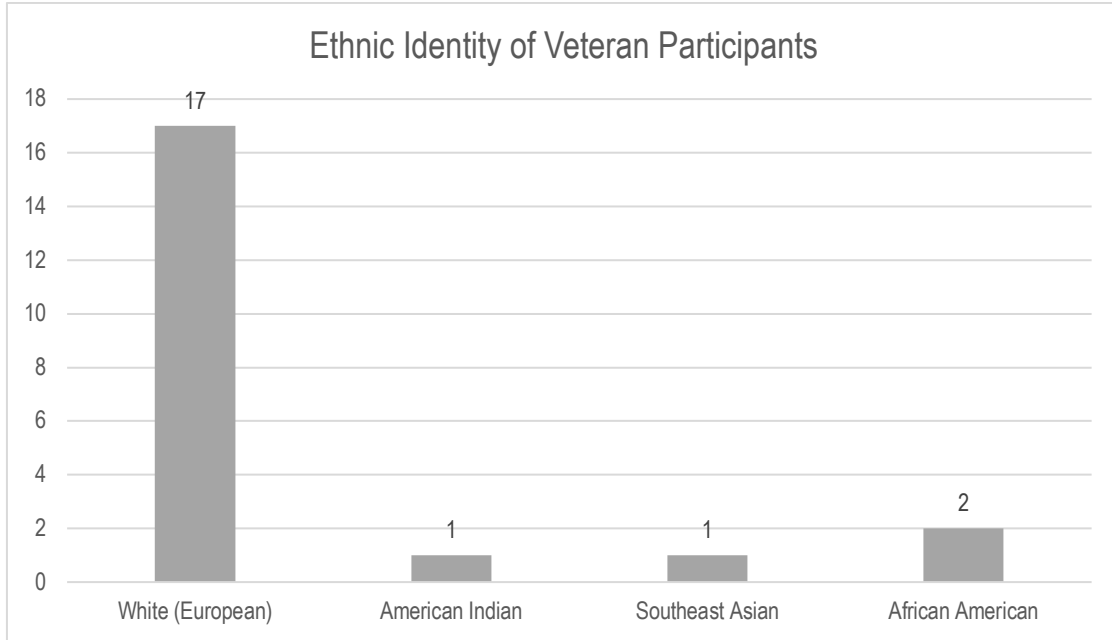
Ethnic Identity of Veteran Participants

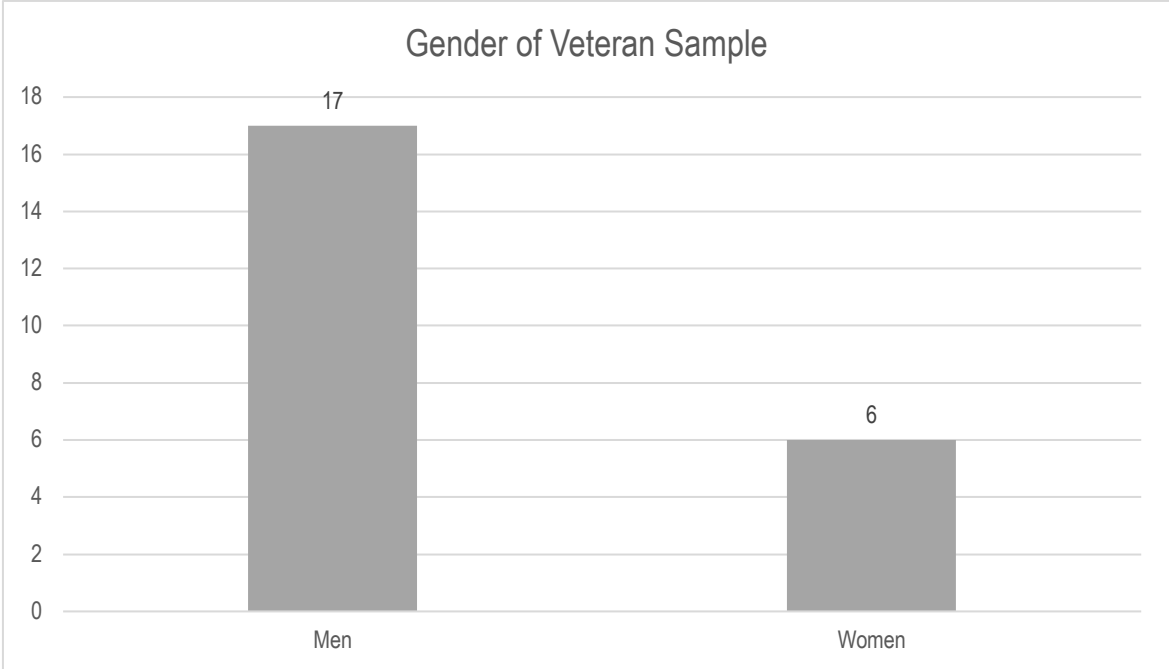Figure E2. Ethnic identity of veteran participants

