

Psychosocial Factors and Non-Suicidal Self Injurious Behavior in Adolescents: A Phenomenology Study

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Non-suicidal self-injurious behavior (NSSI) is a deliberate self-harm behavior and is more frequent in adolescents. The psychosocial factor has an influence on the well-being of adolescents and their mental health. The purpose of the study is to explore the experiences and psychosocial factors of adolescents. For this aim, purposive sampling was used for the selection of adolescents with NSSI features. The sample was approached through their family member in different clinical setups and 1 sample was selected. NSSI Expectancy Questionnaire (Hasking & Boyes, 2018) was administered on a sample to target the adolescents with features of NSSI. The data was analyzed through IPA analysis to reveal the findings of the study. The result of the study indicated that adolescents have shown difficulty in their emotional regulation and highlighted the role of psychosocial factors in developing NSSI features. The emergent theme of the research study reveals that experiencing low self-endurance, false impressions and disconnectedness, unhealthy coping mechanisms, a sense of incompleteness and emotional burden from family are maintaining factors of non-suicidal self-injurious behavior. These are the major themes emerging from the research study. Moreover, other theme involves adjustment issues and bullying based on individuality which has a role in developing NSSI in adolescents. The results of the study indicate the importance of psychosocial factors and experiences of adolescents. The findings of the study can help determine and consider psychosocial factors for intervention plans to promote healthy coping. Furthermore, it will also help in providing early intervention to prevent the rates of suicide in adolescents.

Keywords. Non-suicidal behavior, adolescents, psychosocial factors, emotional dysregulation

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Adolescence is a transitional phase of childhood to adulthood which involves developmental changes i.e., emotional, biological, physical and psychological changes of an individual. Due to these developmental changes, adolescents are more vulnerable and have less control over emotions (Jaworska & MacQueen, 2015).

NSSI is referred as the deliberate destruction of body tissue without the intent of committing suicide. The forms of self-injury include cutting, scratching, burning, hitting and using other forms of a method for self-injuries (Klonsky et al., 2014; Whitlock et al., 2013). It is a state of emotional dysregulation, negative affect and intense negative emotions which maintain their act of deliberate harm (Fox et al., 2015; Klonsky et al., 2014). This act helps in alleviating intense emotions and reduces emotional dysregulation. The inflicted injury causes pain which helps in regulating and releasing their intense emotions (Horne & Csipke, 2009).

NSSI is a result of poor emotional dysregulation and penetrating negative affect which serves as a factor in maintaining and reinforcing behavior of NSSI. The individual experiences intense negative emotions resulting in reactivity to stimuli which regulate their emotions (Hooley & Franklin, 2018). NSSI is observed to be more prevalent among adolescents and young adults (Klonsky, 2007; Klonsky et al., 2014).

Cipriano et al. (2017) also highlight that NSSI is more common in adolescents and young adults. The study also emphasizes investigating the cultural background and risk factors of non-suicidal self-injury behavior. It shows an association with the comorbid disorders such as bipolar disorder, eating disorder and childhood trauma. A research study primarily focused on the link between NSSI with suicidal behavior which depends on the intensity of non-suicidal behavior. This means that greater intensity of NSSI results in suicidal behavior. It was observed that the NSSI pattern was more common in adolescents and young adults. It's further highlighted the intensity of NSSI and interpersonal relationship increases the risk factor of suicidal behavior (Hamza et al., 2012).

Literature Review

Adolescents are more at the risks of developing NSSI behavior (Claes et al., 2014). There is a significant relationship between nightmares and poor sleep with NSSI behavior in adolescents (Liu et al., 2017). A research study revealed that bullying and victimization are contributing factors in developing NSSI behavior in adolescents. The study further reveals that depressive symptoms have a moderate

association with NSSI and parental support has a strong influence in decreasing NSSI behavior in adolescents (Claes et al., 2015)

Moreover, the predictors of NSSI include cluster b personality and hopelessness significant risk factors which result in NSSI and self-harm behavior (Fox et al., 2015). Furthermore, mental health status also shows importance in determining NSSI features particularly mental disorders with psychosocial factors that are significant predictors of NSSI. The factors include distorted self-concept, emotional deregulation, exposure to traumatic events, psychiatric motivation, poor interpersonal support and occupational stress (Ghaedi et al., 2020).

