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Trauma-Informed HIV Care Interventions: Towards a Holistic Approach

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Abstract

Purpose of review: The prevalence of trauma is higher among people living with HIV compared to the general population and people living without HIV. Trauma may be a major barrier in attaining HIV treatment outcomes, such as linkage to HIV care, engagement in HIV care, adherence to antiretroviral therapy (ART) and viral suppression. The purpose of this review was to highlight trauma-informed interventions that are geared towards improving treatment outcomes among people living with HIV.

Recent findings: Recent studies suggest that a trauma-informed approach to developing interventions may help to improve treatment outcomes, such as engagement in care and adherence to ART. However, studies have also shown that depending on the operationalization of usual care, a trauma-informed approach may result in similar outcomes.

Summary: Very few studies have examined the impact of trauma-informed interventions on HIV care and treatment outcomes. Additional research is needed on the acceptability, feasibility, and efficacy of trauma-informed interventions among affected populations such as older adults, and racial/ethnic and sexual minorities living with HIV.

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Keywords

trauma; interventions; HIV; adherence; viral suppression

Introduction

The Need for Trauma-Informed Interventions for People Living with HIV

Over 40 years investment in HIV research led to the development of antiretroviral therapy (ART) that changed the course of HIV infection from a deadly disease to a manageable chronic disease [1]. Globally, several studies have reported that people living with HIV (PLWH) now live longer if they adhere to ART and are virally suppressed [1–6]. Despite this breakthrough in HIV research, experience of traumatic events are social determinants of health that are usually not addressed within the health systems.

Definition of Trauma

Trauma is defined by the American Psychological Association as a disturbing experience that causes significant fear, vulnerability, dissociation, confusion, or other adverse feelings that may result in a long-lasting negative effect on one's attitudes, behavior, and functioning [7]. However, the Diagnostic and Statistical Manual (DSM-5) [8] defines trauma as "actual or threatened death, serious injury or sexual violence". Therefore, there is a debate on whether "adverse childhood experiences" as defined by the 11-item Adverse Childhood Experiences questionnaire are all considered traumatic experiences. These include: living with someone with psychopathology, living with someone who had been incarcerated, divorce or separation of parents, witnessing domestic violence, experiencing physical, emotional, or sexual abuse. For example, sexual abuse will be considered traumatic based on the DSM-5 definition. However, living with someone with psychopathology or someone who had been incarcerated might not be considered "traumatic". Indeed, not all types of abuse might be considered "traumatic" based on the DSM-5. However, if it is a "disturbing experience" which may have a long-lasting effect then this experience will be traumatic based on the American Psychological Association's definition. We argue that the experience of trauma may be based on one's personal perspective and view of the event.

Trauma among People Living with HIV

PLWH are disproportionately affected by psychological, emotional, physical, and sexual trauma [1, 5] and tend to have higher prevalence estimates of trauma compared to the general population. For example, studies have shown that among US populations, up to 95% [9, 10] of people living with HIV report at least one traumatic stressor [11] and up to almost two-thirds (64%) have posttraumatic stress disorder (PTSD) [12]. There are many factors which may explain the high levels of PTSD among PLWH such as early exposure to trauma, including childhood sexual abuse [13], and revictimization [14]. One factor which may also contribute to PTSD is the diagnosis of HIV [14]. Over one-third of individuals living with HIV among a South African population have stated that the worst traumatic event that they experienced was being diagnosed with HIV [15].

Evidence has shown that some PLWH usually report experiences of physical and childhood sexual abuse, and intimate partner violence, particularly among women living with HIV (WLH) [5, 16–21]. Although both women and men living with HIV are affected by trauma, WLH are mostly affected by trauma (e.g., PTSD) than their male counterparts [1]. A meta-analysis (including a wide range of countries) found that PTSD was prevalent (30%) among WLH [5, 18]. A study conducted with 104 WLH in a San Francisco clinic showed that 97.1% had experienced lifetime trauma (including adverse childhood experiences) and those with more lifetime trauma were more likely to report PTSD, depression, anxiety, and substance abuse, especially alcohol and drugs [2]. Also, WLH who reported more lifetime trauma were more likely to report non-adherence to HIV medications and poor quality of life compared to women who did not report trauma [2]. Particularly, African American WLH are disproportionately affected by interpersonal violence, substance abuse and adverse mental health outcomes, which is often associated with poor HIV care outcomes [22]. A meta-analysis of psychological trauma among WLH in the United States found that 55.3% experience intimate partner violence [18]. Although the experience of trauma among men living with HIV is lower when compared to WLH, men who have sex with (MSM) especially those living with HIV are disproportionately affected by trauma, which has been linked to their sexual behaviors and HIV outcomes [1, 23]. Research has shown that most MSM have had a history of childhood sexual abuse, PTSD, and dissociation [23].

