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Article 6

Traumatic Brain Injury and Counselor Preparation: A Survey of Practicing Counselors and Graduate Students

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Abstract

The current study sought to determine whether practicing counselors and counseling students at the end of their program were prepared to treat survivors of brain injury. The researchers gathered both quantitative and qualitative data via a Web-based survey. Quantitative findings indicated that 1) respondents reported an average score just below the median on all items, indicating that they were neither very confident nor did they lack complete confidence, and 2) the number of experiences of working with people with TBI significantly impacted respondents' comfort, knowledge, and skill level. Qualitative findings from two open-ended survey questions indicated that counselors and counseling students felt that patience, understanding of brain injury, and knowledge of community resources were critical to working effectively with this population of clients, among others.

Keywords: traumatic brain injury, counseling, interdisciplinary

Introduction

Researchers estimate that there are between 3.2 and 5.3 million individuals in the United States living with a disability due to a traumatic brain injury (TBI). In 2010, the Centers for Disease Control and Prevention (CDC) reported approximately 2.5 million U.S. emergency room (ER) visits were resultant from a TBI (CDC, 2014). With only 2% of those visits resulting in fatality, medical professionals released the majority of survivors from the ER without admitting them. Only 11% of survivors received continued care in a hospital (CDC, 2014). Unfortunately, the aforementioned statistics are a considerable underestimate of the number of individuals who actually suffer a brain injury. These numbers do not include people who were seen in a doctor's office or clinic, those who chose not to or were unable to seek medical attention, or individuals who sought treatment through a Veterans Affairs (VA) hospital (Faul, Xu, Wald, & Coronado, 2010). Recently, a U.S. Government TBI leadership panel (CDC, NIH, DoD, and VA Leadership Panel, 2013) reported that between 2000 and 2011, more than 235,000 service members, 4.2% of total service members, sustained a TBI. Again, this is likely an underestimate of actual injuries incurred, similar to the civilian population, as these statistics only include brain injuries diagnosed as *traumatic*; other acquired brain injuries may produce similar symptom sequences. The distinction between these injury types follows.

Clarification of Terms

The way in which professionals define brain injuries further complicates the issues of incidence and prevalence. Thus, clarification of several terms is necessary for the purposes of this article. First, whether a brain injury is **acquired** or **developmental** is important for determining appropriate services for an individual and his/her family. Next, an injury may be an **acquired brain injury (ABI)** or a **traumatic brain injury (TBI).** It is unfortunate that the word *acquired* is used in both of the previous dichotomies; however, their meanings overlap and are only slightly different depending on the context. The latter pair of terms may also be referred to as non-traumatic versus traumatic injuries. Further clarification of this follows. Regardless of if the brain injury is traumatic or acquired, it may be a **closed** or an **open head injury.** This distinction often implies that the damage is **focal** or **diffuse**, which directly affects the severity and potential outcomes the survivor may endure. The authors will clarify the previously mentioned contrasting terms in the following sections.

Acquired versus developmental. This distinction is important to health care professionals. Whether the individual had a typically developing brain at one time and then incurred a brain injury has very different implications compared to someone who was born with a brain pathology and has contended with it his/her entire life. Developmental brain damage may occur in utero, at the time of birth, or shortly thereafter. Genetic brain malformations may also be included in the *developmental* division of terms. Those with developmental brain pathologies, for all intents and purposes, have contended with atypical brain function their entire life. Contrarily, people with acquired injuries must contend with the outcomes of their injury, adjust to their *new* brain, and grieve for their former capabilities that may now be lost or impaired. This grieving and adaptation process often includes the modification and potential

abandonment of life goals and personal relationships. Lastly, it is important to note that the distinction between acquired and developmental injuries is often ambiguous when an individual sustains a brain injury during childhood or infancy. These types of injuries require this further distinction because of the unique interplay between the developing brain and the brain injury.