The motivation of NSSI behavior involves interpersonal relations and emotional regulation i.e. bottled-up emotions, self-punishment, internal aggression, sensitizing self and attaining self-control. This behavior has been stigmatized and involves in depth approach as it is beyond attention seeking and their ways of signaling psychological distress (Shahwan et al., 2021). Kasusar and Khan (2020) investigated the risk factors of NSSI among adolescents and young adults in Pakistan. The factors are unhealthy family systems and relationships, anger, emotional dysregulation and self-criticism behavior which cause suicidal self-injury in adolescents and young adults. A study reported that NSSI young adults involved in behaviors such as cutting and scratching which result in bleeding give immense relief and provide a sense of calmness. It was also reported these features were more common in individuals with bulimia nervosa and borderline personality disorder (Glenn et al., 2011).

Naoum et al. (2016) also proved similar findings of NSSI resulting in bleeding and personality disorder i.e., borderline personality disorder. A study also highlights a significant link between NSSI and substance abuse. Substance abuse is contributing to symptoms and predictors of NSSI in patients with schizophrenia (Güney et al., 2020). It is further supported by a study that NSSI reflects more symptoms of different psychiatric disorders such as anxiety, depression, borderline personality disorder, dependent personality, and avoidant personality disorder. The presence of depression and anxiety was more significant in NSSI individuals as compared to personality disorders (Klonsky et al., 2003).

Balázs et al. (2018) also claimed in their study that adolescents diagnosed with ADHD symptoms show a strong correlation with NSSI symptoms. It was further proven in a study that substance abuse affective disorder and psychotic disorder mediate the relationship between ADHD and NSSI. Moreover, a study shows an association

between autism as a predictor of NSSI in autistic children (Akram et al., 2017). Another study highlights the relationship of bipolar disorder with NSSI among adolescents in Pakistan. It is due to poor coping skills and environmental stressors contributing to the development of bipolar, suicidal ideation and poor mental health (Zareen & Ashraf, 2021). In conclusion, Pakistani adolescents have shown poor mental health i.e., frequent cases of depression and anxiety due to environmental factors. It is further highlighted that NSSI is more prevalent in adolescents in Pakistan and has shown more suicidal tendencies due to poor emotional health (Siddiqui, 2018).

Research Questions

1. What are the psychosocial factors of non-suicidal self-injurious behavior?
2. How do adolescents experience non-suicidal self-injurious behavior?

Method

Sample

A single case study of non-suicidal self-injurious behavior of adolescents was chosen. As there is a real-life experiences and complex issues involved in this study. The individual shared an in-depth view of experiences and factors involved in the behavior. Furthermore, the research epistemology of the current study involves a social constructivism approach which shows the social context of experiences, understanding and meaning of their world. This further signifies the experience of the sample with NSSI as it will play a significant role in understanding NSSI behaviors and associated psychosocial factors. Adolescents are the targeted sample for the current study as it was observed that NSSI is more prevalent in adolescents.

Participants

NSSI adolescent (AA) and her sister (SA) were selected for the current study through purposive sampling. The age of AA was 16 years, belongs to a nuclear family and was a student of secondary education, was a resident of Islamabad, Pakistan. Her sister (SA) was 28 years old, married and had completed her Bachelors.

Data Collection Tool

The data was collected through semi-structured interviews of the adolescent (AA) with NSSI and her sister (AS) individually. The Mental State Examination of AA was also assessed and evaluated during the initial screening. For this study, purposive sampling was used to identify the sample of research. It is used to collect research data from adolescent showing features of NSSI. The data was collected in person through handwritten notes, an NSSI questionnaire and audio recording.

Procedure

A semi-structured interview was developed through existing research literature and discussion with the supervisor concerning non-suicidal behavior and psychosocial factors. The interview guide was reviewed by 3 experts who suggested the changes and prompted questions for the interview guide. The participant was approached in a psychological clinic in Islamabad. The researcher contacted participants and their consent was taken i.e., verbal and written. The participant was briefed about the purpose of the research study and interview. The participant was ensured that their identity would remain confidential and anonymous and their information would be used for research purposes only. It was ensured that this study would not cause any emotional, psychological, and physical harm to them. Before conducting the interview, informed consent was provided to the participant and was ensured to have access to psychological help. Furthermore, ethical guidelines provided by the American Psychological Association and Higher Education Commission (HEC) were followed by the researcher. Firstly, Non-Suicidal Self-Injury Expectancy Questionnaire was conducted for the research study as it has shown a reliability of .80 and validity of .90 (Hasking & Boyes, 2018). The NSSI questionnaire was administered for the screening of NSSI tendencies and the selection of the adolescent.