Furthermore, it is estimated that 51–81% of adults in wealthy countries such as the US have experienced at least one traumatic event [20, 24, 25]. Similarly, evidence from low-and-middle income countries (LMICs) shows that most people were exposed to one or more traumatic events in their lifetime [26, 27]. For example, approximately 76% of adults in Mexico had experienced at least one traumatic event in their lifetime [26]. Similarly, an estimated 92% of adults in Algeria had experienced traumatic events [27]. Several studies and reviews across different social settings have established that trauma survivors experience PTSD, phobia, anxiety, depression, increases substance abuse and risky sexual behaviors that may expose them to HIV infection [1, 5, 20, 27–30]. For example, a review of multiple studies found that trauma prevalence ranged from 10% to 90% among PLWH [1]. The trauma is often connected to HIV-risk behavior, poor adherence to ART and over all wellbeing of PLWH especially vulnerable populations. The high incidence of trauma and its negative impact on health seeking behaviors and health outcomes emphasize the need for multi-level interventions to address trauma (and its associated sequelae) in HIV care services.

Trauma-Informed Care

Growing evidence has shown the need to adopt and implement trauma-informed care in HIV care services. Reiterated, several studies have shown an association between PLWH's experience of traumatic events and poor HIV treatment adherence, poor linkage to care, antiretroviral therapy (ART) resistance, lower CD4 counts, higher HIV viral loads, additional opportunistic infections, and high AIDS-related mortality [5, 21, 29]. Furthermore, PLWH with histories of trauma are more likely to engage in substance abuse (e.g., drug and alcohol) and unprotected sexual activities (e.g., non-condom sex) that may facilitate HIV transmission to others especially if they are not virally suppressed [5, 22, 31].

There is, therefore, an immediate need for trauma-informed HIV care to provide holistic care for PLWH to improve their overall wellbeing. Globally, persistent awareness of the intersection of trauma and HIV has led to the development and implementation of trauma-informed interventions [5, 20, 22, 31]. Despite the growing evidence of trauma incidence and its link to HIV transmission and care, there is paucity of data on trauma-informed HIV care. In their review and analysis of extant literature, Sales and colleagues found that most trauma-informed interventions were developed to address violence and substance abuse mostly in the United States [20]. It is against this backdrop that we critically synthesize existing literature to tease out the urgent need for trauma-informed interventions to improve HIV treatment cascade outcomes among PLWH.

Trauma-informed care can be referred to as healthy practices that facilitate empowerment, safety and healing of people who were previously exposed to traumatic events [5, 31]. There is a difference between trauma-informed care and trauma-specific services. For example, trauma-informed care encapsulates a “universal framework” or “a strengths-based service delivery approach” that is used to understand and respond to trauma [32]. This framework focuses on safety (i.e, emotional, physical and psychological) for both providers and patients, and generates opportunities for patients to gain (or maintain) a sense of power and control [33]. This approach may require reform to organizational culture and policies so providers and other staff will be able to support survivors of trauma seeking care [32]. However, trauma-specific services refer to evidence-based interventions and treatment that are geared towards treating traumatic stress and any other substance use and mental health disorders (for e.g., PTSD) that co-occur and develop either during or after a traumatic event [32].

According to the Substance Abuse and Mental Health Services Administration (SAMHSA), to address exposures to trauma and re-traumatization, trauma prevalence must be established and understood, healthcare providers must recognize signs and symptoms of trauma in clients, and integrate trauma-informed care in health policies and guidelines [34]. For trauma-informed care to be fully integrated in HIV treatment, healthcare providers must be educated on trauma, and be able to identify, screen and respond to clients’ trauma needs [5]. In a qualitative study conducted with 23 healthcare providers, administrators, and staff of an urban HIV primary care center in the Southern US, there was a need for trauma-informed care in HIV treatment, but there is a lack of trauma-informed interventions as well as key knowledge gaps in understanding the barriers/facilitators of adopting trauma-informed HIV interventions in clinical settings [5, 16]. A growing number of studies on substance abuse and mental health, has shown that the implementation of trauma-informed care improves people’s health outcomes (e.g., reduce substance abuse, mental health, and trauma symptoms) and facilitate safe and friendly environment for both patients and healthcare providers [35–38]. It is important to mention that there is no single trauma intervention or treatment that can address all the needs of those with histories of traumas, hence, the need for tailored multi-level trauma-informed interventions in different social settings [5, 22, 31, 39].

