Borderline Personality Disorder in the Courtroom

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The insanity defense has been criticized with consequences for individuals with real mental illness. In the United States, several states have redefined the insanity defense by excluding antisocial personality disorder from consideration for the not guilty by reason of insanity plea. Four states have eliminated the insanity defense completely. The purpose of this article is to analyze the diagnosis of borderline personality disorder, its relevance in the courtroom setting, and how this speaks to the approach of the insanity defense in general. The history of the insanity defense, impulsive nature of borderline personality disorder, and the reasons that make personality disorders controversial are reviewed. The impulsive nature, and the association to childhood trauma, dissociation, and frontolimbic abnormalities support the continued protection of borderline personality disorder under the insanity defense. Knowledge of these facts will assist the forensic psychiatrist in effectively educating the courtroom about borderline personality disorder.

Key words: borderline personality disorder; cortico-limbic model; dissociation; forensic psychiatry; insanity defense; splitting; suicide.

Insanity defense

The mental disorder defense, better known as the insanity defense, is a verdict that finds the defendant not guilty by reason of insanity (NGRI) and is essentially an appeal to human morality. Its first source is often referenced as far back as 1772 BCE in the code of law enacted by Hammurabi, the sixth Babylonian king. One translation of code 206 states: ‘If a man strike another man in a quarrel and wound him, he shall swear: “I struck him without intent”, and he shall be responsible for the physician.’ In the United States, the question of intent continues to remain crucial in most states under the legal term of insanity. Ever since the McNaghten trial, a standard test for insanity was developed by precisely defining the term ‘insanity’ by the defendant’s ability

to recognize the nature and quality of their criminal behavior, and their ability to distinguish right from wrong (Gold & Simon, 2010). In 1843, Daniel McNaghten mistakenly assassinated Edward Drummond, the secretary to his actual target, Robert Peel, who was the United Kingdom Prime Minister at the time. When asked for his plea, McNaghten replied ‘I was driven to desperation by persecution’. Even the prosecution concurred that McNaghten was dealing with persecutory delusions, confirmed by medical witnesses presented by the defense. This was enough to convince the jury to return a NGRI verdict (Moran, 1981). The McNaghten Rule or a modified version of it continues to be used in a majority of state jurisdictions in the United States. The second most used test for insanity

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is the Model Penal Code that was developed in 1955 by the American Law Institute. This test excuses a person from a criminal act if the individual was incapable of appreciating his criminality (the cognitive prong from the McNaghten rule) or conforming their behavior to the law (an additional volitional prong) as a result of their mental disease or defect (Gold & Simon, 2010). The question of sanity is strictly limited to the time of criminal conduct, thus their competency or incompetency to stand trial after their arrest remains a separate consideration.

The insanity defense continues to transition from one end of the spectrum where its validity is contended and plainly ignored in practice to the opposite extreme where the defense plea is seen as an option for criminals to avoid punishment. Kansas, Idaho, Montana and Utah are currently four states that have eliminated the insanity defense ('Insanity Defense Among The States', US Legal, 2019). With the exception of Kansas, three of the states recognize the verdict of being guilty but mentally ill, which is seen as a compromise between the guilty and NGRI verdicts. Part of such backlash is in response to cases like the Hinckley trial. In March 1981, John Hinckley fired a bullet that ricocheted and wounded President Ronald Reagan in the chest. When Hinckley was found not guilty by reason of insanity it fueled debates around the possibility that Hinckley could be released as a free man immediately following his psychiatric treatment, regardless of the length of his hospitalization, theoretically allowing the insanity defense to be manipulated to avoid punishment (Gold & Simon, 2010). This resulted in passing of the Insanity Defense Reform Act in 1984, which removed the volitional prong centered around the belief that testing for volition, whether or not the defendant possessed the capacity to conform their behavior to the law, was much more difficult than assessing for cognition (Finkel, 1989). Without the volitional prong, which was essentially a return to the McNaghten rule, many proponents of the

