The Sociocognitive Model vs. the Trauma Model in Dissociative Identity Disorder: A Literature Review

Desireè Groce-Volinski1

¹ Department of Psychology, SUNY New Paltz, USA

Corresponding Author:

Desireè Groce-Volinski, Department of Psychology, 1 Hawk Dr., New Paltz, NY 12561 Email: grocevod1@newpaltz.edu

Abstract

Dissociative identity disorder (DID) is a controversial and multifactorial diagnosis, as its validity as a legitimate disorder is often debated through two contrasting models: the sociocognitive model (SCM) and the trauma model (TM). The SCM suggests that the manifestation of DID is a result of socially constructed interactions including the legitimization of dissociative behavior through social reinforcements. On the contrary, the TM argues that DID develops due to childhood trauma, suggesting that dissociation acts as a response to traumatic stress including serve physical and/or sexual abuse. This literature review thoroughly examined past literature on both models to provide a comprehensive review of the literature on the development of DID. Most literature on the SCM support the notion of suggestibility, contending that the suggestive nature of sociocultural factors such as media and/or therapy interventions are heavily linked to the formation of DID. Alternatively, a great body of literature on dissociative symptoms, neurobiological mechanisms, and posttraumatic exposure largely support the concepts displayed in TM. It is also the case that given the intricacy of DID, this review sought to identify an alternative model to better capture the nuances between the SCM and the TM. The focus of this review was to analyze the preexisting literature on both models to better understand the origin of DID and clarify the continuous debate between the validity of the TM and SCM.

Keywords: dissociative identity disorder, sociocognitive model, trauma model

The debate on dissociative identity disorder (DID) as a valid disorder first begins with its origin, which transcends into a debate on its existence. The sociocognitive perspective argues that DID originated in social encounters that reinforce the fantasy-like behavior seen in individuals with dissociative tendencies, suggesting that its existence is a socially constructed phenomenon (Spanos, 1994). In direct opposition, the trauma-related perspective argues that DID is a legitimate disorder that is in response to the inability to cope with severe trauma, therefore creating alternative, autonomous, personalities to 'endure' the trauma in replacement of the host (Dalenberg et al., 2012).

Specialists, researchers, academics, and those among them have opposing views on the existence and origin of DID; some believe that therapy is the main cause of DID and others believe that intense trauma is the cause (Mitra & Jain, 2023). Compounding the confusion, individuals with DID have historically been misdiagnosed with personality disorders, such as borderline personality disorder (BPD) due to overlapping symptoms like dissociation and amnesia (Mitra & Jain, 2023). The frequency of misdiagnoses, coupled with conflicting perspectives, further blur the lines between the psychological, psychiatric, and social understanding of DID, making accurate diagnoses and formulating a rigorous definition increasingly challenging. Regardless of how DID is legitimized, its epidemiology is of note, with prevalence rates of 1%-5% of dissociative disorders in the population, DID accounts for 1%-1.5% of that population (Mitra & Jain, 2023). The prevalence of DID within the spectrum of dissociative disorders speaks to the importance of thoroughly understanding its conceptualization for improved diagnostic criteria, symptomatology, and etiology.

Dissociative identity disorder (DID) is a type of dissociative disorder characterized by the presence of two or more distinct personalities that may be observed by others or reported by the individual (American Psychiatric Association [APA], 2022). Dissociation itself is understood as the disconnection between thoughts, behaviors, and feelings (Boyer et al., 2022). DID is often thought of as the most intense form of a dissociative disorder due to the continuous experience of depersonalization, dissociative amnesia, and derealization (Bistas & Grewal, 2024). The latest version of the *Diagnostic and Statistical Manual* (DSM-5-TR) outlines specific diagnostic criteria for DID. These criteria indicate that a person must display at least two or more separate personalities in which each personality varies in behavior, memory, and perception in order to be diagnosed with DID (APA, 2022). However, the diagnosis of DID remains controversial and multifactorial, with its validity frequently debated through two contrasting theoretical frameworks: the sociocognitive model (SCM) and the trauma model (TM). The SCM suggests that DID is a socially constructed phenomenon influenced by factors such as suggestibility and media portrayals (Spanos, 1994), while the TM identifies DID as a response to sever, often prolonged, childhood trauma (Dalenberg et al., 2012).

Given these deeply conflicting perspectives and the ongoing debate surrounding the origin and validity of DID, this article undertakes a comprehensive literature review to examine the existing research supporting both the SCM and the TM. The focus is to better understand the potential origins of DID by analyzing the evidence presented by each model, and to clarify the continuous debate surrounding these models. Additionally, this review identifies a potential alternative model, or common ground between the two perspectives to better capture the disorders nuances. To achieve this, this paper will present the perspectives and supporting evidence for the TM, including discussions on various forms of childhood trauma and associated neurobiological mechanisms as it relates to the diagnosis of DID. Subsequently, the arguments and support for the SCM are explored, addressing the influence of social factors, suggestibility, and fantasy proneness. The literature on the Hypnotic Model (HM) is examined as a common ground for understanding the origin and validity of DID. Finally, potential areas where integration of the TM and SCM might be possible are explored through an HM perspective.

The Trauma Model of Dissociation

One of the most referenced and widely accepted perspectives in describing the etiology of DID is the *Trauma Model of Dissociation* (TM). The TM posits that dissociation is a psychobiological response to threats and danger, suggesting that this response enables the instinctive regulation of behavior, pain suppression, depersonalization, and the ability to compartmentalize extreme experiences to maintain psychological stability, therefore aiding in the "survival" of a traumatic event (Dalenberg et al., 2012). In general, the TM argues that dissociation is an adaptive response to an extreme amount of stress or trauma.

Over the decades, numerous studies have attempted to analyze the relationship between trauma and DID. Research suggests that trauma and dissociation are linked through distinct processes; an individual who is dissociative aims to avoid the remembrance of trauma by skewing the accuracy/and or reality of the memory, and limiting its importance and implications (Dalenberg et al., 2012). According to the TM, individuals with DID begin dissociation in three stages, (a) avoidance from thinking about the memory, (b) disconnection from the emotional context of the memory, (c) and finally failure to recall parts of or the complete memory (Dalenberg et al., 2012; Dorahy, 2006). Due to the trauma-related memory being too intense for daily retrieval, the dissociative individual begins to compartmentalize distressing memories in order to prevent psychological collapse (Dalenberg et al., 2012; Putnam, 1997). Distorted memory, consciousness, and perception are all hallmarks of dissociation, suggesting dissociation often emerges from the presence of intense traumatic memories (Putnam, 1997; Visas et.al., 2016). Once a traumatic event takes place, the TM posits dissociation manifests as a coping strategy to *psychologically* withdraw from a physical situation that is unbearable.