Despite the importance of trauma-informed care, there is paucity of data on its adoption and implementation regarding the HIV treatment cascade to improve the health outcomes of

PLWH. A study that reviewed interventions to improve the mental health outcomes among PLWH with histories of trauma found 15 interventions (mostly developed in the US) that utilized various methods (e.g., group therapy) and had contrasting findings across trauma and HIV outcomes at individual level [40]. Similarly, two previous reviews of trauma-informed HIV care in sub-Saharan African reported the efficacy of some interventions addressing the link between violence and HIV-risk especially among women and youth at individual, school, and community levels [41, 42]. Similarly, a trauma-informed intervention (VOICES) trial conducted between 2016 and 2019 to reduce substance use (cannabis) and HIV-risk behaviors among 113 justice-and-school-referred girls in the United States showed significant reduction in substance use over a 9-month follow up period when compared to the control group but there was no difference in both groups HIV-risk behaviors [35].

However, trauma-informed interventions that are specifically geared towards HIV care are lacking. Even though there are many psychosocial interventions geared towards people living with HIV, not many interventions are geared towards improving HIV care. However, we review current studies that have implemented these interventions. Our previous research also found that intervention programs are warranted for older adults living with HIV who were survivors of childhood sexual abuse. At present, no study has examined trauma-informed interventions for older adults living with HIV. We are currently adapting the Living in the Face of Trauma intervention [43] for older adults living with HIV (K01MH115794). The aim of this paper is to review trauma-focused interventions that are geared towards HIV care and to highlight the need for more of these interventions focused on improving HIV treatment outcomes in the US and globally.

A Brief Description of Trauma-Informed HIV Care Interventions

Trauma-informed HIV care interventions are interventions that address trauma with the goal of improving HIV treatment outcomes such as HIV testing, linkage to HIV care, engagement in HIV care, ART adherence and/or viral suppression. Even though trauma-informed care is seen as a priority for HIV care, its implementation has been limited [16]. Sikkema's Improving AIDS Care after Trauma (ImpACT) intervention is an example of a trauma-informed HIV care intervention addressing trauma among women living with HIV in South Africa [44]. This intervention was developed to attenuate traumatic stress and improve engagement in HIV care among women in South Africa with a history of sexual trauma [45]. The trial run of ImpACT included both individual (4) as well as group (2) sessions. In evaluating the feasibility and preliminary efficacy, another group session was added to the format. PTSD symptoms were attenuated and motivation to adhere to ART was also increased at 3 months. However, at 6 months ART non-adherence levels were high and engagement in HIV care was low. These results suggested that while ImpACT may increase ART adherence motivation and decrease PTSD symptoms at 3-months, more research is needed to develop, refine or adapt an intervention that will improve HIV care treatment outcomes among this study population [44].

Donenberg et al. (2022) used trauma-informed cognitive behavioral therapy with the aim of improving ART adherence among Rwandan youth (aged 12 to 21 years) living with HIV [46]. In a randomized controlled trial in Kigali, cognitive behavioral therapy with a

trauma-informed approach was compared to usual care (support groups) among youth and young adults (aged 12 to 21 years). The intervention groups sessions (6) were led by young adults living with HIV (aged 21 to 25 years). Among this population, ART adherence was high at baseline; however, depressive symptoms, anxiety and traumatic symptoms were evident. In comparing the intervention and usual care, there was no differing effect on ART adherence. Nevertheless, depressive symptoms and anxiety symptoms improved more so in the intervention group. PTSD symptoms were also reduced but this attenuation occurred in spite of intervention or usual care group suggesting no differential effect of treatment [46].