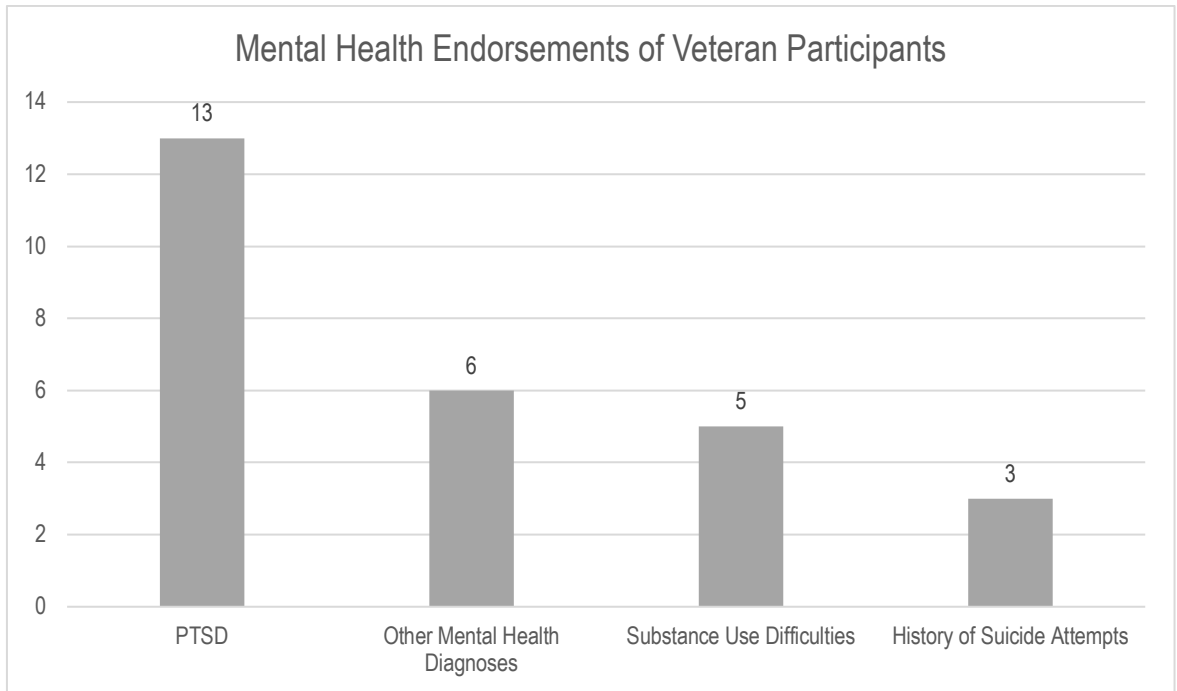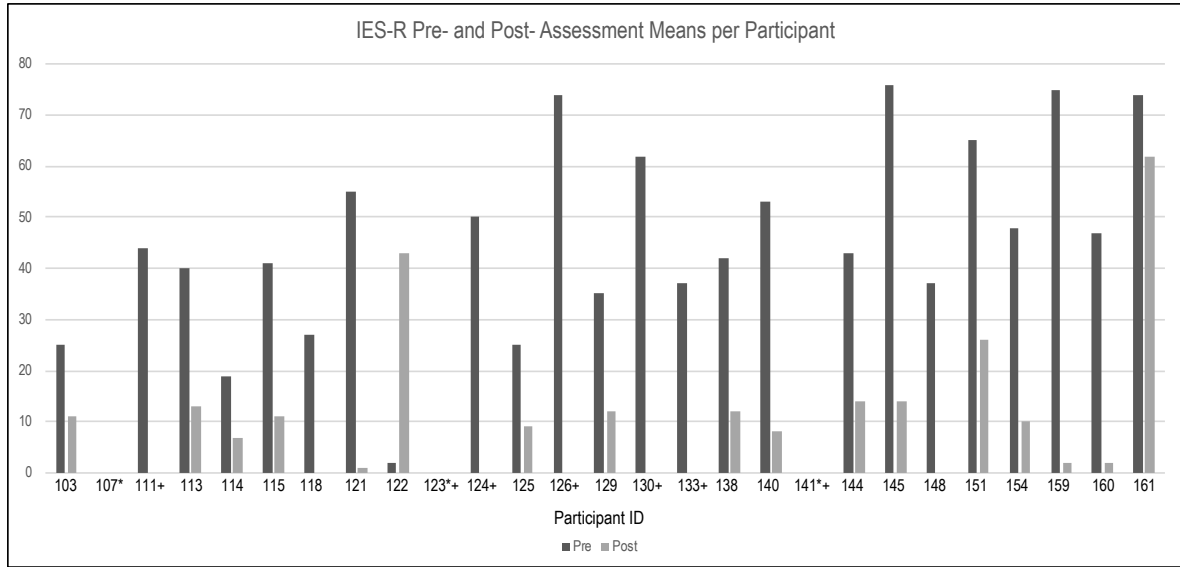Figure E3. Gender distribution of veteran sample