The interview was conducted at the designated place, time and subject to availability of the participant. The researcher followed ethical guidelines before conducting interview questions. The participant was briefed about research and consent for audio recording and notes were taken from the participant. The participant was interviewed for at least 2 hours and questions were based on research questions i.e., demographic details and psychosocial factors. Additional questions were used for detailed understanding and extracting information about the behavior and psychosocial factors.

The interview was successfully conducted as the participant was cooperative and documented her case of NSSI.

Subject's sister was also interviewed as she was reported to be more attached to her younger sister. She provided details of the sample's condition and validated the findings acquired from AA. The interview lasted for 20-25 minutes where she shared information related to her sister and was cooperative in providing detailed participant information.

Analysis

The data was analyzed via Interpretative Phenomenological Analysis which helps in exploring the subjective lived experiences of participants (Smith & Osborn, 2015). The first step includes transcribing of interview and extracting themes from the data. Data was transcribed with the help of handwritten notes and audio recordings. The themes were generated and grouped into sub-themes. The transcript was evaluated by the second author vigilantly to assess the themes and validate findings. The themes were extracted that is, common themes from a transcript of the interview and were converted into major themes. The themes were assessed and reviewed by 3 experts who have validated the findings of the study and suggested changes were incorporated in the analysis.

Findings

Observation through MSE

Adolescent (AA) with NSSI was in neat and appropriate attire. Initially, she was feeling anxious but remained cooperative throughout the interview. She maintained good eye contact and no impulsive actions were evident. Her speech was low in tone but moderate in rate and volume. No delusion, phobia or hallucination was found. Her memory was intact and had insight into her problems.

Interview of AA's Sister

According to her sister, she started engaging in this act 2 years back after shifting from Karachi to Islamabad due to financial crises. She said "*As far I remember, she was happy and good in Karachi, there was no such thing. But after moving to Islamabad due to financial situation it has occurred. And we have been very concerned about her*".

She reported that her sister started to show psychological issues, particularly after moving out and financial crises. She further disclosed that her father’s mental health has also contributed to her sister’s condition. Due to this she has developed this behavior and started harming herself. Her sister also reported that academic pressure has also increased due to the change in the board system as the Federal board is considered more difficult as compared to the Sindh board.

Table 1
Major Themes and Sub-Themes Extracted From Transcribed Data From Adolescent With Non-Suicidal Self Injurious Behavior

Major Themes	Sub themes	Frequency
Experiencing low self-endurance	Escape from situations	3
	Helplessness in situations	3
False Impression and disconnectedness	Unable to connect with other	1
	Judgmental	2
Unhealthy Coping Mechanism	Urge to engage in the mechanical release	2
	To regulate intense emotions	1
Sense of Incompleteness	Self –Incompetency	4
	Negative self-beliefs	3
Emotional Burden from family	Internal Conflict in family	2
	External Conflict in family	2
	Separation from relatives	4
Adjustment Issues in new place	Adjustment issues	2
Bullying based on individuality	Intercity barrier	4
	Different Education System	3

Table 1 depicts the findings of the study which reveals that adolescent has shown sensitivity towards psychosocial factors that is, experiencing low self-endurance, false impression and disconnectedness, unhealthy coping mechanism, sense of incompleteness, emotional burden from family, adjustment issues in a new place and bullying based on individuality. Psychosocial factors play a significant role in developing NSSI behavior.

The current study was conducted to analyze the experiences and psychosocial factors contributing in non-suicidal self-injurious behavior. The first emergent theme is the ‘*Experiencing Low self-endurances*’ where adolescent’s experience emotional intensity i.e. awareness about their action and urge to escape from life stressors which results in non-suicidal self-injurious behavior.

“I just do not want to live anymore; I cannot handle any burden. I could not handle family and anything, I just didn't like anything I could not do anything. I had it in my mind that no one could understand me and it would remain with me (...) The emotion inside me like anger issues was not coming out. Even with my action, it didn't help in releasing my emotion (...) I had to do something to make myself free from this, be it anything I just want to do anything and I started doing self-harm (Participant-AA).

The participant explains about their painful and intense emotions which are piling up inside them which result in the form of this act. The participants explain how it becomes unbearable and need their escape from these sensations of psychological pain.

The second emergent theme is ‘*false impression and disconnectedness*’ which indicates adolescents have shown feelings of being misunderstood and disconnected by their relatives or friends.