Historical Perspectives

Historically, the relationship between dissociative symptoms and trauma has been examined throughout psychological literature for over a century. Famously, psychologist Pierre Janet (1889) published *Liautomatisme psychologique*, which was one of the first depictions of how dissociation is a crucial element of traumatic experiences (van der Kolk & van der Hart, 1989). Janet was the first who concisely detailed dissociation in relation to trauma, stating that dissociation occurs in response to an overwhelming amount of trauma (van der Kolk & van der Hart, 1989). Janet later coined the term "subconscious fixed ideas," which manifests from the inability to make sense of a past experience; thus, it entails keeping parts of a traumatic memory, but outside of the conscious mind (Janet, 1889; van der Kolk & van der Hart, 1989). Although the intense parts of a traumatic memory are out of the conscious mind and a part of the subconscious mind, Janet claims that they still influence a person's behavior. The subconscious influence therefore prompts many patients to dissociate in order to cope with immense stress and trauma (van der Kolk & van der Hart, 1989).

Much like Janet, Sigmund Freud was first interested in how trauma affects mental states (Freud, 1910). Freud believed that at the heart of pathology was the internalization of traumatic experiences that were too intense to endure, therefore they were

dismissed from the development of the personality (Freud, 1910; van der Kolk & van der Hart, 1989). In early work on hysteria, specifically *Studies on Hysteria* (1895), Freud & Josef Breuer detail that hysteria has a range of physical and mental symptoms that manifest from psychological issues but have no identifiable cause. Hysteria is now a dated term, but the facets of hysteria can be described as, and linked to, dissociative symptoms in today's terms (North, 2015). Freud notes that such symptoms arise from the repression of traumatic experiences, which later transformed into an emphasis on repression rather than dissociation, a focal point of his ideology (Freud & Breuer, 1895; van der Kolk & van der Hart, 1989). While the emphasis on dissociation was short-lived in Freud's career, he and Janet sparked many researchers' interests in complex, avoided, and repressed traumas as the cause of dissociative tendencies, all becoming theoretical frameworks for trauma-related models. Traditionally, the TM approach to treatment follows a phase-oriented, practice-based approach, beginning with stabilization and symptom management, followed by trauma processing, and finally integration and rehabilitation (Brand et al., 2012; Dalenberg et al., 2012).

TM Perspectives

There is a wide range of literature that emphasizes the role of trauma in dissociative disorders. The trauma that is generally associated with DID is of familial, cultural, and social origins (Bistas & Grewal, 2024). The strongest evidence for the TM is the relationship between dissociative symptomatology and trauma, with DID patients continually reporting more childhood trauma than other psychiatric populations (Dalenberg et al., 2012; Dorahay et al., 2015; Sar et al., 2017; Vissia et al., 2016). DID is referred to as an intense form of traumatic stress, labeling it an advanced form of post-traumatic stress disorder (PTSD) (Sar et al., 2017). Of note, within the DSM-5-TR, the description of dissociative disorders overlaps with the detailing of disorders that arise from stress such as PTSD (American Psychiatric Association [APA], 2022; Bistas & Grewal, 2024). Researchers have noticed this subtle placement and interpret it as acknowledgement of trauma being highly related to dissociation (Bistas & Grewal, 2024).

Childhood Trauma

Above all of the evidence for the TM, childhood trauma remains the most accepted contributing factor of the development of DID. There are several studies that have examined the link between trauma and dissociative disorders, many of which found strong correlations between the two (Dalenberg et al., 2012). However, research covering the *type* of trauma most correlated with DID is sparse. It has already been stated that the trauma often viewed as evidence for the TM is of familial roots, but the trauma must be prolonged to transform into DID, such as chronic neglect and intense sexual/and or physical abuse (Putnam, 1997). Dissociation in the face of childhood trauma is commonly understood as a means of escapism; for example, if it is physically impossible for an individual to escape the trauma, especially in early childhood when imagination is high, the individual psychologically escapes by dissociating or creating another 'person' to endure the traumatic event (Boyer et al., 2022). Over time, if the trauma and the inability to physically escape persists, then dissociation can become a more structured, automatic, and natural state of being, leading to the development of DID (Boyer et al., 2022).

Chronic Neglect

Few studies have examined the difference between physical and emotional neglect in DID. Emotional neglect refers to the absence of parental emotional support and validation; enduring this type of prolonged neglect can influence the development of a coherent sense of self, leading to fluctuating identity states (Sar et al., 2017; Vissia et al., 2016). Tang (2023) provided preliminary research on the type of neglect that is most correlated with DID and concluded that emotional neglect was the strongest contributor when compared with (a) physical neglect, (b) physical abuse, (c) emotional abuse, and (d) sexual abuse. These findings suggest that during childhood, when a child has an unpredictable caregiver or experiences of prolonged emotional abandonment, the traumatic impact and psychological toll of this experience is highly correlated with DID (Tang, 2023). However, milder forms of DID have also been associated with emotional neglect, as well as discreet traumatization such as severely dysfunctional family dynamics (Sar et al., 2017).

Emotional neglect is not just caregiver specific. In addition to emotional neglect from biological parents, emotional neglect from siblings also contributes to dissociative disorders, including DID (Krüger & Fletcher, 2017). The impact of emotional neglect is also much more of an internal experience than physical neglect is, as visible signs of this form of maltreatment are generally not present. For example, Spinazzola et al. (2014) states that children who are raised in environments with psychological maltreatment (PM; e.g., emotional neglect), can develop inner feelings of worthlessness, believing they are flawed or unloved, unwanted, and emptiness. Emotional neglect and emotional abuse, forms of PM, both predicted dissociative

3

symptoms that are commonly seen in DID when compared with other forms of trauma such as sexual abuse, but dissociative symptoms were not predicted when there was an absence of PM (Spinazzola et al., 2014).

Physical neglect is not as predictive of DID when compared to emotional neglect; however, physical neglect is still a significant contributing factor of DID (Dalenberg et al., 2012; Sar et al., 2017; Vissia et al., 2016). Interestingly, research suggests that if physical neglect is present, dissociative individuals reported less relationship anxiety (Dorahay et al., 2015). It may be the case that individuals who experienced physical neglect, may not experience maltreatment in the same way individuals who experience emotional neglect. Physical neglect is characterized by a lack of food, clothing, or other physical necessities, and it is possible that it is internalized in the same way poverty is, rather than vindictive, or cruel intentions (Dorahay et al., 2015). It was concluded that individuals who experienced a lack of physical comfort and care, may seek to provide that to others, taking on a nurturing role in relationships, therefore explaining the lack of relationship anxiety (Dorahay et al., 2015).

