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## Article 73

# When Treatment Becomes Trauma: Defining, Preventing, and Transforming Medical Trauma

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#### Abstract

Medical trauma, while not a common term in the lexicon of the health professions, is a phenomenon that deserves the attention of mental and physical healthcare providers. Trauma experienced as a result of medical procedures, illnesses, and hospital stays can have lasting effects. Those who experience medical trauma can develop clinically significant reactions such as PTSD, anxiety, depression, complicated grief, and somatic complaints. In addition to clinical disorders, secondary crises—including developmental, physical, existential, relational, occupational, spiritual, and of self—can lead people to seek counseling for ongoing support, growth, and healing. While counselors are central in treating the aftereffects of medical trauma and helping clients experience posttraumatic growth, the authors suggest the importance of mental health practitioners in the prevention and assessment of medical trauma within an integrated health paradigm.

The prevention and treatment of trauma-related illnesses such as post-traumatic stress disorder (PTSD) have been of increasing concern to health practitioners and policy makers in the United States (Tedstone & Tarrier, 2003). From servicemen and women returning from combat positions overseas to the ever-present threats of global terror, our society has been challenged to determine the best, most efficient, and most cost-effective methods for preventing and treating the psychological and emotional impacts of trauma. With so much attention being paid to the more newsworthy sources of trauma, we risk ignoring more common events that have a remarkable prevalence rate: medical trauma.

According to the *Diagnostic and Statistical Manual of Mental Disorders* (4th ed., text rev.; *DSM-IV-TR*; American Psychiatric Association [APA], 2000) trauma is direct personal experience of an event that involves actual or threatened death or serious injury,

with the response involving fear, helplessness, or horror (p. 463). The *DSM-IV-TR* lists events that have the potential of being traumatic, including: combat, assault (sexual and physical), terrorist attacks, torture, natural disasters, automobile accidents, and life-threatening illnesses, as well as witnessing death or serious injury to another. When one considers the common denominators of these events, such as real or perceived threat to one's life or well-being and diminished personal power, it becomes clear that experience in the medical setting has the potential to be traumatic, too.

### **Prevalence of Medical Procedures**

In the United States, the number of patients who encounter life-threatening medical diagnoses and procedures is quite staggering. As of January 2009, there were 12,553,337 cancer survivors (National Cancer Institute, 2013). According to the Centers for Disease Control and Prevention (CDC), 935,000 Americans have a heart attack each year, with 610,000 being first heart attacks (2013a). The CDC also tracks HIV prevalence rates in the U.S.: 1,148,200 Americans 13 and older are currently living with the disease (HIV Surveillance Supplemental Report, 2012). Reports of strokes are no less shocking: 785,000 people have a stroke each year, with approximately 137,000 deaths (CDC, 2013b). Beyond these life-threatening diagnoses, the number of people visiting emergency rooms for various reasons in 2006 was quite alarming at 136.1 million (CDC, 2012b). Also according to the CDC, there were 36.1 million discharges from hospital stays. Pulmonary emergencies such as asthma caused more than 1.75 million emergency department visits and 456,000 hospitalizations (Akinbami, Moorman, & Liu, 2011). Surgeries in the U.S. were prevalent in 2006, at 53.3 million (CDC, 2010b). Regarding childbirths, 32.8% were completed via caesarean section, with more cases being emergent or health-related rather than elective (CDC, 2010a). That is well over one million births, just in one year alone.

We chose to highlight these medical diagnoses and associated treatments because they clearly have the potential for eliciting strong emotions from patients given that they would meet the criteria for "life-threatening illnesses." Considering the life-altering effects and powerlessness of receiving a cancer diagnosis, having a heart attack or stroke, or experiencing childbirth-related trauma, it is understandable that some patients will experience these events as traumatic, even developing into posttraumatic stress disorder.

## **Impacts of Medical Trauma on Mental Health**

#### **Medical Posttraumatic Stress Disorder**

Before addressing the counselor's role in preventing and treating medical trauma, it will be helpful to review prevalence rates for PTSD and depression across medical diagnoses and contexts. Posttraumatic stress disorder that develops as a result of a medical diagnosis, procedure, or error has been the focus of several studies that seek to understand the longer-term impact of medical traumas. It can be challenging to isolate this reaction to the specific antecedent, which in this case is the medical procedure or diagnosis. Pre-existing mental health conditions, specifically from past traumas, can confound the results making it difficult to isolate the medical trauma as the source of the reaction. This certainly has been the case when studying posttraumatic stress disorder and childbirth traumas (Menage, 1993). The following section presents a summary of selected research.