“I still have it and it'll stay with me for life. I know that it'll be in my mind. Unless someone listens to me and I can talk to them freely. Till then my condition will be the same, whatever happens (...). My sisters think I want attention from them by doing this act. One of my sisters thinks I'm two-faced, cold-hearted and selfish” (Participant-AA).

The participant has shown awareness towards of their behavioral problems and thoughts patterns. However, it was mentioned in the statement that the participant felt unheard and had no connectivity with their loved ones or people surrounding her which is a contributing factor.

The third emergent theme is the ‘*Unhealthy Coping Mechanism*’ which reveals that adolescents have shown negative coping mechanism i.e., using materials to inflict injury to release their intense emotions i.e., anger, frustration and pain.

I just got up and went to my room, locked my room. I locked my bathroom and sat there. I cried for hours and hours and then harmed myself like from a toilet holder. I want to escape from my emotions and situations which are going on in my house (...). I know I'll do it again after my emotional breakdown. When I do it decreases my intensity of emotions. I'm doing it to escape from the situations (...) I told my family about my recent scar and that it was an accident” (Participant-AA).

The situations are the triggering factor which plays an integral role in implying negative coping skills such as making up a story due to fear of judgement from loved ones or emotional distress and escaping from intense emotions. It also reveals clarity for a short time and insight into this behavior.

The fourth emergent theme is the '*Sense of Incompleteness*' where the adolescents have shown a sense of incompleteness i.e., low self-esteem which has distorted adolescents.

"I'll say about it, it is covering and negating my personality. It is not letting me come out and my mental state like my anger issues is coming out. I cannot present my real self, I'm a really friendly person but when I meet someone, I act irritated and frustrated as a lot is going in my mind. People then say about me that I am rude. If we talk about it, I studied to pass only in my life. I was never into positions things but when I came here, even if I did hard work triple times. I didn't get what I needed (...) Morale gets down, now I cannot do it, not even with hard work so nothing can happen" (Participant-AA).

This statement depicts the distortion in their selves 'being' and emotions that are unable to regulate them. The subtheme "sense of incompetency" emerges from academic pressure. This gives a sense of failure and lack of achievement.

The fifth emergent theme is the '*emotional burden from family*' which reveals that family has been a significant factor in the development of NSSI behavior in adolescents. The themes illustrate that relationship and attitude of family plays a crucial role in influencing the mental health of adolescent as it is a sensitive phase and are more vulnerable at this stage.

"My father is sick and had a stroke. He has other problems and the doctor. He has affected other family members. My first thoughts (suicidal) come from it. I know I shouldn't do it but it is due to family pressure. The child needs freedom and they try to find it through their way. It gives thoughts like suicidal. There's nothing like that, they disregard my feelings. I want someone who will listen to me and help me. I have no one to share my feelings with family or sisters. I want someone to understand my feelings and situations. It's not overthinking every time (Participant-AA).

The participant explained about their experience of sharing her concerns and was unable to connect with her family. It can be seen as,

a sense of rejection and not being believed by her family about her condition and thoughts which is occurring in her life.

Baba had a stroke 2 years ago. We had financial crises and he has been depressed since then. His business partner has betrayed him (...). My father is concerned and I must do something so I need to study now. I know I cannot study but I have to do it now. I have these thoughts in my mind” (Participant-AA).

The pressure from the family to improve their situation has been a significant factor in their current condition i.e., financial crisis and constant comparison.

The sixth emergent theme is the ‘*Adjustment Issues in New Place*’ where the participant explains her shifting and transition of life from one city to another city. The differences in the language, behavior of people and standard of education have shown difficulty in adjusting to new places.

“I don’t want to live far away from relatives; we were like so close. We used to visit each other places on weekends (...) It was like that, shifting was the first trigger then the rest of the things happened. My life was busy there with school and then I had to adjust here, was a difficult time of my life.” (Participant-AA).

The attachment to her relatives and their presence was missing in her new phase of life. The participant has shown emotional attachment towards her relatives and native place.

“I was friendly in Karachi. I used to know my whole school. People used to know me through my sister’s name (...). Then I came here in 8th, I have no friends now and I used to talk rudely. People used to come and try talking to me then I said to them, please don’t talk to me as I’m disturbed (...). My first two months were difficult as I wasn’t able to friends and teachers were not listening to me. I wasn’t able to communicate to anyone” (Participant-AA).