Sexual/Physical Abuse

The most acknowledged risk factor within DID literature is sexual and/or physical abuse. Sexual and physical abuse that occurs in childhood specifically, is the most referenced contributor and has consistently been shown to be correlated with the emergence of DID (Dalenberg et al., 2012). The onset of physical abuse and sexual abuse is relatively similar, reported at age 4.6 years for physical abuse, and 4.9 years for sexual abuse respectively (Anderson et al., 1993; Raison & Andrea 2023). Similar results are shown in Ross et al. (1991), indicating half of 102 psychiatric patients diagnosed with DID have reported sexual and/or physical abuse over a 10-year span and before the age of 5, whereas others have not reported sexual abuse before the age of 5, but have still reported sexual abuse at a point in their life. The TM argues that repeated exposure to abuse, both physical and sexual, creates an individual who struggles to partake in normal identity development due to the psychological disruption it evokes, and therefore creates alternative personalities to cope (Dalenberg et al., 2012; Putnam, 1997).

In most studies establishing a relationship between DID and sexual/and or physical abuse, a similar stance emerges, suggesting that children who endure prolonged sexual and/or physical abuse lack the environment necessary to process their trauma (Bremner, 2006; Dalenberg et al., 2012). Due to this, children of these intensely negative environments learn to segregate their traumatic experiences by dissociating, almost as if the experience is not happening to them, ultimately creating identity fragmentation (Bremnar, 2006). Dalenberg et al. (2012) produced similar results, finding that individuals with DID report a higher rate of significant childhood maltreatment, including sexual and/or physical abuse, than individuals with other psychiatric disorders as further support for the TM.

There are conflicting results when examining which trauma is the most predictive of DID. For example, Tang (2023) found that emotional neglect was the strongest predictor of DID, but Dorahay et al. (2015) found that childhood sexual abuse was the only predictor of pathological dissociation. However, much like neglect, sexual and physical abuse is shown to evoke feelings of loneliness, alienation, and isolation (Sar et al., 2017). In relation to these internal feelings, maintaining DID becomes increasingly challenging for the dissociative individual, as well as adding to the complexity of treatment options (Sar et al., 2017).

While the definition of abuse requires an abuser, little attention has been devoted to emphasizing the environmental factors necessary for abuse to take place. As discussed previously, the trauma commonly associated with TM is of familial roots. The environment that is suitable for familial trauma and abuse to take place can be described as boundary violations, reality distortions, and narcissism (Sar et al., 2017). Similar to subtle forms of emotional neglect correlating to milder forms of DID, forms of familial trauma such as denial are seen as covert forms of traumatization (Sar et al., 2017).

Neurobiological Mechanisms

Understanding the physiological components of DID, such as the neurobiological modifications seen in patients, is equally as insightful as understanding the psychological elements of DID, such as depersonalization/derealization, when exploring its etiology (Chalavi et al., 2015). Scholars suggest individuals diagnosed with DID undergo neurobiological changes that can be observed as physical evidence for the validity of DID (Chalavi et al., 2015; Reinders et al. 2019; Vermetten et al., 20016). It is documented in several studies that abnormalities in neurobiological mechanisms, such as the parietal and occipital lobe, frontal lobe, and several areas within the limbic system are present in DID patients when compared to controls (Blihar et al., 2020). Most research suggest that the neurological abnormalities seen in DID patients are correlated with childhood trauma and dissociative symptoms (Blihar et al., 2020). However, research investigating whole-brain structural differences in DID has presented conflicting results. Weniger et al. (2008) did not find any differences in total brain volume between individuals with DID and controls. On the contrary, Chalavi et al. (2015) yielded different conclusions; identifying a significantly smaller left and right hemisphere gray matter, and cortical volume (CV) of total gray matter (Blihar et al., 2020). While some researchers

have found a link between abnormal neurobiological mechanisms and DID, other studies have failed to do so (Tsai et al., 1999), emphasizing the need for further investigation into the neural markings of DID.

Frontal Lobe

Regardless of research yielding mixed results, alterations of the frontal lobe have consistently been associated with DID (Chalavi et al., 2015). The frontal lobe is crucial for proper executive functioning, and any abnormalities can influence the ability to self-regulate, make decisions, and may impair motor control (Blihar et al., 2020; Chalavi et al., 2015). Research suggests that DID patients have significantly reduced total frontal lobe gray volume when compared to controls, specifically in the surface frontal regions, pars regions, ventral and deep frontal structures, and cingulate cortices (Blihar et al., 2020). The abnormalities present in the frontal lobe are hypothesized to disrupt cognitive control and executive functioning in DID patients persistently, further heightening dissociative symptoms, multiple personalities, and cognitive dissonance (Blihar et al., 2020).

Research suggesting individuals with a DID diagnosis have an abnormal frontal lobe is especially of interest within TM literature. The structural alterations present in the frontal lobe are linked to executive function, emotional regulation, self-processing, memory, and identity development, which all are viewed as vital elements to properly deal with trauma (Blihar et al., 2020). Much of the research emphasizing an association between neurobiological alterations and trauma describe these modifications as a form of adaptation to the trauma, suggesting that trauma has long-lasting effects on neurobiology, heavily supporting the TM (Reinders et al., 2019).

Limbic System

Multiple subsets of the limbic system are correlated with DID. The hippocampus was observed to have significantly less volume when compared to healthy controls (Blihar et al., 2020; Vermetten et al., 2006). The difference in neurobiological mechanisms is not confined to just the development of DID; it was found that patients who have undergone therapy and recovered from DID have a larger hippocampus than those who have not (Blihar et al., 2020; Vermetten et al., 2006). This research suggests that individuals with a DID diagnosis develop neurobiological abnormalities due to the intricacies of the disorder, and when treated effectively, the alterations subside. Contrastingly, Wengier et al. (2008) found that when individuals with a DID and a PTSD diagnosis are compared to just PTSD patients and healthy controls (HC), the DID-PTSD patients hippocampi did not differ significantly from the HC, but the PTSD only patients showed a significant reduction in hippocampal volume when compared to the HC (Blihar et al., 2020). There also appears to be a correlation between the amount of trauma faced and the size of the hippocampus, concluding that DID patients that endure more severe and prolonged trauma have smaller hippocampal volumes than a DID patient who does not experience the same degree of traumatization (Blihar et al., 2020; Chalavi et al., 2015).

The amygdala is also shown to undergo alterations in DID patients (Vermetten et al., 2006). The volume of the amygdala is shown to be significantly smaller than HC (Vermetten et al., 2006). The results yield similar conclusions between the amygdala and the hippocampus across literature, suggesting they are significantly smaller when compared to controls (Chalavi et al., 2015; Vermetten et al., 2006). However, research on the amygdala appears to be less conclusive, as it is challenging to conclude the size of the amygdala directly influences its functioning (Blihar et al., 2020). However, an immense amount of literature continues to adopt the conclusion that the size and function of the amygdala plays a key role in the emergence of DID, highlighting the development of new personalities as a defense mechanism in light of the trauma (Blihar et al., 2020; Chalavi et al., 2015; Sar et al., 2017). The defense mechanisms are speculated to be more prominent in individuals with a smaller amygdala, making them more prone to dissociation (Blihar et al., 2020).