ABI versus TBI. A traumatic brain injury is "an alteration in brain function, or other evidence of brain pathology, caused by an external force" (Menon, Schwab, Wright, & Maas, 2010, p. 1637). The external force to the head may be a jolt, bump, blow, penetrating injury (Marr & Coronado, 2004), or an explosive blast (CDC, 2014). The term TBI does not encompass other causes of injury that may affect the brain in similar ways, such as encephalitis (a term referring to different types of infections in the brain), hydrocephalus (an abnormal accumulation of cerebrospinal fluid), and hypoxic/anoxic injuries (an insufficient supply or temporary lack of oxygen to the brain, respectively). Professionals refer to the aforementioned types of pathologies generally as acquired brain injuries (ABI). Professionals may also categorize cerebrovascular accidents (CVA) as acquired brain injuries. However, for other purposes, professionals differentiate ABIs and TBIs from outcomes following a CVA because of the nature of the injury.

Focal versus diffuse and closed versus open. Professionals categorize both the mechanism of injury and the resulting damage in a dualistic manner. **Focal** brain damage occurs when an injury is localizable, and the damage did not affect multiple areas of the brain. Focal injuries are usually visible by a trained professional using brain imaging techniques (e.g., CT scans, MRIs). A CVA causes focal brain damage as do certain penetrating injuries (e.g., a sharp object penetrating an area of the brain, a low mass missile or projectile flying at high speeds; Yokobori & Bullock, 2013). Penetrating injuries, often referred to as **open head injuries**, may include brain tumor resections or removals, in which a neurosurgeon, removing a tumor, may inadvertently and unavoidably damage part of the brain. Contrarily, **closed head injuries**, which can be in the form of TBIs or ABIs, often result in **diffuse** damage. This type of damage, particularly when classified as a mild brain injury, is often not visible through brain imaging techniques (Iverson, Lange, Gaetz, & Zasler, 2013). Diffuse damage, widespread tearing or shearing of neurons, can occur anywhere in the brain, and the patterns of damage are both unpredictable and individualized. Most commonly, the cause of an acquired TBI is a fall, followed by a motor vehicle accident (Langlois, Rutland-Brown, & Wald, 2006). Though not always, open head injuries (e.g., a gunshot wound) are generally focal, whereas closed head injuries may be focal (e.g., a CVA) or diffuse (e.g., a fall, hydrocephalus, a choking incident resulting in lack of oxygen to the brain). While these distinctions are important for the diagnoses of the injury, most TBIs are a mixture of both focal and diffuse damage (Yokobori & Bullock, 2013).

In the case of diffuse injuries, both TBIs and ABIs can result in similar outcomes, ranging across all aspects of human function. This paper will focus on acquired brain injuries, as opposed to developmental ones, and will refer to both traumatic and acquired (non-traumatic) brain injuries, but will not include outcomes following a CVA. Individuals with developmental injuries experience symptoms that are reasonably isolated. Rather, acquired injuries, and particularly, diffuse injuries will be the focus due

to the global deficits experienced by survivors and their effect on cognition. The authors will use the term ABI, or simply *brain injury*, for the remainder of this manuscript.

Need for Services

Survivors of brain injury often require many health care services post-injury. Once the individual is medically stable, services needed are rehabilitative so that survivors may return to preinjury activities or pursue new endeavors in light of their changed status or identity (e.g., vocational or educational changes; beginning or changing volunteer work positions; or beginning, continuing, or discontinuing previous leisure activities). Rehabilitative services needed often include physical therapy, occupational therapy, speech-language or communication therapy, and counseling. Specifically, speech-language pathologists assess and treat the speech, language, and cognitive-communication deficits of survivors of brain injury. This coincides and intersects with counseling services as both professional fields are addressing cognitive issues and both rely heavily on the need for successful communicative interactions.