**Heart attacks and strokes.** In their meta-analysis of research studies examining PTSD and related responses to medical experiences, Tedstone and Tarrier (2003) found evidence of traumatic stress responses to a wide variety of medical diagnoses and treatments. Most studies of PTSD following a heart attack, or myocardial infarction (MI), found prevalence rates ranging from 16% (Kutz, Garb, & David, 1988) to 10.8-18% following cardiac surgery (Stukas et al., 1999). It is important to note that the percentage of patients who experience PTSD-like symptoms, but who do not meet the full criteria for the diagnosis, has been found to be much higher in MI cases (Tedstone & Tarrier, 2003). In addition to the life-threatening experience of a heart attack, people who experience a stroke or brain hemorrhage are also vulnerable to developing PTSD, with rates ranging from 9.8% to as high as 32% (Berry, 1998; Sembi, Tarrier, O'Neill, Burns, & Faragher, 1998).

**Childbirth and gynecological trauma.** This category of medical events includes childbirth, birth by cesarean section, miscarriage, and abortion. For many women, normal childbirth can be traumatic, with up to 1.7 - 3% meeting the criteria for PTSD between 1-13 months post-partum (Czarnocka & Slade, 2000; Wijma, Soderquist, & Wijma, 1997). The rates of PTSD increase dramatically to 77% when a woman loses her child in childbirth (Engelhard, van den Hout, & Arntz, 2001). While it can be difficult to isolate the childbirth experience as the source of PTSD in some women with complex histories that include risk factors for PTSD, studies have successfully minimized confounds. Menage (1993) studied 500 women who underwent obstetric and gynecological procedures, and found that 100 women described the procedure as being "terrifying" or "very distressing," while 30 met the full criteria for PTSD (p. 221). Of the 30 women who met the criteria for PTSD, 14 had only suffered the gynecological trauma and had no pre-existing conditions or risk factors.

Stays in the intensive care unit (ICU). Some medical traumas require longerterm inpatient treatment to stabilize the patient, such as the intensive care unit. Studies of patients in this setting have yielded alarming results ranging from 18.5% to 59%, with measures taken up to 9 years following the ICU stay (Stoll & Schelling, 1998; Schelling et al., 1998; Schelling et al., 1999). It can sometimes be difficult to attribute the development of PTSD to the ICU experience given that some patients were in the hospital for complications from a traumatic injury; however, "whilst life-threatening injuries requiring ICU admission are frequently perceived as more psychologically traumatic, there is an increasing body of evidence suggesting a dependent relationship between ICU admission and the later development of PTSD, irrespective of the events preceding ICU admission" (Hatch, McKetchnie, & Griffith, 2011, p. 1).

**Human Immunodeficiency Virus (HIV).** There have been multiple studies examining the mental and emotional impact of an HIV diagnosis, specifically PTSD. A study of 61 homosexual or bisexual men found that 30% had developed PTSD within 4 years of learning of their HIV status (Kelly et al., 1998), and a study of 67 African-American women found rates of 35.3% for PTSD between 12-14 months following their first positive HIV test. Additional qualitative studies show chronic PTSD in patients living with HIV (Howsepian, 1998).

The studies listed above show a clear prevalence of PTSD following medical diagnoses, treatment, and/or hospital stays. While it is critical that counselors consider medical traumas as a potential cause of PTSD, it is also imperative that we recognize other mental and emotional effects of medical trauma, including depression and grief.