DID as a traumatic stress disorder

The TM recognizes DID as an early onset of PTSD, and some researchers speculate that DID is a severe form of PTSD (Reinders et al., 2019). It was discussed previously that in the DSM-5-TR, the detailing of dissociative disorders is strategically placed near the chapters describing stress-related disorders, and researchers have interpreted that as a subtle acknowledgement that trauma and dissociation have a relationship (Chalavi et al., 2015). It is argued that identity alterations are seen as mental disruptions that arise from trauma and are shown to overlap with elements of PTSD, such as avoidance of trauma (Sar et al., 2017). Some researchers believe that PTSD is even a dissociative disorder, due to the detaching of traumatic mental contents, that is commonly seen in dissociative disorders (Sar et al., 2017).

However, DID and stress-related disorders, like PTSD, have differences that are extensive. For example, DID is categorized as having multiple 'I's, or several autonomous personalities that are from the first-person perspective, whereas PTSD does not experience this (Sar et al., 2017). The differences between these two disorders can also be observed neurobiologically. Research

suggests that along with the amygdala size differing between PTSD-only patients and DID-PTSD patients, areas of the basal ganglia are also to be of contrast (Blihar et al., 2020). DID-PTSD patients were shown to have a larger putamen and right pallidum when compared to just PTSD patients, whereas the right pallidum was only shown to differ compared to HC (Chalavi et al., 2015; Blihar et al., 2020).

Sociocognitive Model

A contrasting framework that is also associated with the etiology of DID is the *Sociocognitive Model of Dissociation* (SCM). Unlike the TM emphasizing the role of trauma in DID, the SCM focuses on social and cognitive facets of dissociation (Lynn et al., 2019). Researchers have frequently interpreted the SCM as suggesting that DID does not exist, or that it is a 'made up' disorder, however, the primary concern of SCM does not challenge its existence - instead it focuses on its "origin and maintenance" (Lilienfeld et al., 1999 p. 505).

Still, the SCM contrasts with the TM, positing that the development of dissociative experiences that lead to a DID diagnosis are a result of psychotherapy and the media—that is, they are iatrogenically induced (Gleaves et al., 1996). More specifically, the SM is the theory that media influences, such as the portrayal of characters in books, films, and social media influence the reporting of dissociative experiences and traumatic events (Lynn et al., 2019). The SCM also highlights *suggestibility*, detailing that it is common occurrence to over-report and exaggerate, 'suggest' symptoms in psychiatric settings, essentially streamlining the diagnosis of DID (Lynn et al., 2019; Spanos, 1994).

Historically, the SCM is not as accepted as the TM and is often critiqued as presenting limited empirically supported evidence for its claims (Lynn et al., 2019). Spanos (1994) pioneered the SCM, and argued in favor of a sociocognitive approach, detailing that dissociative symptoms can be induced through suggestive language – or suggestibility, in "hypnotizable" individuals, stating that they are highly susceptibility to entering a hypnotic state of being. The biggest critique of this approach refers to the strong correlation between trauma and DID across several clinical populations, while the sociocognitive approach fails to display objectively strong correlations between social and cultural factors while disqualifying the role of trauma (Dalenberg et al., 2012; Lynn et al., 2019). Researchers have also stated that there is not enough conclusive evidence to speculate that fantasy streamlines trauma that is self-reported, instead, it is possible that fantasy acts as a coping mechanism in response to trauma (Lynn et al., 2019; Merckelback et al., 2022). Lilienfeld et al. (1999) similarly states that DID is the collection of multiple personality enactments, such as mass hysteria and demonic possession, all of which are argued to have social, cultural, and historical origins (Lilienfeld et al., 1999). Although commonly associated, the term 'multiple personality enactments' was not developed by Lilienfeld (1999) or Spanos (1994), instead it originated from the DSM-IV, stating that multiple enactments are a core feature of DID (APA, 1994; Lilienfeld et al., 1999). As highlighted by researchers, DSM-IV stated the "essential feature of DID is the presence of two or more distinct personality states.... that recurrently takes control of behavior," which has been interpreted as multiple personality enactments (APA, 1994; Lilienfeld et al., 1999).

SCM and Media Influences

According to the SCM, the media – including films, social media, and books – influence and fuel the prevalence of diagnosing DID (Lilienfeld et al., 1999; Spanos, 1994). It is argued that media portrayals have led to the creation of DID, while concurrently providing the general public with cues on how to reenact the role of someone with a DID diagnosis (Gleaves et al., 1996). This argument has been made in several studies and literature reviews for over a decade. Researchers have emphasized findings of Gruenewald (1971), details that a 17-year-old female psychiatric patient began displaying 'personality enactments' amidst seeing the movie "The Three Faces of Eve," which displays an individual with DID (Spanos, 1994). However, this interpretation is not consecutive across literature, stating that this case is not representative of most psychiatric patients due to the duration and rigor of clinical assessment necessary to obtain a DID diagnosis (Dalenberg et al., 2012; Gleaves et al., 1999).

Motivations

There is a long history of the SCM emphasizing individual motivation in obtaining a DID diagnosis. Spanos (1994) argues that there is motivation in becoming an individual with a DID diagnosis that is largely due to the way they are portrayed in the media. Especially in TV movies, creators paint individuals with a DID diagnosis as these intricate and dynamic beings, and it

is often the case that the general public views a DID patient in a positive light (Spanos, 1994). Similar to Gruenewald (1971), Fahy et al. (1989) yielded similar results, indicating that a patient began displaying symptoms of DID after seeing the movie "The Three Faces of Eve." In the 70s and 80s especially, this movie was a capstone in the portrayal of DID, so much so that viewers would contact the creators of this movie, Thigpen and Cleckley (1957), to discuss their personal relatability to the symptoms of Eve (Spanos, 1994). Thigpen & Cleckley (1984) issued a public statement about the DID diagnosis, indicating that its patients who suffer from this disorder have the 'motivation to draw attention to themselves,' as being diagnosed with DID is of much more concern than other psychiatric disorders (Spanos, 1994; Thigpen & Cleckley, 1984).

Media Inconsistencies

Traditionally, media influences as described by the SCM are associated with the inherent motivation to reenact the symptoms displayed in DID, but little attention is devoted to addressing the inconsistencies that are often reported by DID patients, stating that the media is not representative of their experience (Snyder et al, 2024). Researchers have challenged the SCM view of media portrayals, suggesting that if individuals are essentially role-playing by exemplifying symptoms seen in movies, with the motivation to draw attention to themselves, then there should be less of an incongruence between media portrayals of DID and the everyday experience of living with DID (Loewenstein et al., 2018; Snyder et al., 2024). For example, in media, much like "The Three Faces of Eve," her personality state switching is seen to happen dramatically while displaying florid behavior, but empirical evidence suggests that state switching is much more subtle and covert, highly contrasting what is frequently shown in the media (Loewenstein et al., 2018; Snyder et al., 2024).