Need for counseling services. Brain injuries have garnered increased public attention in recent years. Popular media has brought attention to concussions and their long-term effects on professional athletes as well as the multitude of combat veterans returning home with brain injuries (Carone & Bush, 2012). Despite this increase in attention, brain injury survivors still do not always attain necessary services. The importance of educating and training professionals about brain injury extends to multiple disciplines and encompasses a wide range of professionals.

Counselors, specifically, have added challenges when treating clients with brain injury because of the nature of their deficits and the fact that many survivors' cognitive issues make treatment techniques and strategies more difficult to generalize and implement into everyday life. Personal relationship problems, as well occupational and life participation challenges, are often imminent. Feeling of lost identity, decreased self-worth, and changed roles in personal relationships also may negatively affect survivors. Common goals for survivors receiving counseling are improving mood, tolerance, insight, and self-esteem; decreasing frustration and stress; and reintegrating into meaningful roles (Elbaum, 2007). Additional considerations, and the ones with the most potentially catastrophic outcomes, are that survivors are more likely to commit suicide and/or develop substance abuse problems than their non-injured counterparts are.

Substance abuse. In a sample of 356 survivors of brain injury admitted to a rehabilitation program, researchers found almost 58% of the adults and adolescents had a history of alcohol and/or drug abuse (Corrigan, Bogner, Mysiw, Clinchot, & Fugate, 2001). It is difficult to determine which survivors only developed the problem post-injury because researchers rely on self-report. Survivors of brain injury typically contend with some type of memory loss, post-injury (Olver, Ponsford, & Curran, 1996) and are not always accurate in terms of their self-perception and awareness of deficits (Fleming & Strong, 1995; Hart, Giovannetti, Montgomery, & Schwartz, 1998; Mateer, 1999). However, TBI Model Systems Data indicates that between 25% and 30% of individuals who contend with post-injury substance abuse problems did not have them prior to injury (Corrigan & Mysiw, 2013).

Researchers have explored specific treatment options for survivors of brain injury regarding substance abuse, and some counseling techniques show promise in decreasing

these behaviors. Cox and colleagues (2003) found significant results using systematic motivational counseling (SMC) with 94 participants with brain injury (40 received SMC, 54 served as the comparison group).

Risk for suicide and suicidal ideations. Survivors of TBI are at greater risk of mortality due to suicide (Teasdale & Engberg, 2001), suicide attempts (Silver, Kramer, Greenwald, & Weissman, 2001), and suicidal ideation (Anstey et al., 2004). Across brain injury severity levels, survivors are more likely to attempt suicide than the general population (Simpson & Tate, 2007). Mackelprang and colleagues (2014) analyzed data from 559 survivors of brain injury and found that in the first year after injury, 25% of survivors reported having suicidal ideations. This rate is approximately 7 times more than the general population. These researchers also identified two major predictive factors for suicidal ideation: 1) depressive symptoms post-injury and 2) psychiatric history prior to injury (Mackelprang et al., 2014). Additionally, the risk for suicidal ideations remains high for the first 15 years after injury at minimum (Teasdale & Engberg, 2001). Thus, suicide prevention must be viewed as an ongoing goal, and counseling is a long-term recommendation for survivors post-brain injury.

Counseling Accreditation and Training

Currently there are three accrediting groups that review counseling programs: Master's in Psychology and Counseling Accreditation Council (MPCAC), Council for Accreditation of Counseling and Related Educational Programs (CACREP) and the Council on Rehabilitation Education (CORE). Of these programs, CORE is the only one that specifically addresses brain injury. Under section C.10.14, "Programs for specialty populations," CORE requires departments to "describe programs of services for specialty populations including but not limited to: spinal cord injury, traumatic brain injury, intellectual disabilities, sensory disability, correctional and veterans" (CORE, 2011, p. 15) but goes no further in specifically outlining how this training might be delivered.