There is adjusting issues in the sense of missing her past life with friends and being recognized. However, when she shifted, the participant struggled to adjust to the new school and new academia. Due to ongoing issues, it was difficult to process these new changes and new issues as well. Adjustment issues are emerging as a major theme which includes intercity cultural barriers, loneliness, sudden change and shift in environment. These sub-themes are causing non-

suicidal behaviour in adolescent as the intercity barrier causes loneliness and difficulty in adjusting to their surroundings.

The seventh emergent theme of the research is ‘*Bullying based on individuality*’ where bullying occur based on differences in the participant’s life and the attitude of the teacher has shown a significant role in facilitating bullying.

“My school mostly had Punjabi students who speak Punjabi, when I first enrolled in school. I didn’t know how to speak, understand and say anything in Punjabi. My pronunciation of certain words is different as compared to them. Girls started commenting about their accents saying that she stutters, she doesn’t know how to speak and she cannot speak Punjabi how can she adjust here with us (...) You cannot do it and you cannot even speak Punjabi, how can you set here? Why don’t you just leave this place?” (Participant-AA).

The bullying can be observed due to the difference in the language and accent of the participant which is different in sense of pronunciation or understanding. The difference in board systems resulted in self-doubt in participant’s ability to perform in academic efficiently.

“I knew I could not adjust here and I don’t speak, or understand Punjabi. I have language issues, and a language barrier as well. I cannot learn it quickly. The majority of people speak Punjabi here and even if they don’t speak. They say it in a flow of a word or two. I’ll be standing there thinking like, are they talking about me and another person cannot understand” (Participant-AA).

The language barrier serves as the inability to understand a cultural language and constant worrying about class fellows making remarks about the participant. There was a strong urge to understand the language and to avoid feeling left out.

“When I started going to school, my teacher started saying things like you have made your sickness an excuse and it’s not that serious (...). It was a coed class, and my class fellows (boys) started to demotivate me. I came back home and started crying” (Participant A).

The teacher doubted the sickness of the participant and their negative remarks towards the participant resulted in the facilitation of

bullying and emotional instability. School events serve as a stressor which includes bullying, pressure to perform, and unsupportive and degrading teachers. An unsupportive teacher causes academic pressure and increases stress in adolescent's life.

Results

The current study investigated experiences and psychosocial factors associated with NSSI. The emergent themes in this study are significantly supported by the previous research which shows an association of NSSI with psychosocial factors. It is strongly supported by the literature which indicated that emotional dysregulation was associated with the features of NSSI particularly prevalent in adolescents (Wolff et al., 2019; Brown & Plener, 2017; Cullen et al., 2013). It is conspicuous in the result of the study that emotional dysregulation plays a significant role in triggering NSSI behavior.

Furthermore, is supported by another qualitative study which emphasizes disconnectedness as a significant factor and evident association with NSSI (Gayfer et al., 2020; Hinton, 2019). The study is further supported by where loneliness serves as contributing factor in the development of NSSI in adolescents (Wang et al., 2020). It is demonstrated in the finding that emotional dysregulation is a component of NSSI where negative emotional states tend to generate in developing unhealthy coping styles in adolescents (Cullen et al., 2013; Wan et al., 2020).

Cognitive distortion and negative self-perception have a significant role in the development of NSSI behavior in adolescents (Halpin & Duffy, 2020). Specific styles of intrapersonal and negative affective states show an association in maintaining NSSI behavior in individuals (Barrocas et al., 2015). In summary, intrapersonal styles have strengthened the association with NSSI behavior in adolescents. Psychosocial factors have played an evident role in aiding NSSI features. As evident from the literature that unhealthy family dynamics and interpersonal relations are contributing factors in influencing psychological health (Hepp et al., 2021; Kasusar & Khan, 2020). Prior research also confirms that interpersonal relations influence the psychological health of adolescents and result in NSSI behaviour (Turner et al, 2012). Social factors have a crucial role in developing and maintaining NSSI in individuals (Brown & Witt, 2019; Maciejewski et al., 2014).

The psychosocial factors cover life events experiences where academic pressure and stressful school life events play a significant role in developing non-suicidal self-injurious behaviour in adolescents

as it influences their mental health (Chen et al., 2021; Xin et al., 2020). In conclusion, interpersonal relations and intrapersonal are substantial elements in maintaining NSSI behaviours (Tatnell et al., 2014). The evidence shows that intrapersonal consists of self-concept and emotional regulation is the significant attributes and determined the features of NSSI. Hence, negative self-concept and emotional dysregulation contribute to and increase the intensity of NSSI which further validates the findings of the current study (Lear et al., 2016).