Research further suggests that the common belief of individuals with DID alternating between personality states with varying wardrobes, accents, and names is not an essential component in diagnosing DID nor is it a core phenomenology (Loewenstein et al., 2018). Movies such as "Split" (2016), further perpetuate this narrative, showcasing the dramatization of alternating personality states, superhuman abilities, and inherent malicious intentions. Putnam (1997), states that clinical presentation of DID is generally categorized as overlapping and interfering states that result in developing inner voices, rather than displaying histrionic switching behavior (Loewenstein et al., 2018). The personality states that are emphasized in film are elaborated, when researchers state that the personality states observed in DID patients are not elaborated beyond an overall sense of personal identity, including self-representation, autobiographical memories that are state-specific, and the capacity to control behavior (Loewenstein et al., 2018; Snyder et al., 2024).

However, researchers conclude that the external self-state characteristics that are linked to the different identity states, are influenced by socio-cultural factors – in line with the SCM (Loewenstein et al., 2018). For example, it has been documented that the shaping of genuine DID generally does occur in a clinical setting, though systematic research on this process is limited. Simeon & Loewenstein, 2009). However, the core symptomatology of DID is not created in therapy, instead it is a development of social, cultural, cognitive, intrapsychic, and interpersonal influences (Simeon & Loewenstein, 2009).

Psychotherapy and Suggestibility

A hallmark argument of the SCM contends that DID symptoms emerge from clinical encounters. While researchers of DID have established a general consensus that bona fide DID does occur in a clinical situation, there are conflicting interpretations of how this is supported for the SCM (Simeon & Loewenstein, 2009). While psychotherapy can play a role in shaping distinct identity states, it is only one possible contributing factor that corresponds with other interacting factors, as opposed to being the primary cause (Simeon & Loewenstein, 2009). Still, the SCM argues that people are unlikely to continue to role enact if there is no legitimization from a therapist (Spanos, 1994). Regarding the patient that was treated in Fahy et al. (1989), it is stated that since the therapist did not engage, or geared the attention away from the patient's distinct personality states and focused more on the everyday problems present in her life, the patient's symptoms of DID decline extensively.

Suggestibility is exemplified in multiple forms according to the SCM. It is the case that therapists will implement DID patients as 'co-therapists' in order to suggest to skeptical DID patients that their diagnosis is legitimate and correct (Allison & Schwartz, 1980; Spanos, 1994). Spanos (1994) argues that above just psychotherapeutic interactions, some therapists are actually former DID patients themselves, stating that they are reminiscent of individuals in traditional cultures who become leaders of cults amidst their own spirit possession.

The challenge of the SCM is that most of its claims lack operationalizations (Simeon & Loewenstein, 2009). Consider Kohlenberg (1973), which was heavily endorsed by Spanos (1994) as affirmative evidence for psychiatric settings influencing symptoms present in DID, indicating that the psychiatric staff would interact with the alters in different manners. Due to the environmental factors of suggestibility, the personality that the staff deemed the most interesting or interacted with the most became the more reinforced personality, therefore increasing the frequency of how much the patient displayed that alter (Spanos, 1994). Simeon and Loewenstein (2009) claimed that these findings are pejorative, meaning the SCM is potentially

demeaning in its interpretation, and do not hold up as convincing empirical evidence due to the lack of rigor to be considered strong support.

Fantasy-Prone Personality

In keeping with suggestibility, the SCM further argues that suggestive language is most internalized by an individual with a fantasy-prone personality. A fantasy-prone personality is described as someone who is highly hypnotizable and suggestible (Simeon & Loewenstein, 2009). It has been documented that a fantasy-prone personality emerges from a distinct subset of personality characteristics, including borderline, dependent, and histrionic traits (Simeon & Loewenstein, 2009). In correlation with these personality traits, research suggests that individuals who are searching for acceptance and a sense of identity are more vulnerable to suggestive language (Simeon & Loewenstein, 2009).

According to the SCM, it is a common experience for individuals with DID symptoms to have some form of a fantasy-prone personality, only the degree of it differs (Spanos, 1994). Research supports this claim, suggesting that a large number of DID patients have historically obtained high scores on standardized hypnotizability scales (Bliss, 1983; Spanos, 1994). Since most DID patients are fantasy-prone, suggestions made in clinical settings by therapists are especially internalized, due to the belief that they are professionals who is more educated than the client (Spanos, 1994). It is also argued that someone who is highly suggestible may not have to be introduced to therapy and is able to develop a dissociative disorder through social influences (Simeon & Loewenstein, 2009).

Hypnotic Responding

A key feature of a highly suggestible personality, or a fantasy-prone personality, is the ability to deploy hypnotic behaviors. Hypnotic responding states that hypnosis is not a unique altered state, but it is a set of hypnotic behaviors that engage in role-playing and require distortions in memory and perception to be able to recall 'hidden' memories (Spanos, 1994). This is observed as adults attempting to behave as if they are children, as opposed to actually developing the psychological characteristics of children (Spanos, 1994). Essentially, hypnotic responding is easy to fake and is something that the person does – not something that is psychologically happening to them (Spanos, 1994). It is argued that some individuals who display DID symptoms are voluntarily describing their past experiences incorrectly in order to meet the demands of tests set by psychiatrists, rather than experiencing true multiplicity (Spanos, 1994). Research on hypnosis is often associated with the SCM, stating that it is possible to induce DID symptoms in highly hypnotizable people in lieu of social expectations (Spanos, 1994).

Consider Hilgard (1991), who elicited the 'hidden observer' in college students by guiding them into a hypnotic state and suggested they would feel no pain, while implementing a second suggestion to a different group that some part of them might still be aware of the pain even if they do not feel it. The results of this study suggested that under the hypnosis, participants reported feeling less pain, but when the hidden observer was elicited (suggestion two) to a different group, they reported feeling the pain, but it was separate from their main awareness (Hilgard, 1991). Researchers have interpreted this heavily supporting the SCM, indicating that the emergence of multiplicity, or dissociated selves requires a strategic and rule-governed process, stating that instead of this indicating 'hidden' part, participants are attempting to enact the role of a 'good hypnotic subject' (Spanos, 1994).