The *2016 CACREP Standards* mentions the impact of trauma on an individual multiple times but does not have language built into the standards specifically for brain injury. In the *2009 CACREP Standards*, a trauma-causing event is defined as "direct personal experience of an event that involves actual or threatened death or serious injury, or other threat to one's physical integrity witnessing an event that involves death, injury, or a threat to the physical integrity of another person; or learning about unexpected or violent death, serious harm, or threat of death or injury experienced by a family member or close associate" (p. 62). The MPCAC *Accreditation Manual* has no mention of either brain injury or trauma. The researchers found no other consistent standard of practice incorporating knowledge or skill training in the area of brain injury into counseling programs.

Increased Prevalence

While increased media attention may have improved the general public's knowledge of the health risks related to brain injury (CDC, 2014), it may also follow that brain injuries are being identified at a higher rate than in previous years. Research about brain injury survivors continues to support their need for counseling (Burke, Degeneffe, & Olney, 2009; Lucas & Fleming, 2005). In addition, certain groups of people who are at a higher risk for brain injury, such as persons incarcerated, military personnel, rescue

workers, and victims of terrorism-related attacks, may already be more likely to need counseling.

However, the question remains, are counselors prepared with the knowledge and the skills to treat people with brain injuries? This study examines five areas in an attempt to answer this question. They included counselors': 1) comfort levels working with brain injury, 2) knowledge of the difference between traumatic brain injury and acquired brain injury, 3) necessary skills to effectively work with a survivor of brain injury, 4) knowledge of the signs and symptoms of brain injury, and 5) knowledge of the differences between the mental health issues of brain injury versus other diagnoses.

Methods

Participants

Participants of the study totaled 51. Of these 51, the researchers removed four student participants as they were not currently in, or had completed, Practicum. Further, an additional 10 were removed for incomplete data; therefore, N=37. There were a total of 282 participants solicited to participate in the study (94 from alumni, approximately 97 from a local conference, 43 doctoral level individuals, and 48 current students). This study experienced a response rate of 19.5%, and 13% completing the survey in its entirety.

Of the participants who completed the survey, 27% were between the ages of 21–30, 38% between the ages of 31–40, 8% between the ages of 41–50, 19% between the ages of 51–60, and 8% between the ages of 60–70. Gender for the participants closely reflects the counseling workforce with 74% being female and 26% male. Ethnicity for the participants was mostly homogenous with 93% being Caucasian, 7% of Asian descent, and 2% Native American. Education level for the participants also closely mirrors the counseling field with 67% having graduate degrees and 33% being graduate students. The primary work settings reported by the participants was 48% outpatient, 24% students, and 14% substance abuse. Finally, in the last 2 years, 67% of participants reported attending no brain injury specific training, 14% one session, 7% two sessions, and the remaining 12% three or more.

Instrument

The instrument utilized for data gathering in this study, the Brain Injury Direct Service Provider Questionnaire BIDSPQ (see Appendix), was constructed specifically for this purpose by the primary and secondary researchers, who utilized the *Qualtrics* platform for administration. The BIDSPQ was influenced by the TBI/ABI Direct Service Provider Questionnaire constructed by the Connecticut Traumatic Brain Injury Advisory Committee (2004). The BIDSPQ survey was submitted to and approved by the researchers' Institutional Review Board. The survey was piloted by three graduate students in the Counseling Department at the University of Nebraska Kearney to ensure readability and ease of navigation. The feedback from this process was then used to inform minor changes of the instrument. The 18-item instrument was designed to collect demographic information about the participants as well the following information: a) numbers of brain injury clients served, b) type of work setting, c) education obtained specific to brain injury, and d) perceived confidence in serving clients with brain injury.

The researchers used two questions to elicit open-ended data from participants. The first asked respondents about their specific training, education, or experience working with people with brain injury. The second queried participants about specific skills or knowledge they felt were necessary to work with clients with a history of brain injury in an efficacious manner. The researchers also implored, with a final question on the survey, whether participants were willing to engage in a future qualitative study. No identifying information of the participants was included in the results of the study.