## **Other Issues**

**Depression.** There have been numerous studies examining the connection between medical traumas and depression and anxiety. For example, in a study of 51 ICU survivors, 31% showed evidence of anxiety and depression 9 months later (Sukantarat, Williamson, & Brett, 2007). Scragg, Jones, and Fauvel (2001) found that in 80 adults treated and discharged from ICU, 47% reported clinically significant anxiety and depression on the Hospital Anxiety and Depression Scale (HADS), with 15% meeting full criteria for PTSD. In yet another study measuring depression and anxiety in 157 adult patients 3 months following discharge from the ICU, 46.3% had depression and 44.4% had anxiety (Wade et al., 2012). In a meta-analysis of 14 studies using the HADS, the mean prevalence of clinically significant depression was 28% (Davydow, Gifford, Desai, Bienvenu, & Needham, 2009). While most studies of depression and anxiety in ICU patients survey a range of ages, some have also demonstrated depression in older adult survivors (Vest, Murphy, Araujo, & Pisani, 2011). In sum, experience in intensive care has been shown to be a contributing factor in depression.

Although many studies focus on the development of depression and anxiety in intensive care, others examine the psychological effects of life-threatening illnesses such as cancer and heart attacks. In a study of 405 oncology patients, 135 had comorbid depression and anxiety and 174 had depression alone (Brown, Kroenke, Theobald, Wu, & Tu, 2010). Schleifer et al. (1989) also found that of 171 patients following the heart attack, 45% met the criteria for either major or minor depression immediately following the attack, and 33% met the criteria 3-4 months later. It is clear from these statistics that depression and anxiety commonly accompany serious medical illnesses and procedures.

**Grief.** While there are a plethora of articles concerning grief and loss associated to losing a loved one from illness or accidents, there is scant research concerning the loss experienced by patients confronting medical traumas. In a study of the impact of mindfulness on issues of existential loss in breast cancer survivors, Tacón (2011) asserted that

Loss and grief are experienced by many as they come to grips with the disease, deal with the side effects of treatment, and struggle on a daily basis with a precarious future and possible death. Cancer's uncertainty can be ever present—even years after treatment during survivorship—haunting like a ghost, making not only cancer worry common, but also existential issues. (p. 644)

Tacón (2011) listed potential losses associated with a cancer diagnosis, emphasizing the loss of self, independence, decreased cognitive and physical functioning, role in the family, and anticipatory grief, which brings with it a wide range of emotions.

It is evident that people can experience significant clinical mental health issues such as PTSD, depression, and anxiety following a medical event, and while not as widely studied in this context, grief is an understandable response to the sometimes extreme life changes brought on by medical traumas. In addition to understanding the more clinical concerns experienced by our clients, it is also necessary to examine the secondary crises that bring our clients to counseling.

### **Secondary Crises**

Secondary crises can often precede or follow a medical trauma. Persons who are experiencing high levels of stress in developmental, physical, existential, relational, occupational, or spiritual domains of their life (Hall, 2006) may be at risk for struggling with difficult personal medical procedures. In addition, several risk factors such as low social status and being in the lower 15% percent of physical and mental health were found related to developing PTSD following a traumatic life event (O'Connor, Christensen, Jensen, Moller, & Zachariae, 2011; Seligman, 2011). A medical trauma can likewise impact life domains in such a way that a crisis develops after the procedure. Although we discuss these life domains as having the potential for secondary crises, they are no less important in assessing and treating as part of an overall wellness plan. The following sections highlight examples and considerations of secondary crises post medical trauma.

**Developmental.** Developmental crises can arise when a traumatic procedure impacts a person's developmental progression in negative ways resulting in a change in quality of life (Plagnol & Scott, 2011). For example, a high school senior who undergoes an operation causing her to miss graduation with peers could be considered a developmental crisis. It could also be socially traumatic. Furthermore, post-high school goals might be delayed resulting in a change in the start of career plans. Multiple changes in goals, emotions, and social interactions become challenges we address in counseling.

**Physical.** Medical procedures, by design, are related to the repair or change of the physical body. Patients are taught about physical recovery and how to best heal; however, sometimes a traumatic experience may leave the patient with physical limitations that require fundamental changes in how they participate in life (Kratz et al., 2010). For instance, physical changes may limit people's ability to climb a flight of stairs in their home thus forcing a change in residence. The same physical limitation might also impede their ability to run or swim during the afternoons, activities they once enjoyed. Either scenario could have a psychological and emotional impact in ways that might be overwhelming, such as contributing to depression or anxiety.