Figure E4. Mental health endorsements of veteran sample

* No pre data available
+ No post data available

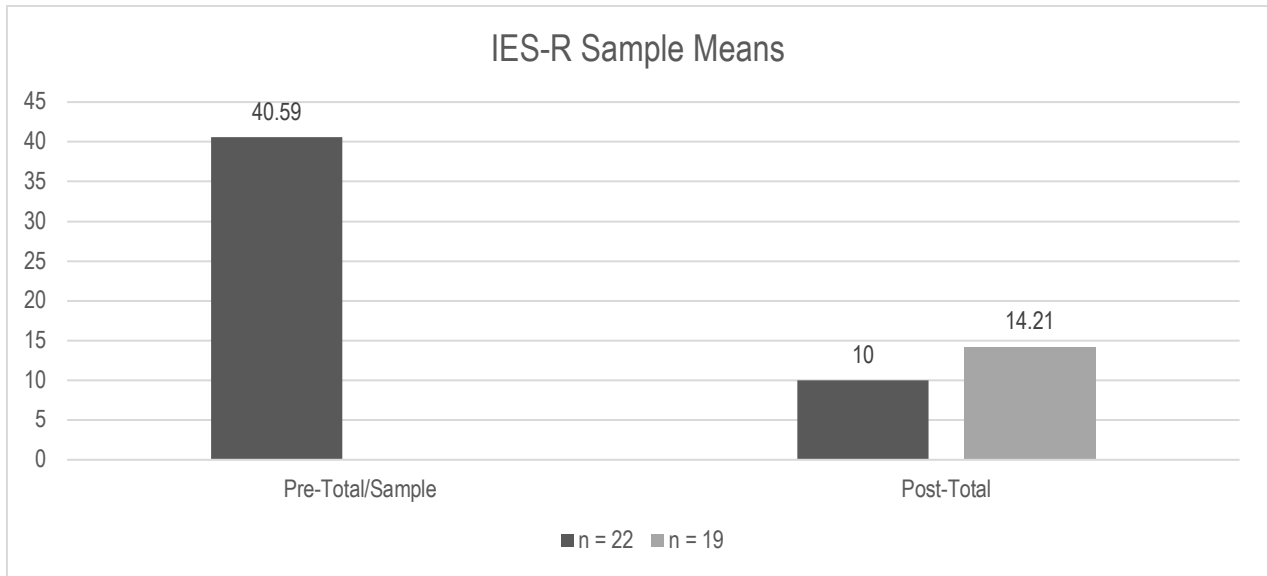Figure E5. IES-R pre- and post-intervention data