Procedure

Participants in this study were recruited in two ways; via e-mail and in-person at a daylong conference. For those recruited by e-mail, a request to participate was sent to all active clinical mental health counseling students in a medium Midwest university, along with a link to the survey. An e-mail was also generated and distributed through the same university's alumni association of past graduates from the community and clinical mental health counseling programs, again with the link to the survey.

For those recruited to participate in-person, attendees of the aforementioned conference were informed of the study by one of the researchers. Two electronic access points (laptop computer and iPad) to the survey were made available to interested participants throughout the day. These electronic access points were connected to the same *Qualtrics* link sent in the e-mail recruitment correspondence previously discussed. Participants then could visit these electronic access points and complete the survey at their leisure during the conference.

Results

Quantitative

Descriptive results, including means and standard deviation, were calculated from the 37 participants' responses to the five survey Likert scales. For the first Likert scale question (question number 12 on the survey), "I am comfortable working with a client with a brain injury," with 1 being the least comfortable and 5 being the most comfortable, participants' mean score was a 2.79 with a standard deviation of 1.37. For the second question (number 13 on the survey), "I feel comfortable knowing the difference between a traumatic brain injury and an acquired brain injury," participants' mean score was a 2.95 with a standard deviation of 1.25. For the third question (number 14 on the survey), "I feel I have the adequate skills necessary to work with a survivor of brain injury," participants' mean score was 2.79 with a standard deviation of 1.16. For the fourth question (number 15 on the survey), "I feel comfortable with my knowledge of the signs and symptoms of brain injury," participants' mean score was 2.81 with a standard deviation of 1.21. Lastly, the fifth question (number 16 on the survey), "I feel comfortable knowing the differences between the mental health issues of brain injury vs. other diagnoses," participants mean score was 2.86 with a standard deviation of 1.18.

Additionally, the researchers employed the Kruskal-Wallis Test to determine if there were mean differences in how groups of individuals responded to the survey questions. The areas compared were ages, gender, education level, number of brain injury clients the participant had worked with, and primary work settings. Because of the low level of diverse respondents, ethnicity could not be compared. Out of all five

demographic areas compared, the single area that showed significant difference in mean scores was the number of brain injury clients the participant had worked with. On all five Likert scale questions, individuals that had worked with 10 or more brain injury clients responded significantly higher ($p < .05$) than those that had worked with 9 or less clients.

Qualitative

For the aforementioned qualitative questions, the researchers used a multiple independent rater system for analysis. Three raters independently analyzed the 42 responses for both qualitative questions. They were given the following instructions, modified from an existing study (Scofield & Hof, 2007, para. 18):

> You will recall that in addition to the request for quantitative data, two additional qualitative questions were also asked. For each of these questions you are to note, through your independent judgment, any emerging themes. Begin with the first list of responses. Read through the list of responses once in their entirety. After becoming familiar with the responses, start reducing the information by combining similar items. Continue this process until all similar items have been combined. The number of themes may vary depending on the quantity of similar or dissimilar responses. The identified themes are to then be transferred to note cards. Label each note card as to the question number and as to which of the two qualitative questions you are reviewing. Continue this process until you have reviewed all [42] questions. Then as a group all the independent raters will meet, each rater will share the themes that emerged from their reduction of the data. For an item to constitute a theme it must appear no fewer than [two] times when reducing the data. For the purposes of this study a minimum of [two] raters, out of the [three], must agree on any one item for it to be classified as a theme.

After the researchers completed the process and upon discussion, the raters reached 100% agreement for each qualitative theme.

The qualitative portion of the study sought to identify 1) what specific training, education, or experience participants had received that prepared them to work with survivors of brain injury, and 2) based upon their experiences, what specific skills and knowledge were required to work effectively with a survivor of brain injury. The results of this portion of the study were not intended to be the foundation for a mixed methods study, but instead yielded valuable insight into how participants were able to provide counseling services successfully to clients despite it not being a significant portion of their counselor training.