reform immediately began to distinguish 'acts simply not resisted' from those truly beyond control. They argued that defendants with personality disorders, particularly antisocial personality disorder (ASPD), had such inept control over their behavior and should not qualify as exculpatory mental conditions (Rachlin, Halpern, & Portnow, 1984). Instead of banning the mental disorder completely, states like Oklahoma have specifically targeted ASPD to exclude from protection by the insanity plea. It is uncertain whether such states will draw the line with ASPD, or will include other personality disorders in the future. Given this period of adjustment that many states are continuing to undergo in regards to the insanity defense, the present article has three objectives: first, to provide an overview of the impulsive nature of borderline personality disorder (BPD) and the association to shame, guilt and suicide. The second is to discuss the relevance of childhood trauma, dissociation and the latest neuroimaging studies in borderline individuals. The third is to analyze the common arguments that may be used to carve BPD from protection by the insanity defense and provide reasons to reconsider these arguments, and in effect reconsider the general approach to the insanity defense.

Borderline personality disorder (BPD)

BPD diagnostic criteria

According to U.S. clinical studies, BPD was present in 6.4% of urban primary care patients, 9.3% of psychiatric outpatients and approximately 20% of psychiatric outpatients (Gross et al., 2002; Zimmerman, Rothschild, & Chelminski, 2005; also the *Diagnostic and Statistical Manual of Mental Disorders-Fifth Edition*, DSM-5, American Psychiatric Association, 2013). The diagnostic criteria for BPD includes having at least five of the following nine: (1) frantic efforts to avoid real or imagined abandonment, (2) a pattern of unstable and intense interpersonal relationships characterized by alternating between extremes

of idealization and devaluation, (3) markedly and persistently unstable self-image of sense of self, (4) impulsivity in at least two areas that are potentially self-damaging, (5) recurrent suicidal behavior, gestures or threats, or self-mutilating behavior, (6) affective instability due to a marked reactivity of mood, (7) chronic feelings of emptiness, (8) inappropriate, intense anger or difficulty controlling anger, (9) transient, stress-related paranoid ideation or severe dissociative symptoms (DSM–5, American Psychiatric Association, 2013).

As with all mental disorders that are dependent on subjective experience, the presentation of BPD may vary. The characteristic pattern of behaviors, cognitions and emotions may be influenced by factors often categorized into nature (such as heredity, physical characteristics and comorbidities) and nurture (such as family dynamics, culture and religion). To better assess an individual with BPD, it will help to first understand the broad pattern offered by the diagnostic criteria.

BPD: impulsive nature, shame, guilt and suicide

To highlight the impulsive and fluctuating characteristic of BPD, the present article further categorizes the nine common features of BPD according to (1) the fluctuating characteristic of BPD, (2) association to guilt, and (3) association to shame.

Efforts to avoid abandonment (DSM–5 Criterion 1), having an unstable self-image (DSM–5 Criterion 3), and transient paranoid ideas or dissociations (DSM–5 Criterion 9) can be grouped as unstable patterns of cognition. Similar patterns of instability may be reflected by their behaviors and emotions, which negatively affect their social relationships. Borderline individuals alternate between extremes of idealization and devaluation (DSM–5 Criterion 2), behavior that is impulsive and self-damaging (DSM–5 Criterion 4), with mood that is excessively reactive (DSM–5 Criterion 6). This general pattern of instability can be characterized as ‘fluctuating’

(Lee’s Category 1, current study), the degree of which of course may vary on an individual basis.

The second category associated with guilt (Lee’s Category 2) is based on studies that have associated guilt with suicidal ideation (Bryan, Morrow, Etienne, & Ray, 2013) and lack of resolution following non-suicidal self-injuries (NSSIs) in those with BPD (DSM–5 Criterion 5; Kleindienst et al., 2008), and feelings of emptiness (DSM–5 Criterion 7) (Adolfsson, Larsson, Wijma, & Berterö, 2004).

The last category associated with shame (Lee’s Category 3) is based on studies that have associated shame with externalization of blame and anger (DSM–5 Criterion 8; Brown, Comtois, & Linehan, 2002; Lloyd-Richardson et al., 2007; Tangney, Wagner, Fletcher, & Gramzow, 1992) and the increase in shame following NSSIs (DSM–5 Criterion 5) (Kleindienst et al., 2008).

NSSIs that lack real intention to follow through with the suicide may be an attempt to externalize an internal problem. NSSIs can allow an individual to ‘blame’ a physical problem by creating a distraction while an internal problem goes on ignored. The proposed three categories of BPD will help distinguish NSSI from actual suicidal behavior (DSM–5 Criterion 5) as well as highlight the influence of guilt and shame, which further underscores the fluctuating characteristic of a borderline individual.