Prior research has thoroughly investigated the NSSI about Western and Eastern cultures. The current research study focuses on the context of Pakistani culture and its psycho-social factors. Previously, a quantitative study was conducted in Pakistan and suggested exploring psychosocial factors of non-suicidal self-injurious behaviour with the approach of a qualitative study (Kasusar & Khan, 2020). For that reason, the current study has been conducted with the approach in qualitative and has highlighted psychosocial factors.

Limitation and Recommendations

The current study has limited scope in generalizing its result as it has a small sample. As it was a single case study it gives further limitations of generalizing the experiences and psychosocial factors of adolescents. In addition, multiple case studies of different samples with NSSI will provide more insights into their non-suicidal behaviour. Future studies can also focus on exploring psychosocial factors about individual culture which is promoting non-suicidal self-injurious tendencies in adolescents.

A single case study for the current study was taken from the specific area of Islamabad. In future, the sample can be taken from different areas to understand the psychosocial factors of cultural differences. Also, future studies can explore the psychological health (disorders) of the sample's family to assess its influence in developing features of NSSI. A screening tool can be used to assess the tendencies of non-suicidal self-injurious behaviour in adolescents to generalize findings of non-suicidal features.

Implications

The current research can help in determining the psychosocial factors of non-suicidal self-injurious behaviour in adolescents. It can help in generating interventions based on psychosocial factors. This study's findings can help in aiding and facilitating the emotional well-

being of adolescents. It also helps in considering the diagnosis of non-suicidal self-injurious behaviour in adolescents for therapists. Therapists can facilitate adolescents in catering for their psychosocial factors and their coping mechanisms. The findings are very crucial in understanding adolescent's emotional well-being and receiving support from psychologists.

Conclusion

Non-suicidal self-injurious behaviour has recently become more prevalent among adolescents and young adults in Pakistan. Psychosocial factors play an influential role in adolescents developing non-suicidal self-injurious behaviour. Hence, it is important to consider the role of psychosocial factors i.e., interpersonal relations, academic pressure and social factors to analyse to reduce their negativity on mental health of non-suicidal self-injurious. As evident in the study psychosocial factors i.e., experiencing low self-endurance, false impression and disconnectedness, unhealthy coping mechanism, sense of incompleteness and emotional burden from family has resulted in the development of NSSI behavior in adolescents.

References

- Akram, B., Batool, M., Rafi, Z., & Akram, A. (2017). Prevalence and predictors of non-suicidal self-injury among children with autism spectrum disorder. *Pakistan Journal of Medical Sciences*, 33(5), 1225. doi.org/10.12669/pjms.335.12931
- Balázs, J., Györi, D., Horváth, L. O., Mészáros, G., & Szentiványi, D. (2018). Attention-deficit hyperactivity disorder and non-suicidal self-injury in a clinical sample of adolescents: The role of comorbidities and gender. *BMC Psychiatry*, 18(1), 1-10.
- Barrocas, A. L., Giletta, M., Hankin, B. L., Prinstein, M. J., & Abela, J. R. (2015). Non-suicidal self-injury in adolescence: Longitudinal course, trajectories, and intrapersonal predictors. *Journal of Abnormal Child Psychology*, 43(2), 369-380.
- Brown, R. C., & Plener, P. L. (2017). Non-suicidal self-injury in adolescence. *Current psychiatry reports*, 19(3), 1-8.
- Brown, R. C., & Witt, A. (2019). Social factors associated with non-suicidal self-injury (NSSI). *Child and adolescent psychiatry and mental health*, 13(1), 1-2.
- Chen, X., Zhou, Y., Li, L., Hou, Y., Liu, D., Yang, X., & Zhang, X. (2021). Influential factors of non-suicidal self-injury in an Eastern cultural context: A qualitative study from the perspective of school mental health professionals. *Frontiers in Psychiatry*, 12.