The first area of qualitative inquiry in this study was around what specific training, education, or experience participants had received that prepared them to work with survivors of brain injury. This study found four main themes for this area. The first theme that emerged from the data was *formal training*. This theme, comprised of 18 codes, encompassed responses like “department training through organization,” and “indirect training at workshops.” Highlighting the absence of organized training of counseling students in brain injury, the second theme that emerged from the data was *none* with a total of 13 codes comprising it. The third theme of *personal experiences*, comprised of 2 codes, included responses of “family friend who experienced TBI,” and “…within my own biological family having grown up with a cousin experiencing special needs.” The final theme of *self-directed learning*, comprised of 7 codes, included

responses of "…professional reading…", and "I researched articles and resources to better understand the impact on the client and how I could best assist her."

The final area of qualitative inquiry in this study was based upon the participants' experiences, attempting to identify what specific skills and knowledge were required to work effectively with a person with a brain injury. This study discovered three themes to account for this. The first theme of *knowledge of brain injury* emerged from the data. This theme was comprised of three subthemes with a total of 34 codes. Here, participants identified that knowledge of brain injury itself was needed ("…understanding what part of the brain was injured, and what systems to expect to be affected"), how it impacted survivors individually ("TBI possible effects on cognition, emotions, and behaviors"), and finally resources ("knowledge of community resources for referral for the patient, but also for the caregivers, significant others, family members, etc."). The second theme to emerge from the data was the *importance of patience*, comprised of 16 codes, which included statements of "patience and understanding," and "patience and empathy." Again highlighting the absence of formal training for counselors, the final theme to emerge from the data, *unsure*, was that of "N/A" and "not sure." This theme was comprised of 5 codes.

Discussion

Quantitative

Results from the quantitative portion of this study support two main conclusions. First, participants' mean scores were lower than the possible median (3) on all Likert scale items. These means, along with what their standard deviations suggest, that most participants were somewhat comfortable with their knowledge of brain injury, and their skills and preparedness for working with clients with brain injury are present. The highest mean score of all Likert scale items was the participants' ability to distinguish *acquired* and *traumatic* brain injuries from one another (mean= 2.95), though, no Likert items were significantly different from one another. An understanding of the difference between the two terms was not assessed further. Second, participants that had worked with 10 or more clients with brain injury reported higher levels of comfort on all Likert scale items than those who had worked with fewer than 10 such clients. In general, these findings indicate that no participants were maximally comfortable working with brain injury survivors and that experience doing so was the only factor that helped increase their comfort level. This may indicate that counselors and counseling students are in need of further education about brain injury, in a more formalized sense rather than just on-the-job training, as well as more exposure to working with brain injury survivors.

Qualitative

The qualitative portion of this study explored how counselors, or counseling students near the end of their programs, a) became comfortable working with brain injury by inquiring about their training, education, or experiences that prepared them to serve this population, and b) what specific skills and knowledge was required to be effective. The researchers discovered in both questions, themes of an absence of formal training and experiences. This is somewhat expected given the lack of TBI included in accreditation standards. However, overall participants in the study reported an average just slightly below the median self-assessment of their abilities.

The qualitative portion of the study also seems to highlight the counseling field's foundational teachings of classic Rogerian principles (e.g., value in consultation with peers and experts, and the importance of self-directed learning to build an expertise area), as they appear to aid counselors in serving survivors of brain injury. These findings suggest that the current accreditation standards, although largely absent of a focus on brain injury, are sufficient in the areas of techniques and relationship building. However, they are likely not adequate in specific knowledge regarding brain injury and brain injury survivors. However, as discussed earlier, this does not take into account the underreporting of brain injury for those who sought services from Veteran Affairs (VA), doctor's office and clinic settings, or those who never sought treatment (Faul et al., 2010). Also, it does not prepare the counseling field for the estimated 4.2% of service members returning home for counseling services who are survivors of these events (CDC, NIH, DoD, and VA Leadership Panel, 2013). Accrediting bodies would be wise to infuse brain injury issues into the counseling curriculum, especially into assessment and clinical coursework to reduce the gap of unidentified brain injuries and the delivery of informed services for those diagnosed with a brain injury.