Suicide

Seppuku (or harakiri) refers to the suicidal act undertaken by samurai warriors faced with shame after a defeat in battle or as a form of capital punishment. The records of this go as far back as the 12th century, and seppuku gradually became more ritualized towards the 17th century (Pinguet, 1993). To preserve their honor in the face of shame, the samurai would take a blade, pierce into their abdomen, and make a left to right horizontal cut to disembowel themselves (Tanaka, 2003). An emotion that can push an individual to commit such a

lethal act on themselves can certainly be described as powerful. A common idea was that the self-loathing and disparagement associated with shame left the individual feeling hopeless. Much like the intestines that spill out, their flaws were believed to be exposed for others to see, provoking an intense desire to escape from such scrutiny. More than guilt, which has the individual regretting a behavior, it was thought that those dealing with shame would be more likely to commit suicide to escape from a problem that implicated the entire self (Hastings, Northman, & Tangney, 2000). However, a more recent study suggests otherwise. Among an outpatient clinic sample of military personnel, although both guilt and shame were associated with increased severity of suicidal ideation, as expected, the emotion of guilt was more strongly associated with suicidal ideation in comparison to shame (Bryan et al., 2013).

There are many unanswered questions surrounding suicide in regards to accurately assessing for suicide risk, the length of time that suicidal ideation persists, and the number of suicides attempted by an individual. The fluid vulnerability theory (FVT) is an attempt at distinguishing between acute and chronic forms of suicide risk (Rudd, 2006). Based on the assumption that suicidal episodes are time limited, FVT tries to answer how long individuals will stay suicidal, the severity of an episode and the probability of another episode. Another assumption is that the risk for suicide varies between each individual as each have different baseline risk levels. There is emphasis on differentiating between acute versus chronic risk for suicide. Even in periods of behavioral stability, chronically suicidal individuals are deemed as such because they are more prone to another suicidal episode. In other words, when the baseline suicide risk level is higher the recurrence of suicidal episodes is also likely to be high. FVT hypothesizes that an individual's susceptibility to suicide is quantifiable through an assessment of the suicidal mode, which is based on the

cognitive, affective, physiologic and behaviors systems. Although it has been hypothesized that shame may be more relevant for understanding chronic suicidal risk and that guilt may be more relevant for understanding suicidal ideation (Bryan et al., 2013), many questions surrounding suicide and its association with guilt and shame have yet to be clearly delineated. As complex as assessing for suicide risk may be, the fact remains that individuals who exhibit overt signs of suicidal ideation are committed to involuntary treatment until safety is determined.

BPD: childhood trauma, dissociation and neuroimaging studies

Findings regarding the type of childhood abuse (e.g. sexual, physical or emotional) have been mixed. One meta-analytic study that specifically analyzed childhood sexual abuse (CSA) studies determined that CSA was not a major causal antecedent to BPD (Fossati, Madeddu, & Maffei, 1999); however, many studies have repeatedly confirmed the causal relationship between childhood abuse and BPD (Ball & Links, 2009; Kuo, Khoury, Metcalfe, Fitzpatrick, & Goodwill, 2015; Rogosch & Cicchetti, 2005; Soloff, Lynch, & Kelly, 2002; Zanarini, Gunderson, Marino, Schwartz, & Frankenburg, 1989; Zanarini et al., 1997). A more recent meta-analytic review of available literature has confirmed higher levels of dissociation in borderline individuals, presumably related to childhood trauma (Scalabrini, Cavicchioli, Fossati, & Maffei, 2017). Outside of dissociative disorders, dissociative experiences are included in the DSM-5 criteria for acute stress disorder, post-traumatic stress disorder (PTSD) and BPD. Dissociation is the loss of connection with one's thoughts, memories, feelings, actions or the sense of self (DSM-5, American Psychiatric Association, 2013). Interestingly, this description of dissociation is similar to the Google definition of the word insane, 'a state of mind which prevents normal perception, behavior, or social interaction' (Insane, Google Dictionary, 2019).