Trauma from a Sociocognitive Perspective

Research on the SCM does examine the role of trauma in DID symptoms, contrasting the common assumption that the SCM disregards the role of trauma. However, the role of trauma as described by the SCM heavily contrasts the role of trauma detailed within the TM. The TM posit is DIDs etiology is heavily related to trauma, whereas the SCM states that trauma is not causal of DID symptoms, as multiplicity can occur without trauma, such as child abuse being present (Spanos, 1994). It appears to be the case that trauma endured in childhood is so traumatic that oftentimes it is pushed out of memory, indicating that trauma will be later to recall later in life (Spanos, 1994). This proponent of DID is especially of interest for researchers in agreement with the sociocognitive approach. It is argued that patients do not remember being abused in childhood until their DID symptoms are 'discovered' in therapeutic settings; thus, reports of childhood trauma that suddenly surfaces as a result of psychiatric treatment should be carefully approached, rather than accepting it as correct descriptions of events (Spanos, 1994). Evidence for this argument can be found in Della Femina et al. (1990), suggesting that when individuals who have been abused in childhood are firstly interviewed, they reported never having been abused. However, the second time they are interviewed, they admit to being abused and state their earlier denial was because of embarrassment (Della Femina et al., 1990; Spanos, 1994). According to the SCM, the findings of Della Femina et al. (1990) highlight how social intersections and reinforcements

streamline the development of DID symptoms, rather than a unique, inherent creation on the part of the individual (Spanos, 1994).

Alternative Model and Common Ground

The TM and the SCM are the most popular theories contributing to the etiology of DID. However, researchers have noted that elements of both the SCM and TM have validity when describing the properties of DID (Simeon & Loewenstein, 2009). While the TM presents a wide range of empirical support for trauma causing DID, the SCM details the importance of social influences as displayed through case studies (Dalenberg et al., 2012; Spanos, 1994). Researchers have attempted to elucidate the connection between these two opposing perspectives and have been successful (Dalenberg et al., 2012; Lynn et al., 2019). For example, it was noted by pioneers of the TM that individuals with DID view themselves as more than one person, which is not an accurate representation of reality, which is a SCM proponent (Dalenberg et al., 2012; Lynn et al, 2019). Also, given some claims made by researchers in favor is the SCM are observed in empirical literature, scholars of the TM have acknowledged that factors such as fantasy-proneness can influence individuals with DID to report their traumatic experiences inaccurately, however, it was emphasized that this is only one proponent of a larger web of risk factors influencing inaccurate trauma reports (Dalenberg et al., 2012; Lynn et al., 2019). In turn, researchers who take a SCM approach have acknowledges that due to the high correlation rate between trauma and DID, the repercussions of trauma in DID is a genuine area of concern that should be expanded upon further in scientific literature (Lynn & Berg et al., 2014; Lynn et al., 2019).

Hypnotic Model (HM)

The hypnotic model (HM) has proponents of the TM and the SCM within its theoretical framework. The hypnotic model states that an individual who is traumatized will use their inherent ability to begin an autohypnosis process as a defense mechanism against traumatic experiences that are prolonged (Simeon & Loewenstein, 2009). The hypnotic model is associated with Charcot (1889/1991) via his teachings on the nervous system, stating that it is pathological to possess the ability to be hypnotized (Dell, 2017). In relation to DID, the hypnotic model suggests that the continuation of autohypnosis eventually leads to distinct reality states (Simeon & Loewenstein, 2009). There is empirical evidence that is suggested to support this theory, including individuals with DID being highly hypnotizable via standardized hypnotizability scales (Bliss, 1983; Spanos, 1994). Additionally, the hypnotic model shares perspectives from the SCM, stating that dissociation and hypnotic susceptibility have similar mechanisms, commonly seen in patients that are highly suggestible (Dell, 2017; Simeon & Loewenstein, 2009).

There are contrasts between the SCM and the HM that discern their differences. For example, Spanos (1994) states that the hypnotic processes that may contribute to dissociation are more vulnerable to social influences, further emphasizing the role of social factors. Additionally, the foundation of the HM is built on a deeply sociocultural perspective, suggesting that 'good hypnotic subjects' manifest dissociative symptoms in response to suggestion (Dell, 2017; Spanos, 1994). Essentially, the HM emphasizes the role of hypnosis in the formation of DID symptoms, which is traditionally linked to suggestibility. However, theorists of the TM adopt the HM more commonly than those of the SCM. From the perspective of the TM, the HM provides further framework for how individuals who were exposed to severe and prolonged trauma in childhood can develop autohypnosis to cope – or an inherent trance-like dissociation (Dell, 2017; Simeon & Loewenstein, 2009; Putnam, 1997). This suggests that much like the reasoning for dissociation as highlighted through the TM, autohypnosis is a response to trauma that serves as temporary psychological escapism that eventually leads to a natural state of being (Boyer et al., 2022). The HM can be observed as a bridge between the TM and the SCM, as it proposes elements that are aligned with proponents from both models.

Conclusion

DID is likely to be multifactorial, involving a unique combination of trauma, social influence, and cognitive factors. Both the TM and the SCM recognize the power of hypnosis, altered states of consciousness, and environmental influences (Dalenberg et al., 2012; Lynn et al., 2019; Spanos, 1994). The differing interpretations of DID's origins contribute to challenges in accurately defining and diagnosing the disorder. Additionally, DID's historical misdiagnosis with conditions like borderline personality disorder due to symptom overlap further complicate the etiology of DID. The literature that is published on the TM and SCM differ mainly in their interpretations of how these factors influence the development of DID symptoms, further streamlining the contrasting perspectives on its etiology and validity as a legitimate psychiatric disorder. Empirical research has provided support for both the TM and the SCM. The strongest evidence for the TM is the correlation between early abuse and dissociative symptoms, which is widely documented, whereas the empirical evidence for the SCM is much sparser, only

yielding convincing results in regard to the influence of suggestibility in therapeutic situations (Dalenberg et al., 2012; Spanos, 1994).

Neither the TM nor the SCM appears to offer a complete explanation on its own. An integrative approach appears to be the most effective in further examining the etiology, diagnostic criteria, and effectively treating DID. This conclusion is reached because studies aligned with both the SCM, and the TM have provided findings that help to clearly characterize aspects of DID (Dalenberg et al., 2012; Spanos, 1994). This balanced framework respects the intricacy of DID, as the development of more nuanced approaches can better understand the sociocultural and traumatic perspectives. Models like the Hypnotic Model attempt to bridge this gap by incorporating elements from both sides, such as the notion that trauma can induce autohypnotic process (TM), and that hypnotic susceptibility plays a role (SCM) (Dell, 2017; Simeon & Loewenstein, 2009). The HM at its core suggests that prolonged trauma in childhood can cause an autohypnotic process, which aligns with the TM perspective that trauma triggers dissociation (Dalenberg et al., 2012; Dell, 2017; Simeon & Loewenstein, 2009). The HM also argues that inherent hypnotic susceptibility is a factor in the diagnosis of DID, which is a deeply SCM perspective (Dell, 2017; Simeon & Loewenstein, 2009).