- Cipriano, A., Cella, S., & Cotrufo, P. (2017). Nonsuicidal self-injury: A systematic review. *Frontiers in Psychology*, 8, 1946-1955. doi.org/10.3389/fpsyg.2017.01946
- Claes, L., Luyckx, K., & Bijttebier, P. (2014). Non-suicidal self-injury in adolescents: Prevalence and associations with identity formation above and beyond depression. *Personality and Individual Differences*, 61(1), 101-104.
- Claes, L., Luyckx, K., Baetens, I., Van de Ven, M., & Witteman, C. (2015). Bullying and victimization, depressive mood, and non-suicidal self-injury in adolescents: The moderating role of parental support. *Journal of Child and Family Studies*, 24(11), 3363-3371.
- Cullen, K. R., Westlund, M. K., LaRiviere, L. L., & Klimes-Dougan, B. (2013). An adolescent with non-suicidal self-injury: A case and discussion of neurobiological research on emotion regulation. *American Journal of Psychiatry*, 170(8), 828-831.
- Fox, K. R., Franklin, J. C., Ribeiro, J. D., Kleiman, E. M., Bentley, K. H., & Nock, M. K. (2015). Meta-analysis of risk factors for non-suicidal self-injury. *Clinical Psychology Review*, 42, 156-167. doi.org/10.1016/j.cpr.2015.09.002
- Gayfer, B. L., Mahdy, J. C., & Lewis, S. P. (2020). Peer reactions to non-suicidal self-injury disclosures: A thematic analysis. *Counselling Psychology Quarterly*, 33(1), 79-99.
- Ghaedi Heidari, F., Bahrami, M., Kheirabadi, G., & Maghsoudi, J. (2020). Factors Associated with Non-Suicidal Self-Injury (NSSI) in Iran: A Narrative Systematic Review. *International Journal of Pediatrics*, 8(1), 10785-10799.
- Glenn, C. R., & Klonsky, E. D. (2011). Prospective prediction of non-suicidal self-injury: A 1-year longitudinal study in young adults. *Behavior Therapy*, 42(4), 751-762. doi.org/10.1016/j.beth.2011.04.005
- Güney, E., Alniak, İ., & Erkıran, M. (2020). Predicting factors for non-suicidal self-injury in patients with schizophrenia spectrum disorders and the role of substance use. *Asian Journal of Psychiatry*, 52, 102068. doi.org/10.1016/j.ajp.2020.102068
- Halpin, S. A., & Duffy, N. M. (2020). Predictors of non-suicidal self-injury cessation in adults who self-injured during adolescence. *Journal of Affective Disorders Reports*, 1, 100017.
- Hamza, C. A., Stewart, S. L., & Willoughby, T. (2012). Examining the link between non-suicidal self-injury and suicidal behavior: A review of the literature and an integrated model. *Clinical Psychology Review*, 32(6), 482-495. doi.org/10.1016/j.cpr.2012.05.003
- Hasking, P., & Boyes, M. (2018). The non-suicidal self-injury expectancy questionnaire: Factor structure and initial validation. *Clinical Psychologist*, 22(2), 251-261. doi.org/10.1111/cp.12127

- Hepp, J., Störkel, L. M., Wycoff, A. M., Freeman, L. K., Schmahl, C., & Niedtfeld, I. (2021). A test of the interpersonal function of non-suicidal self-injury in daily life. *Behaviour research and therapy*, *144*, 103930.
- Hinton, C. A. M. (2019). *Non-Suicidal Self-Injury among Adolescents and Young Adults of Color: How Racial Identity Impacts Self-Harm Use*. University of Northern Colorado.
- Hooley, J. M., & Franklin, J. C. (2018). Why do people hurt themselves? A new conceptual model of non-suicidal self-injury. *Clinical Psychological Science*, *6*(3), 428-451. doi.org/10.1177/2167702617745641
- Horne, O., & Csipke, E. (2009). From feeling too little and too much, to feeling more and less? A nonparadoxical theory of the functions of self-harm. *Qualitative Health Research*, *19*(5), 655-667. doi.org/10.1177/1049732309334249
- Jaworska, N., & MacQueen, G. (2015). Adolescence as a unique developmental period. *Journal of Psychiatry & Neuroscience: JPN*, *40*(5), 291.
- Kasusar, R., & Khan, S. (2020). Psychosocial Factors of Non-suicidal Self-Injury Among Adolescents and Young Adults. *Pakistan Journal of Psychological Research*, 637-655.
- Klonsky, E. D., Oltmanns, T. F., & Turkheimer, E. (2003). Deliberate self-harm in a nonclinical population: Prevalence and psychological correlates. *American Journal of Psychiatry*, *160*(8), 1501-1508. doi.org/10.1176/appi.ajp.160.8.1501
- Klonsky, E. D. (2007). Non-suicidal self-injury: An introduction. *Journal of Clinical Psychology*, *63*(11), 1039-1043. doi.org/10.1002/jclp.20411
- Klonsky, E. D., Victor, S. E., & Saffer, B. Y. (2014). Non-suicidal Self-Injury: What We Know, and What We Need to Know. *The Canadian Journal of Psychiatry*, *59*(11), 565-568. doi.org/10.1177/070674371405901101
- Lear, M. K., & Pepper, C. M. (2016). Self-concept clarity and emotion dysregulation in non-suicidal self-injury. *Journal of Personality Disorders*, *30*(6), 813-827.
- Liu, X., Chen, H., Bo, Q. G., Fan, F., & Jia, C. X. (2017). Poor sleep quality and nightmares are associated with non-suicidal self-injury in adolescents. *European Child & Adolescent Psychiatry*, *26*(3), 271-279.
- Maciejewski, D. F., Creemers, H., Lynskey, M. T., Madden, P. A., Heath, A. C., Statham, D. J., & Verweij, K. J. (2014). Different outcomes, same etiology? Shared genetic and environmental influences on non-suicidal self-injury and suicidal ideation. *JAMA Psychiatry*, *71*(6), 699-710.
- Naoum, J., Reitz, S., Krause-Utz, A., Kleindienst, N., Willis, F., Kuniss, S., Baumgärtner, U., Mancke, F., Treede, R. D., & Schmahl, C. (2016). The role of seeing blood in non-suicidal self-injury in female patients with borderline personality disorder. *Psychiatry Research*, *246*, 676-682. doi.org/10.1016/j.psychres.2016.10.066