A common example of dissociation is daydreaming; however, more severe forms of dissociation (e.g. amnesia, depersonalization, derealization) may take place as a coping mechanism to a traumatic event (DSM-5, American Psychiatric Association, 2013), referred to as peritraumatic dissociation (Marmar, Weiss, & Metzler, 1998).

In a study examining dissociation in 290 subjects with BPD, it was found that 75% in this group reported experiencing 23 out of 28 dissociative events up to 20% of the time, compared to 5% in the control group (Zanarini, Ruser, Frankenburg, & Hennen, 2000). Using Geschwind's (1965) concept of sensory-limbic disconnection, Sierra and Berrios (1998) proposed a model for depersonalization, a state of subjective detachment and one form of dissociation. According to their cortico-limbic disconnection model, the right-sided prefrontal cortex (PFC) activation and reciprocal anterior cingulate cortex (ACC) inhibition lead to numbing of the mind and analgesia, while left-sided PFC activation and subsequent amygdala inhibition result in affective dampening (e.g. hypoemotionality, unreality, detachment; Sierra & Berrios, 1998).

There are a growing number of neuroimaging studies that have identified structural and functional changes in the brains of borderline individuals. Several magnetic resonance imaging (MRI) studies that analyzed differences in brain structure found volume reductions in the hippocampus as well as the amygdala in those with BPD (Driessen et al., 2000; Schmahl, Vermetten, Elzinga, & Douglas Bremner, 2003; Tebartz van Elst et al., 2003). One MRI study (Brambilla et al., 2004) confirmed this decrease in hippocampal volume among borderline patients only in relation to those with a history of childhood abuse.

Using other approaches of neuronal function assessment, namely magnetic resonance spectroscopy (Tebartz van Elst et al., 2001) and [^{18}F] deoxyglucose positron emission tomography (FDG-PET; De La Fuente et al., 1997; Goyer et al., 1994; Soloff et al., 2003),

patterns of brain metabolism in BPD patients were analyzed, and these studies found significantly lower rates of metabolism in the region of the prefrontal cortex. A correlation between a blunted metabolic response in the areas involving serotonergic modulation, such as the prefrontal cortex, and control of impulsive aggression has been proposed based on studies using FDG-PET and a selective serotonin reuptake inhibitor, fenfluramine (Coccaro, 1996; Siever et al., 1999), findings that have been replicated in patients with BPD (Soloff, Meltzer, Greer, Constantine, & Kelly, 2000).

This last neuroimaging study that will be mentioned underscores the myriad of approaches that is now available to studying the brain and also highlights how the borderline brain differs from another trauma-related psychiatric disorder, PTSD. One way to artificially evoke emotions is by presenting a series of standardized pictures of human faces expressing certain emotions such as anger or fear. A study that used this type of emotional challenge among borderline patients with and without PTSD found notable differences. One difference was that borderline patients without PTSD showed bilateral amygdala hyperactivity while those with a comorbid PTSD diagnosis had a left-lateralized amygdala hyperactivity (Donegan et al., 2003). The changes noted in regions of the amygdala and the prefrontal cortex in these neuroimaging studies indicate further consideration of the cortico-limbic disconnection model and certainly provides visual evidence of a neurological correlate for borderline symptoms. A complete review of the literature on neuroimaging studies in BPD is beyond the scope of this article; for a more extensive review refer to Schmahl and Bremner (2006).

BPD in the courtroom

Purpose of forensic psychiatry

The role of the forensic psychiatrist differs from that of the clinical psychiatrist in important ways, and this is largely exemplified by

the use or non-use of the term ‘patient’. One of the most crucial manners in which they are distinguished is in regards to the concept of beneficence. While clinical psychiatrists are obligated to avoid actions that have the potential to harm their patients (American Psychiatric Association, 2001), the duty of the forensic psychiatrist is to gather information for the court without regard to the potential harm that such communicated information will have against the litigant (American Academy of Psychiatry & the Law, 2005). It is not the job of the forensic psychiatrist to act as an advocate for the defendant nor to even determine insanity. As part of the backlash to the Hinckley verdict, the ultimate issue rule was reintroduced in federal criminal trials. This restricted forensic psychiatrists in criminal cases from providing an opinion on whether or not the defendant had ‘the mental state or conditions constituting an element of the crime charged or of a defense thereto. Such ultimate issues are matters for the trier of fact alone’ (Federal Rules of Evidence, FRE, 704(b) Opinion on an Ultimate Issue, 2015).