Stockman et al. (2021) developed *LinkPositively,* which is a culturally-affirming, tailored, trauma-informed peer navigation and social networking app geared towards improving HIV care among Black women who are survivors of interpersonal violence [22]. *LinkPositively* contains virtual peer support for easy navigation of HIV care services, educational and self-care tips, medication reminder system and GPS-enabled resource locator for HIV care and support services [22]. This application was geared towards improving coping with barriers and navigating HIV care, social support, self-care, knowledge on HIV care and social support organizations, and adherence to ART via a reminder and self-monitoring medication system. The syndemic theory [47] and the theory of triadic influence [48] were used in the development of the web application. This study highlighted that women living with HIV tend to experience violence, adverse mental health outcomes, including substance use and misuse, which may lead to poorer HIV treatment outcomes such as linkage to care, engagement in care, ART adherence [22], and hence viral suppression. In addition, health care experiences may act as a trigger for posttraumatic stress or retraumatization for those who have experienced trauma and/or interpersonal violence [22]. This intervention seemed to be promising, feasible and acceptable based on focus group data.

Trauma-Informed Interventions in HIV Care: A Holistic Approach

Despite the global acknowledgement of trauma as an epidemic, there are several knowledge gaps. There is no clarity on the availability of trauma-informed interventions (particularly those published in the past 10 years) within HIV care services and if these interventions are implemented at micro, macro and meso levels. Additionally, there is paucity of evidence on tailored trauma-informed interventions in HIV care settings since different groups of individuals (e.g., racial/ethnic minorities, sexual and gender minorities, sex workers, etc.) may experience and respond to trauma differently. Furthermore, trauma screening should be mandatory as part of HIV care services and all patients living with HIV must be screened for a history of trauma to provide holistic HIV care. Once traumatic events have been established, healthcare providers should screen for posttraumatic symptoms such as dissociation and PTSD. Furthermore, patients living with HIV (including those exposed to trauma) should be screened for risky HIV behaviors, adherence to ART and other HIV treatment outcomes. Both mental health issues and HIV care services should be provided together to improve the mental health, HIV outcomes and overall wellbeing of PLWH. Also, healthcare providers working with PLWH should be cautious in their treatment approach given that majority of PLWH (depending on the population) had experience traumatic events in their lifetime. Trauma-informed interventions in HIV care settings is critical to providing holistic HIV care to PLWH. Given the paucity of evidence for trauma-

informed interventions in HIV treatment, we call for more inclusive, holistic, culturally-affirming, tailored, trauma-informed HIV care to improve the health outcomes and overall well-being of PLWH. Tailoring of trauma-informed approaches to meet the diverse needs of PLWH may be accomplished by designing interventions with input from key stakeholders and survivors whom we plan to serve, using community-engaged and community-based participatory approaches. It is also important to note that a “one-size fits all” approach may not be optimal for all affected populations. Therefore, we propose that research on design and implementation of trauma-informed interventions be conducted among survivors considering the role of sociodemographic and other characteristics such as age, gender, race/ethnicity, sexual orientation, location and culture. We hope that scientists conducting HIV and trauma research will close these knowledge gaps by developing and testing tailored trauma-informed interventions to improve the mental, physical and HIV treatment outcomes of PLWH.

Conclusion

There is a need for additional trauma-informed interventions addressing HIV treatment outcomes among PLWH. Very few studies have measured the impact of trauma-informed interventions on HIV treatment outcomes [49]. Our previous research found that trauma-informed interventions addressing childhood sexual trauma were acceptable and warranted among older adults living with HIV [50], who are sometimes forgotten when it comes to trauma-informed care. We also recommend that HIV treatment providers, both in the US and globally, become trained in providing trauma-informed care. The core principles of trauma-informed care include: understanding trauma and its impact, promoting safety, facilitating autonomy of survivors, ensuring cultural competence and sensitivity, providing opportunities for holistic and integrated care, and understanding that recovery from trauma is possible [51]. Emerging best practices of trauma-informed care to be considered in providing clinical care include: screening for trauma (both childhood and adulthood), training providers in trauma-specific treatment approaches, and working in tandem with referral sources and partner organizations that provide trauma-informed care [52]. Consideration of barriers and facilitators influencing the implementation of trauma-informed care is also warranted. Piper et al. (2021) identified such factors. They found that available resources, access to training, networks and communication were some of the factors contributing to the implementation of trauma-informed approaches in HIV primary care [5].

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