**Existential.** Secondary crises that are existential in nature relate to understanding the meaning behind the trauma or life in general. On a deeper level, however, is the existential struggle with one's identity and what the new limitations and lifestyle say about him or her. Questions arise that require reflection and answers. Oftentimes, medical trauma may bring people close to death in ways that make their mortality, or their awareness of it, much more urgent (Yalom, 1980). The idea that life is fragile and limited may encourage a renewed commitment to finding meaning in life (Varahrami, 2010). The inability to either search for or find meaningful ways to live can further exacerbate or trigger anxiety and/or depression leaving one in an existential crisis (Frankl, 1984).

**Relational.** Relationships can also be impacted by medical trauma. The quality and frequency of established relationships may change in ways that bring people closer or begin them drifting apart (Walsh, Manuel, & Avis, 2005). Couples who experience a traumatic childbirth may feel insecure in their own sexuality which impacts their personal and relational vulnerability to one another. Communication may then shift from

transparency to guardedness (Gottman & Silver, 1999) with the relationship itself becoming a point of stress and mistrust. Certainly the depression or anxiety triggered by a medical trauma can impact people's relationships, thus prompting a relational crisis.

**Occupational.** The occupational or career domain can represent a major part of people's identity in addition to their livelihood. A medical procedure that leaves a person without hearing might severely impact career choice and require him or her to change professions or retrain (such as a counselor who would need to learn sign language to then specialize with hearing disabled clients). The realization of *how* people continue their work or the actual place of work in their lives (Tiedtke, de Rijk, de Casterle, Christiaens, & Donceel, 2010) can become a central focus of counseling.

**Spiritual.** Medical procedures and/or trauma that follow can quickly draw upon people's faith in others, the medical system, their own ability to recover, and/or their relationship with a higher power. For many people, religious and spiritual beliefs are intricately tied to how meaning is made of events and therefore impacts coping strategies (Wortmann, Park, & Edmonson, 2011). A person who has a strong belief in God and who is suddenly facing a traumatic medical procedure may have feelings of anger and confusion as to how this could happen. This can result in being less reliant on faith in God and belief in one's own resilience.

**Self.** People's identity, or how they view themselves, is a fundamental part of self-efficacy and intrapersonal development (Johnston, 2012). Stevens (1990) stated that the Self is the center core of our being which influences and sustains our psychic development across the lifespan. When the self-identity is in question as a result of a traumatic experience, there is often a redefining of oneself. A person who was assertive and independent prior to a traumatic surgery might later view him/herself as more dependent and passive with less confidence. This shift in self-perception could have further implications in life areas such as relationship and career.

People can experience a wide-range of reactions to being sick, injured, or hospitalized. While some develop PTSD and depression, others may struggle more with secondary crises. For some, the illness is the primary cause of the traumatic reaction; for others, aspects of the medical setting can contribute to feelings of powerlessness and fear.

## The Medical Setting and Trauma

#### **Procedures**

While the knowledge of having certain life-threatening diagnoses can activate traumatic stress reactions or other mental health crises for patients and/or their families, the processes required for treating such diagnoses can contribute to this reaction. From procedural elements (e.g., the timing of informed consent) to treatment elements (e.g., levels of pain experienced and sedation and medication used), factors within the treatment approach are certainly worthy of examination as we strive to understand the risk factors for experiencing medical trauma.

**Informed consent.** There is no doubt that informed consent is imperative in ensuring that patients and clients are empowered in making sound healthcare decisions. More than simply information, informed consent is a process and an opportunity for healthcare providers—be it surgeons, physicians, or counselors—to strengthen the relationship through effective and compassionate communication. According to the

American Academy of Orthopaedic Surgeons (Fleeter, 2010), a primary goal of informed consent is to increase understanding of a procedure by ensuring that patients know risks inherent in the treatment, probabilities of success, frequencies of risks, alternative treatments, and any other information pertinent to making an informed decision. Although this information can be crucial in forming judgments about a procedure, it could also trigger anxiety in patients who perhaps had either not thought seriously about the risks or were unaware of the risks. In addition, the timing of the informed consent process can certainly influence a patient's reaction to this information. While it is one thing to discuss potentially life-threatening risks a few days or weeks before a procedure, it is quite another thing to discuss just before administering the anesthesia. Even in the most straightforward of surgeries, if a patient reads that one possible risk of the forthcoming procedure is death, this can be enough to initiate a fight or flight response.