Given the information presented, an integrative framework appears to the the most productive path forward for advancing the science and treatment of DID. This framework would allow clinicians and researchers to potentially move past binary thinking and acknowledge the complexity and multifaceted nature of DID. From a clinical perspective, it is more beneficial to view and treat intricate DID from a biopsychosocial context, rather than focusing exclusively on origins from either traumabased contexts or suggestive therapy (Simeon & Loewenstein, 2009). Clinicians can equally incorporate trauma processing while also considering the social reinforcements into treatment plans, as both have been shown to be significant in the development of DID symptoms (Dalenberg et al., 2012; Spanos, 1994). Future research should continue to explore interactions between suggestibility, trauma, and environmental factors to develop a more nuanced and harmonious perspective on this complex disorder.

Acknowledgements

I sincerely thank the editor and the reviewers for the work they undertook in the peer-review process, including the assessment of this manuscripts quality, rigor, and overall contribution to the field of psychopathology. Their input is significant in the development of this journal article.

References

- Allison, R., & Schwartz, T. (1980). Mind in many pieces. New York: Rawson Wade
- American Psychiatric Association. (1994). Diagnostic and statistical manual of mental disorders (4th ed.). *American Psychiatric Publishing*.
- American Psychiatric Association. (2022). Diagnostic and statistical manual of mental disorders (5th ed., text rev.). American Psychiatric Publishing.
- Anderson, G., Yasenik, L., & Ross, C. A. (1993). Dissociative experiences and disorders among women who identify themselves as sexual abuse survivors. *Child Abuse & Neglect*, 17(5), 677–686. https://doi.org/10.1016/0145-2134(93)90088-M
- Bliss, E. L. (1980). Multiple personalities: A report of 14 cases with implications for schizophrenia and hysteria. *Archives of General Psychiatry*, *37*(12), 1388–1397. https://doi.org/10.1001/archpsyc.1980.01780250074009
- Blihar, D., Crisafio, A., Delgado, E., Buryak, M., Gonzalez, M., & Waechter, R. (2021). A Meta-Analysis of Hippocampal and Amygdala Volumes in Patients Diagnosed With Dissociative Identity Disorder. *Journal of Trauma & Dissociation: The Official Journal of the International Society for the Study of Dissociation (ISSD)*, 22(3), 365–377. https://doi.org/10.1080/15299732.2020.1869650
- Boyer, S. M., Caplan, J. E., & Edwards, L. K. (2022). Trauma-Related Dissociation and the Dissociative Disorders: Neglected Symptoms with Severe Public Health Consequences. *Delaware Journal of Public Health*, 8(2), 78–84. https://doi.org/10.32481/djph.2022.05.010
- Brand, B. L., Myrick, A. C., Loewenstein, R. J., Classen, C. C., Lanius, R., McNary, S. W., Pain, C., & Putnam, F. W. (2012). A survey of practices and recommended treatment interventions among expert therapists treating patients with dissociative identity disorder and dissociative disorder not otherwise specified. *Psychological Trauma: Theory, Research, Practice, and Policy*, 4(5), 490–500.
- Bremner, J. D. (2006). Traumatic stress: Effects on the brain. *Dialogues in Clinical Neuroscience*, 8(4), 445–461. https://doi.org/10.31887/DCNS.2006.8.4/jbremn
- Chalavi, S., Vissia, E. M., Giesen, M. E., Nijenhuis, E. R. S., Draijer, N., Cole, J. H., Dazzan, P., Pariante, C. M., Madsen, S. K., Rajagopalan, P., Thompson, P. M., Toga, A. W., Veltman, D. J., & Reinders, A. A. T. S. (2015). Abnormal hippocampal morphology in dissociative identity disorder and post-traumatic stress disorder correlates with childhood trauma and dissociative symptoms. *Human Brain Mapping*, 36(5), 1692–1704. https://doi.org/10.1002/hbm.22730