Objections against BPD for the insanity defense

After the creation of a Psychiatric Security Review Board in 1978, the state of Oregon compiled data on its operation of the insanity defense system (Rogers, Bloom, & Manson, 1986). It was uncovered that more than four out of five successful insanity defenses involved a serious mental illness, usually a psychosis, and were agreed to by the prosecution. In the remaining insanity verdicts that were contested by the prosecution, the defendants shared in common a higher number of personality disorders in comparison to the uncontested cases. Although most of the defendants in the contested group were also psychotic, the disagreement tended to arise when the experts testifying for the prosecution would emphasize the personality disorder while the experts from the defense would focus on the psychosis.

In 1983, the insanity defense statutes were amended in Oregon to eliminate those solely with personality disorders from protection by the insanity plea (Or. Rev. Stat. § 161.295 (2) 1983). This was in response to the public’s perception that the insanity defense was being abused by criminals, allowing them to ‘beat the rap’, as well as the confusion that was created among the jury by the ‘battle of the experts’ (Reichliin et al., 1993). Another factor that was taken into consideration was the opinion that scarce resources should be devoted to those with the greatest chance of responding effectively to treatment.

Other reasons for negative criticism of personality disorders in the forensic setting involve their widespread prevalence and complications in their diagnosis (Sparr, 2009). According to a recent meta-analytic study looking at the general adult population in Western countries, the prevalence rate of any personality disorder was 12.16% (Volkert, Gablonski, & Rabung, 2018). This is comparable to physical conditions like low back pain in high-income adult populations (approximately 12%), and even more prevalent than diabetes mellitus and cardiovascular diseases in high-income adult populations (each approximately 3%; Global Burden of Disease Study, GBDCN, 2017). When looking at specific personality disorders, the prevalence rate is 1.9% for BPD, is 3.05% for ASPD, and is highest for obsessive-compulsive disorder personality (OCPD) at 4.32% (Volkert et al., 2018). With regards to the diagnostic challenge of personality disorders, there is a lack of clear demarcation for abnormality as personality disorders tend to occur on a continuum (Gabbard, 1997). This is exemplified by the fact that personality disorders have the least clinician-to-clinician reliability (Widiger & Samuel, 2005).

Education of BPD for the courtroom

The criticisms of personality disorders presented above are reasonable and therefore demand the forensic psychiatrist to be

equipped with the knowledge to address such concerns. First, contrary to public's perception that criminals will resort to using a diagnosis of personality disorder to 'beat the rap', one study found that only 1% of defendants charged with a felony actually plead not guilty by reason of insanity (Callahan, Meyer, & Steadman, 1987). Second, knowledge of the existing and emerging neuroimaging studies in borderline patients may help to minimize the confusion experienced by the jury. Being able to reference the abundance of evidence on the brain abnormalities as previously presented may allow the experts for the defense to provide a neurological basis for the reactionary acts of borderline individuals without having to rely on a comorbid psychosis. Furthermore, the results of these neuroimaging studies suggest a potential benefit in using neuroimaging, to assess for a neurological origin, especially when objective evidence is lacking. Although imaging studies can be costly, the potential savings that result from the correct verdict should be taken into consideration. Lastly, there have been advances in our understanding and treatment approaches to BPD, which precludes our dismissal of BPD as an untreatable condition that is undeserving of our scarce resources.

To expand on this last point, it will be worthwhile for the remainder of the article to review our current understanding of borderline psychopathology as well as the advancements in treatment. Dissociation, the detachment from reality discussed earlier on, has been observed to be related to the defense mechanism of splitting (Wells & Jones, 1998), frequently enough to have been confused for one another (Hilgard, 1977; Ross, 1989). Kernberg (1975) observed that borderline individuals had difficulty integrating the positive and negative aspects of self and others, which he termed splitting, and it is a defense mechanism that is readily associated with BPD. A fragmentation of the narrative identity (Fuchs, 2007) results from the failure to recognize the contradictory aspects of the self as a coherent

patchwork, something inherent in every individual. This splitting into incoherent 'patches' occurs for the self as well as for others, and it exemplifies the absence of 'object constancy'. This term, also known as 'object permanence', describes when a child of approximately 18 months learns that objects exist independent of their perception of it (Piaget, 1937). This normal stage of child development is more likely to be impaired in individuals who have suffered physical and emotional abuse (Green, 1983), not an uncommon finding in the history of borderline individuals.