**Medications.** Although we tend to think of sedation as a helpful and even protective component of treatment, studies have implicated sedation in the development of post-traumatic stress disorder. Wade et al. (2012) found that the strongest risk factor for PTSD in the ICU was the duration of sedation (i.e., the longer the sedation period, the higher the likelihood of PTSD). In addition, inotropes and vasopressors (drugs used for cardiac conditions that affect blood pressure) are medications known to enhance emotional memories (Brewin, Dalgleish, & Joseph, 1996), a characteristic common in anxiety disorders (Wade et al., 2012). There was also a strong association between depression at three months and receiving benzodiazepines (such as tranquilizers) in the ICU (Wade et al., 2012), as it is hypothesized that this class of drugs reduced central monoamine activity.

**Pain.** Pain is a common occurrence in many medical traumas, whether organically from an illness or as a result of medical procedures. The comorbidity of pain and psychological disorders has been the focus of scholarly research for years (Beck & Clapp, 2011). While the authors examined studies devoted to understanding chronic pain, they recognize that "early pain emerges as a robust predictor of chronic PTSD whereas early symptoms of PTSD confer risk for the development of chronic pain" (Beck & Clapp, 2011, p. 103). Moeller-Bertram, Keltner, and Strigo (2012) also recognized a relationship: "Components of PTSD maintain and exacerbate symptoms of pain and vice versa" (p. 590). The authors explained that while in a traumatic situation, we can experience a "stress-induced analgesia," but that "chronic negative emotions (anxiety disorders and depression) can increase pain behaviors by activating amygdala-linked pain-facilitating pathways" (p. 592). Clearly, pain is one element within the treatment setting that can contribute to developing mental health concerns, and vice-versa.

Aspects of medical procedures, such as informed consent, medication, and the experience of pain can exacerbate a medical trauma leading to mental and emotional vulnerability in the healthcare setting. In addition to procedural elements, the medical environment can trigger intense emotional responses in patients.

#### Environment

While diagnoses and related procedures have been shown to elicit serious psychological reactions in patients, the environment in which medical treatment takes place can also influence their emotional well-being. For many people the hospital or other clinical setting is an environment that is very different from their own; indeed, the physical surroundings, reduced personal agency and volition, and personal symbolism and history can influence a person's experience in the setting and can contribute to a stress response.

**Ecological discordance.** In ecological terms, concordance means there is a fit between a person and his or her environment (Cook, 2012). For many, a hospital setting is foreign. For adults receiving treatment for life-threatening medical diagnoses or injuries, entering the acute care setting marks a departure from all that is comfortable and understood. People can experience unease surrounded by equipment, monitors, unfamiliar spaces, and a general lack of privacy. While most acute care and other clinical settings strive to create environments that are as comfortable as possible, they are in the end still clinical environments – and this fact can be difficult for some to overlook.

**Powerlessness.** Most adults have become habituated to having a certain level of personal power and autonomy in their lives. They decide whom to allow in their personal space, and they choose the timing, frequency, and duration of physical touch. While we are not devoid of all decision-making power when we enter the hospital setting, we still are expected to acquiesce to procedures that are in our best interest, as deemed by our physicians. Strides in patient-centered care are important, yet many adults have been socialized to yield to those with more training and education. Perceived or actual powerlessness can incite strong psychological responses, including PTSD, depression, and anxiety (Jones et al., 2007). While adults do have the ultimate authority regarding decisions about their care, the experience of being "under the care" of others can affect perceptions of personal power.

**Disorientation.** Most people who have stayed in the hospital could attest to the disorienting nature of the environment. For most adults accustomed to following their own schedules, the experience of being without their calendars, clocks, and other items linking them to daily tasks and goals can be disconcerting. When we add sedation, medications, and sleep deprivation to the general absence of a temporal context, it is not surprising to find that some patients can become disoriented. In their study of the emotional impacts of the ICU experience, Wade et al. (2012) found "high mean scores for mood disturbance and stress in response to sleep deprivation, difficulty breathing, pain, inability to communicate, low control, hallucinations and nightmares" (p. 12). Additional studies validated mood disturbances as a result of sedation (Kress et al., 2003) and sleep disturbance (Hofhuis et al., 2008), which are common experiences in ICU.