Figure E6. IES-R pre- and post- intervention sample means

Table E2

IES-R Data

Domain		Mean	Standard Deviation	Standard Error of the Mean
Avoidance				
	Pre	1.72	1.07	.25
	Post	.49	.75	.17
Intrusion				
	Pre	2.04	1.05	.24
	Post	.74	.79	.18
Hyperarousal				
	Pre	2.91	1.05	.24
	Post	.85	.85	.19
Total				
	Pre	6.67	2.90	.67
	Post	2.08	2.29	.53

Table E3

PTGI Data

Measure	Mean	Median	SD	Range	Minimum	Maximum
F1	20.07	21.00	8.66	25	8	33
F2	14.93	14.00	7.08	21	3	24
F3	13.62	12.67	5.60	19	4	23
F4	2.14	1.50	1.83	5	0	5
F5	11.64	12.00	3.65	12	5	17
PTGI	62.40	56.50	23.22	68	9	30

Appendix F: Permissions

Appendix F: Permissions

From: Weiss, Daniel <Daniel.Weiss@ucsf.edu>
Sent: Tuesday, May 28, 2019 12:38 PM
To: Terrell Powell
Subject: Re: Impact of Events Scale – Revised

see updated document

_____

Daniel S. Weiss, Ph.D.
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==

From: Weiss, Daniel
Sent: Tuesday, May 28, 2019 12:44:08 PM
To: Terrell Powell
Subject: Re: Impact of Events Scale – Revised

See attached file.

_____

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==

From: Terrell Powell <tpowell@antioch.edu>
Sent: Tuesday, May 21, 2019 18:46
To: Weiss, Daniel
Subject: Impact of Events Scale – Revised

Hello Dr. Weiss,

I am emailing you to ask you for permission to print the Impact of Events Scale – Revised in my dissertation. Please let me know if you have any questions or concerns.

Respectfully,
--
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shonpowell@live.com

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Thank you for your interest in the Impact of Event Scale-Revised (IES-R). Though the IES-R was never intended to be a proxy for a diagnosis of PTSD, its goal was to give a "temperature reading," over the prior 7 days for the core domains covered in the DSM-IV, despite an enormous number of other uses in the literature. The 2013 publication of DSM-5 added symptoms and revised the domains of the diagnostic criteria for PTSD. That change meant it was no longer appropriate to promulgate the IES-R as a measure of the core symptom domains of PTSD, its objective and validating algorithm. Therefore, I will no longer be distributing the measure or the Use Issues document.

For anyone who has already collected data with the IES-R and who obtained the scale from me, this letter serves as permission to include items or the scale in the appropriate scholarly work.

As an alternative to the IES-R, I recommend you consider the PCL-5 as a current alternative. Information about the PCL-5 can be found on the website of the U.S. Department of Veterans Affairs National Center for PTSD.

https://www.ptsd.va.gov/professional/assessment/adult-sr/ptsd-checklist.asp#obtain

I appreciate all the hard work and interest the field has taken in the measure.