Suggestions for the Field of Counseling

The current study suggests that training of counseling students in brain injury is necessary. The manner in which that training should take place remains unclear, however, the authors of this study suggest that, at a minimum, students should receive a 2–4 hour brief overview of the topic by an expert in the field of brain injury with an emphasis on the day-to-day lived experience of survivors. Further, this study identifies that counseling survivors of brain injury requires a skill set that neither field (Speech Pathology or Counseling) possess alone.

A true collaborative approach would be required to develop the high quality training needed by all counselors. This inter-professional education, ideally, would be incorporated into the CACREP curriculum and co-taught between Speech Language Pathology and Clinical Mental Health Counseling core faculty to equip new graduates in the field of counseling. For those counselors already in the field, this cross training would be provided in a workshop setting with the same disciplines represented over the course of 10–16 hours.

Suggestions for Future Research

The present study is not without limitations. Primarily, future research should increase the sample size to enhance the response rate. Second, expanding the geographical area outside of central Nebraska to regional areas would enhance and strengthen the results. Finally, more male participants and individuals with doctorate degrees would aid in understanding the need for additional training of clinical mental health counselors in the area of TBI .

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Note: This paper is part of the annual VISTAS project sponsored by the American Counseling Association. Find more information on the project at: http://www.counseling.org/knowledge-center/vistas

Appendix

Brain Injury Direct Service Provider Questionnaire

1. Informed Consent
2. Age
   a. 21–25
   b. 26–30
   c. 31–35
   d. 36–40
   e. 41–45
   f. 46–50
   g. 51–55
   h. 56–60
   i. 60–70
3. Sex
   a. Male
   b. Female
4. Ethnicity
   a. African descent
   b. Asian descent
   c. Caucasian
   d. Latino/a
   e. Native American
   f. Other
5. Educational Level Attained
   a. Master's
   b. Graduate Student
   c. Doctoral
6. How many individuals have you provided services to with brain injury?
   a. 1–3
   b. 4–6
   c. 7–9
   d. 10+
7. Primary work setting
   a. Inpatient Medical
   b. Inpatient Psychiatric
   c. Inpatient Substance Abuse
   d. Outpatient
   e. Outpatient Substance Abuse
   f. Veteran Affairs
   g. I am a student currently
   h. Other
8. What specific training, education, or experience have you received that prepared you to work with people with brain injury?

   _____

9. Based upon your experiences, what specific skills and knowledge are required to work effectively with a person with a brain injury?

   _____

10. In the past two years, how many brain injury training sessions have you attended?
    a. None
    b. 1
    c. 2
    d. 3
    e. 4
    f. 5
    g. 6
    h. 7
    i. 8
    j. 9
    k. 10+

11. What type of clinician are you?
    a. Part-time
    b. Full-time
    c. Student

12. I am comfortable working with a client with a brain injury (1 = minimum comfort and 5 = maximum comfort).
    1 2 3 4 5

13. I feel comfortable knowing the difference between a traumatic brain injury and an acquired brain injury (1 = minimum comfort and 5 = maximum comfort).
    1 2 3 4 5

14. I feel I have the adequate skills necessary to work with a survivor of brain injury (1 = minimum comfort and 5 = maximum comfort).
    1 2 3 4 5

15. I feel comfortable with my knowledge of the signs and symptoms of brain injury (1 = minimum comfort and 5 = maximum comfort).
    1 2 3 4 5

16. I feel comfortable knowing the differences between the mental health issues of brain injury vs. other diagnoses (1 = minimum comfort and 5 = maximum comfort).
    1 2 3 4 5

17. Would you be interested in being a part of a focus group or face-to-face interview (scheduled at your convenience) in the future.
    a. Yes, e-mail_____
    b. No

18. Are you currently taking or have you completed practicum?
    a. Yes
    b. No