- Dalenberg, C. J., Brand, B. L., Gleaves, D. H., Dorahy, M. J., Loewenstein, R. J., Cardeña, E., Frewen, P. A., Carlson, E. B., & Spiegel, D. (2012). Evaluation of the evidence for the trauma and fantasy models of dissociation. *Psychological Bulletin*, *138*(3), 550–588. https://doi.org/10.1037/a0027447
- Dell, Paul. (2018). Reconsidering the autohypnotic model of the dissociative disorders. *Journal of Trauma & Dissociation*. 20. 1-31. 10.1080/15299732.2018.1451806.
- Dorahy, M. J., Middleton, W., Seager, L., McGurrin, P., Williams, M., & Chambers, R. (2015). Dissociation, shame, complex PTSD, child maltreatment and intimate relationship self-concept in dissociative disorder, chronic PTSD and mixed psychiatric groups. *Journal of Affective Disorders*, 172, 195–203. https://doi.org/10.1016/j.jad.2014.10.008
- Della Femina, D., Yeager, C. A., & Lewis, D. O. (1990). Child abuse: Adolescent records vs. adult recall. *Child Abuse & Neglect*, 14(2), 227–231. https://doi.org/10.1016/0145-2134(90)90033-p
- Fahy, T. A., Abas, M., & Brown, J. C. (1989). Multiple personality. A symptom of psychiatric disorder. *The British Journal of Psychiatry: The Journal of Mental Science*, 154, 99–101. https://doi.org/10.1192/bjp.154.1.99
- Freud, S., & Breuer, J. (1895). Studies on hysteria. Basic Books.
- Gleaves, D. H. (1996). The sociocognitive model of dissociative identity disorder: A reexamination of the evidence. *Psychological Bulletin*, 120(1), 42–59. https://doi.org/10.1037/0033-2909.120.1.42
- Gleaves, D. H., Hernandez, E., & Warner, M. S. (1999). Corroborating premorbid dissociative symptomatology in dissociative identity disorder. *Professional Psychology: Research and Practice*, 30(4), 341–345. https://doi.org/10.1037/0735-7028.30.4.341
- Gruenewald, D. (1971). Hypnotic techniques without hypnosis in the treatment of dual personality: A case report. *Journal of Nervous and Mental Disease*, 153(1), 41–46. https://doi.org/10.1097/00005053-197107000-00005
- Hilgard, E. R. (1991). A neodissociation interpretation of hypnosis. In Theories of hypnosis: Current models and perspectives (pp. 83–104). *Guilford Press*.
- Janet, P. (1889). L'automatisme psychologique. Félix Alcan.
- Krüger, C., & Fletcher, L. (2017). Predicting a dissociative disorder from type of childhood maltreatment and abuser-abused relational tie. Journal of Trauma & Dissociation: The Official Journal of the International Society for the Study of Dissociation (ISSD), 18(3), 356–372. https://doi.org/10.1080/15299732.2017.1295420
- Kohlenberg, R. J. (1973). Behavioristic approach to multiple personality: A case study. Behavior Therapy, 4(1), 137–140. https://doi.org/10.1016/S0005-7894(73)80086-3
- Lilienfeld, S. O., Lynn, S. J., Kirsch, I., Chaves, J. F., Sarbin, T. R., Ganaway, G. K., & Powell, R. A. (1999). Dissociative identity disorder and the sociocognitive model: Recalling the lessons of the past. *Psychological Bulletin*, 125(5), 507–523. https://doi.org/10.1037/0033-2909.125.5.507
- Loewenstein, R. J. (2018). Dissociation debates: Everything you know is wrong. *Dialogues in Clinical Neuroscience*, 20(3), 229–242. https://doi.org/10.31887/DCNS.2018.20.3/rloewenstein
- Lynn, S. J., Maxwell, R., Merckelbach, H., Lilienfeld, S. O., Kloet, D. van H. der, & Miskovic, V. (2019). Dissociation and its disorders: Competing models, future directions, and a way forward. *Clinical Psychology Review*, 73, 101755. https://doi.org/10.1016/j.cpr.2019.101755
- Lynn, S. J., Berg, J. M., Lilienfeld, S. O., Merckelbach, H., Giesbrecht, T., Accardi, M., & Cleere, C. (2014). Dissociative disorders. In D. C. Beidel, B. C. Frueh, & M. Hersen (Eds.), *Adult psychopathology and diagnosis* (7th ed., pp. 407–450). John Wiley & Sons, Inc..
- Merckelbach, H., Otgaar, H., & Lynn, S. J. (2022). Empirical research on fantasy proneness and its correlates 2000–2018: A meta-analysis. *Psychology of Consciousness: Theory, Research, and Practice*, 9(1), 2–26. https://doi.org/10.1037/cns0000272
- Mitra, P., & Jain, A. (2023). Dissociative Identity Disorder. In StatPearls. StatPearls Publishing. http://www.ncbi.nlm.nih.gov/books/NBK568768/
- North, C. S. (2015). The Classification of Hysteria and Related Disorders: Historical and Phenomenological Considerations. Behavioral Sciences, 5(4), 496–517. https://doi.org/10.3390/bs5040496
- Putnam, F. W. (1997). Dissociation in Children and Adolescents: A Developmental Perspective. Guilford Press.
- Reinders, A. A. T. S., Marquand, A. F., Schlumpf, Y. R., Chalavi, S., Vissia, E. M., Nijenhuis, E. R. S., Dazzan, P., Jäncke, L., & Veltman, D. J. (2019). Aiding the diagnosis of dissociative identity disorder: Pattern recognition study of brain biomarkers. *The British Journal of Psychiatry: The Journal of Mental Science*, 215(3), 536–544. https://doi.org/10.1192/bjp.2018.255
- Ross, C. A., Miller, S. D., Bjornson, L., Reagor, P., & et al. (1991). Abuse histories in 102 cases of multiple personality disorder. *The Canadian Journal of Psychiatry / La Revue Canadianne de Psychiatrie, 36(2), 97–101.*
- Şar, V., Dorahy, M. J., & Krüger, C. (2017). Revisiting the etiological aspects of dissociative identity disorder: A biopsychosocial perspective. *Psychology Research and Behavior Management*, 10, 137–146. https://doi.org/10.2147/PRBM.S113743
- Saxena, M., Tote, S., & Sapkale, B. (2023). Multiple Personality Disorder or Dissociative Identity Disorder: Etiology, Diagnosis, and *Management. Cureus*, 15(11), e49057. https://doi.org/10.7759/cureus.49057
- Simeon, D., & Loewenstein, R. J. (2009). Dissociative disorders. Clinical psychiatry essentials, 239-256.
- Spanos, N. P. (1994). Multiple identity enactments and multiple personality disorder: A sociocognitive perspective. *Psychological Bulletin*, 116(1), 143–165. https://doi.org/10.1037/0033-2909.116.1.143
- Spinazzola, J., Hodgdon, H., Liang, L.-J., Ford, J. D., Layne, C. M., Pynoos, R., Briggs, E. C., Stolbach, B., & Kisiel, C. (2014). Unseen wounds: The contribution of psychological maltreatment to child and adolescent mental health and risk outcomes. Psychological Trauma: Theory, Research, Practice, and Policy, 6(Suppl 1), S18–S28. https://doi.org/10.1037/a0037766

- Tang, Yuhe. (2023). A Meta-analysis on Childhood Trauma Involved in Dissociative Identity Disorder. *Lecture Notes in Education Psychology and Public Media*. 16. 284-291. 10.54254/2753-7048/16/20231175.
- Thigpen, C. H., & Cleckley, H. (1954). A case of multiple personality. *Journal of Abnormal Psychology*, 49(1), 135–151. https://doi.org/10.1037/h0057795
- Thigpen, C. H., & Cleckley, H. M. (1984). On the incidence of multiple personality disorder: A brief communication. *The International Journal of Clinical and Experimental Hypnosis*, 32(2), 63–66. https://doi.org/10.1080/00207148408416004
- Tsai, G. E., Condie, D., Wu, M. T., & Chang, I. W. (1999). Functional magnetic resonance imaging of personality switches in a woman with dissociative identity disorder. *Harvard Review of Psychiatry*, 7(2), 119–122.
- van der Kolk, B. A., & van der Hart, O. (1989). Pierre Janet and the breakdown of adaptation in psychological trauma. *The American Journal of Psychiatry*, 146(12), 1530–1540. https://doi.org/10.1176/ajp.146.12.1530
- van Duijl, M., Nijenhuis, E., Komproe, I. H., Gernaat, H. B. P. E., & de Jong, J. T. (2010). Dissociative symptoms and reported trauma among patients with spirit possession and matched healthy controls in Uganda. Culture, Medicine and Psychiatry, 34(2), 380–400. https://doi.org/10.1007/s11013-010-9171-1
- Vermetten, E., Schmahl, C., Lindner, S., Loewenstein, R. J., & Bremner, J. D. (2006). Hippocampal and amygdalar volumes in dissociative identity disorder. *The American Journal of Psychiatry*, 163(4), 630–636. https://doi.org/10.1176/ajp.2006.163.4.630
- Vissia, E. M., Giesen, M. E., Chalavi, S., Nijenhuis, E. R. S., Draijer, N., Brand, B. L., & Reinders, A. a. T. S. (2016). Is it Trauma- or Fantasy-based? Comparing dissociative identity disorder, post-traumatic stress disorder, simulators, and controls. *Acta Psychiatrica Scandinavica*, 134(2), 111–128. https://doi.org/10.1111/acps.12590
- Weniger, G., Lange, C., Sachsse, U., & Irle, E. (2008). Amygdala and hippocampal volumes and cognition in adult survivors of childhood abuse with dissociative disorders. *Acta Psychiatrica Scandinavica*, 118(4), 281–290. https://doi.org/10.1111/j.1600-0447.2008.01246.x