It is evident from the research presented that there are multiple factors that contribute to medical trauma, from life-threatening diagnoses to treatment procedures and the clinical environment. Another critical factor in understanding medical trauma is the patient's unique response.

## The Patient/Client's Role

**Risk factors.** In most studies of medical traumas with psychological implications, authors discuss risk factors. In their meta-analysis of medical post-traumatic stress disorder, Tedstone and Tarrier (2003) included numerous risk factors to psychological pain in reaction to a medical diagnosis or event: Age, socio-economic status, quality of social relationships, pre-existing mental health diagnoses, memories of the event, length of stay (specifically related to ICU), perception of the quality of care, relationship with medical staff, and other factors related to treatment (e.g., length of sedation, medications

used, sleep disturbances, etc.). Additionally, risk factors for women include prior interpersonal trauma and childhood sexual and emotional abuse (Seng, D'Andrea, & Ford, 2013). Wade et al. (2012) asserted that the strongest risk factor for PTSD and depression is a patient's mood in the ICU.

While we continue to learn how risk factors influence a patient's reaction to medical trauma, we are reminded that protective factors play a significant role in how patients and their families respond to these circumstances. Colville and Cream (2009) surveyed the parents of 61 children who had been discharged from the Pediatric Intensive Care Unit (PICU) within 4 months, about their reactions to this experience. Of the 70% who responded, 88% were able to grow *despite* this experience. About this study Schieveld (2009) explained that there needs to be a balance between what a trauma demands and what protective factors are in place: "Thus, with 'balanced' stress and a 'balanced' impact, many people can find another, more significant meaning to their disaster and acquire the resilience required to pick up and continue their lives" (p. 780).

#### Medical Trauma: Prevention, Intervention, and Transformation

#### The Counselor's Role

**Prevention.** When patients experience adverse emotional reactions to medical trauma, they typically seek help after the fact, if they seek help at all. While many medical settings are taking steps to integrate physical healthcare with mental healthcare, there is still much room for improvement. One of the fundamental values of the counseling profession is prevention, and it is through this lens that we must examine our role in helping patients (and clients) who experience medical trauma. Hatch et al. (2011) said it well:

The approach to the overall psychological care of these patients should surely be proactive (rather than reactive) and should begin during ICU admission, demonstrating the residual symptoms and signs of psychological disturbance in ICU survivors once they have been discharged from hospital may reflect a missed opportunity of earlier and potentially more effective intervention. (p. 3)

Wade et al. (2012) remind us that "the identification of ICU mood as one of the strongest risk factors in the study suggests that emotional stress reactions in intensive care may be a trigger for, or early manifestation of, future psychological morbidity" (p. 13). We know from research that when a patient with risk factors for PTSD and depression experiences a medical trauma, there is a greater likelihood that he/she will develop these disorders post-discharge.

Given the many tools available for screening depression, anxiety, and other risk factors associated with developing traumatic stress reactions post-medical trauma, it seems logical to implement use of such instruments. The Hospital Anxiety and Depression Scale (HADS; Zigmond & Snaith, 1983) is a reliable instrument used to measure states of depression and anxiety in a medical setting. Likewise, the Depression, Anxiety and Stress Scale (DASS; Crawford & Henry, 2003) is reliable with Cronbach alpha values between 0.92–0.95 for each subscale, which confirms its internal consistency. Both instruments correlated strongly for anxiety (r = 0.88) and depression (r = 0.93; Crawford & Henry, 2003). By utilizing these instruments in the hospital setting

prior to admission or early in the treatment episode, healthcare professionals can identify patients in need of help from a mental health professional. In addition to screening patients for these risk factors, counselors can also make significant contributions to intervention efforts within the medical setting.

Assessment. For counselors to be most effective in treating medical traumas, we have to improve our ability to identify when a client's problems are the direct result of a medical trauma. This will require that we pay as much attention to our clients' medical histories as we do to their social histories. A counselor might initially be more alarmed to see "sexual trauma" in a client's history versus "C-section" – but if we fail to inquire about the client's experience of that procedure we may not fully understand how this aspect of her history has impacted her mental and emotional health and wellbeing. Ask follow-up questions about complications, internal experiences, impacts of a physical, emotional, and spiritual nature, and life changes as a result of the illness or procedure, including if they have had any difficulty seeking preventative care from medical professionals since the trauma occurred. It is possible that your client has never connected his or her current struggle with a past medical trauma, but if a connection exists, together you can explore the experience and begin plotting a course towards healing and growth.