The sequence of childhood trauma leading to inappropriate defense mechanisms as an adult is conceptualized in what Masterson termed the 'triad of the disorders of the self,' which he originally referred to as the 'borderline triad' (Masterson, 1981, p. 140). The age between two and three years is a critical period, preceded by a new appreciation of object constancy, when the child is ready for self-expression and is becoming aware of their own uniqueness. However, for children in situations of abuse by their caregivers where new manifestations of uniqueness is punished rather than celebrated, 'self-expression leads to activation of the abandonment depression, which in turn leads to defense' (Masterson, 1981, p. 103). Such unresolved fear of abandonment that is carried into adulthood can ultimately impede autonomous functioning, and result in the impulsive and unstable characteristics seen in borderline individuals.

The present article has underscored some of the complexities with BPD that are beyond the level of understanding by many medical students who simply associate borderline individuals to suicide and dialectical behavioral therapy (DBT), the only treatment option that is emphasized in the board examinations. DBT is a form of cognitive behavioral therapy that is based on a motivational-skills deficit model, which presumes that borderline individuals lack important interpersonal, self-regulation and distress tolerance skills. DBT also presumes that there are personal and

environmental factors that often inhibit known behavioral skills and/or reinforce inappropriate borderline behaviors (Linehan, Heard, & Armstrong, 1993). There has been abundant evidence on the effectiveness of DBT in treating suicidal behavior and borderline individuals (Koons et al., 2001; Linehan et al., 2006; Linehan et al., 1993; Linehan et al., 1999); however, DBT is not the only available treatment option for BPD. Other effective psychotherapies include schema-focused therapy (SFT; Giesen-Bloo et al., 2006), mentalization-based therapy (MBT; Bales et al., 2012; Bateman & Fonagy, 2010), systems training for emotional predictability and problem-solving (Blum et al., 2008), and transference-focused psychotherapy (Giesen-Bloo et al., 2006). Psychotherapies are usually utilized in a chronic and outpatient setting; however, studies have shown that they can also be effective for the hospitalized patient (Bateman & Fonagy, 2010), and certain psychotherapies like MBT (Bales et al., 2012) and SFT (Farrell, Shaw, & Webber, 2009; van Asselt et al., 2008) have shown to be cost-effective.

Psychotherapies largely emphasize the psychodynamic or behavioral correction of maladaptive learning based on the traditional view of personality as learned character; however, advances in our understanding of personality, including the dimensions of psychobiology, have opened up the possibility of pharmacologic treatments (Soloff, 2000) and is currently a common practice. Treatments commonly used for mood and psychotic disorders have shown modest efficacy in improving the mood and behavior of borderline patients. Evidence shows the most support for mood stabilizers (e.g. carbamazepine, tranylcypromine, topiramate, lamotrigine and valproate semisodium) and antipsychotics (e.g. trifluoperazine, aripiprazole and olanzapine; Cowdry & Gardner, 1988; Lieb, Völlm, Rücker, Timmer, & Stoffers, 2010; Mercer, Douglass, & Links, 2009). Additionally, a review of pharmacotherapy for BPD by Zanarini (2004) suggests that the choice of

medication can be guided based on tolerability, safety and symptom presentation, and that the common practice of polypharmacy is likely unnecessary for most borderline patients.

Conclusion

Individuals with brain abnormalities from childhood trauma that leave them impulsive, dissociative and suicidal deserve treatment, whether with or without a borderline diagnosis. We currently have the means to effectively distinguishing such individuals from those hoping to 'beat the rap'. The complexity and immaturity of the insanity defense is poor excuse to withhold treatment for those who require it and may benefit. A peaceful society requires each individual to tame their impulsivity. Just as those incapable of resisting their impulse must be examined, so must the impulsivity in the manner that insanity is determined. The inclination to accept or reject a defendant's sanity by the name or category of a diagnosis should continue to be minimized as we learn more about the intricacies of the individual psyche.

Ethical standards

Declaration of conflicts of interest

Jin S. Lee has declared no conflicts of interest

Ethical approval

This article does not contain any studies with human participants or animals performed by the author.

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