**Intervention.** In many cases, medical PTSD and other reactions to medical trauma are diagnosed and treated after patients are discharged from the hospital setting, which from our perspective is later than necessary. Of medical trauma, Weinert and Meller (2007) explained that "unlike subjects exposed to the stressors of combat, childhood neglect or physical assault who almost always present for treatment after the stressor is over, during critical illness we can characterize the stressor or intervene while the stressor is occurring" (p. 2). Medical trauma is indeed different from other traumas; in many cases we understand where, how, and why it occurs. Simply put, if we can anticipate the trauma we can plan for its prevention and intervention.

Considering this statement from nursing, "the most valued aspect of nursing care is the ability to relieve fear and worry through caring behavior" (Hofhuis et al., 2008, p. 305), it is evident that we counselors are not the only professionals concerned with the emotional well-being of patients. We are uniquely trained in prevention of and intervention for mental and emotional disorders and psychological pain, and we have a place at this table, so to speak. In an ideal world, counselors would find themselves at the bedside of patients in critical care and fully integrated into primary and ambulatory care settings in an effort to prevent and treat the psychological impacts of medical trauma. Given the Affordable Care Act and initiatives in integrated care, this is a critical time for mental health professionals in the healthcare setting. Studies examining the effects of patient journaling in the ICU signal that mental health interventions are finding their way into acute care (Knowles & Tarrier, 2009)

Currently, many counselors cannot intervene in the medical setting – we see our clients after the medical trauma has occurred. Like with every other client we see, the use of empathy will be a critical first step in the healing process for clients who have experienced an illness or medical procedure that has been traumatic. For some (especially adult) clients, medical trauma is disenfranchised trauma. We are socialized to cope with whatever we experience in the medical setting without much thought given to the psychological impacts of treatment and of the medical environment. Receiving the

validation and understanding that empathy and unconditional positive regard provides can help clients feel more empowered to engage in therapy. In other words: "Experiencing medical trauma can be dehumanizing; treating patients as competent, resilient people restores their humanity" (Hall, in press).

Once a positive therapeutic relationship is established, counselors can look to a variety of evidenced-based interventions to help clients who struggle following a medical trauma. Counselors can pull from Trauma-Focused Cognitive-Behavioral Therapy (TF-CBT), Mindfulness-Based Cognitive Therapy (MBCT), EMDR, Neurofeedback, Narrative Therapy, and other holistic models to help clients redefine and rediscover healthy relationships with their bodies and themselves. It is critical to remain holistic in the approach to treating medical traumas because these traumas often affect the mind, body, and spirit. A client's treatment goals may include addressing PTSD and Depression through TF-CBT and MBCT; helping clients re-tell their trauma narrative and engage their creativity in meaningful ways; helping clients safely reconnect with their bodies, perhaps through yoga and mindfulness-based interventions; encouraging clients to explore the meaning of this trauma and how it has affected them in all life domains; and helping clients set goals to help them move forward in their lives using strengths-based approaches. While this certainly does not account for all of the goals or theoretical approaches in intervening with clients who have suffered from a medical trauma, the ideas will hopefully stimulate thinking about how counselors can effectively work with this population.

**Transformation.** Counselors are concerned not only with treating posttraumatic distress, but also with facilitating posttraumatic growth, or the transformation that builds on pre-trauma psychological functioning (Seligman, 2011; Tedeschi & Calhoun, 1996). Like with other traumas, medical trauma is no different in that the trauma can be a catalyst for significant growth and discovered meaning. As professionals who value strength and wellness, counselors work with survivors of medical trauma to realize their potential for growth and healing. From Yanez et al. (2009) we understand that the ability to find meaning, peace, and faith significantly contributes to growth in cancer survivors, and Milam (2006) reminds us that meaning, hope, and optimism positively correlate with posttraumatic growth in HIV patients. Counselors play an important role in helping clients process medical trauma cognitively and emotionally, and it can be through this process that clients arrive at new meaning and the realization of health and wellbeing beyond their pre-trauma existence. Whether it is at the prevention, intervention, or transformation level, counselors can make significant contributions to the very real experience of medical trauma.

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