- Shahwan, S., Zhang, Y., Sambasivam, R., Ong, S. H., Chong, S. A., & Subramaniam, M. (2021). A qualitative study of motivations for non-suicidal self-injury in a sample of psychiatric outpatients in Singapore. *Singapore Medical Journal*.
- Siddiqui, S. (2018). Behavior and emotional health of adolescent boys engaged in non-suicidal self-injury. *NUST Journal of Social Sciences and Humanities*, 4(1), 1-20.
- Smith, J. A., & Osborn, M. (2015). Interpretative phenomenological analysis as a useful methodology for research on the lived experience of pain. *British Journal of Pain*, 9(1), 41-42.
- Tatnell, R., Kelada, L., Hasking, P., & Martin, G. (2014). Longitudinal analysis of adolescent NSSI: The role of intrapersonal and interpersonal factors. *Journal of Abnormal Child Psychology*, 42, 885-896.
- Turner, B. J., Chapman, A. L., & Layden, B. K. (2012). Intrapersonal and interpersonal functions of non-suicidal self-injury: Associations with emotional and social functioning. *Suicide and Life-Threatening Behavior*, 42(1), 36-55.
- Wan, Y., Chen, R., Wang, S., Clifford, A., Zhang, S., & Orton, S. (2020). Associations of coping styles with non-suicidal self-injury in adolescents: Do they vary with gender and adverse childhood experiences? *Child Abuse & Neglect*, 104, 104470.
- Wang, Q., Wang, H., & Liu, X. (2020). Loneliness, non-suicidal self-injury, and friendship quality among Chinese left-behind adolescents: The role of parent-child cohesion. *Journal of Affective Disorders*, 271(1), 193-200.
- Wolff, J. C., Thompson, E., Thomas, S. A., Nesi, J., Bettis, A. H., Ransford, B., ... & Liu, R. T. (2019). Emotion dysregulation and non-suicidal self-injury: A systematic review and meta-analysis. *European Psychiatry*, 59(1), 25-36.
- Whitlock, J., Muehlenkamp, J., Eckenrode, J., Purington, A., Abrams, G. B., Barreira, P., & Kress, V. (2013). Non-suicidal self-injury as a gateway to suicide in young adults. *Journal of Adolescent Health*, 52(4), 486-492. doi.org/10.1016/j.jadohealth.2012.09.010
- Xin, M., Yang, X., Liu, K., Naz Boke, B., & Bastien, L. (2020). Impact of negative life events and social support on non-suicidal self-injury among Chinese middle school students. *American Journal of Men's Health*, 14(4), 798-810.
- Zareen, G., & Ashraf, F. (2021). Sub-clinical borderline personality disorder symptoms as predictor of suicidality and non-suicidal self-injury in young Pakistani females. *The Journal of the Pakistan Medical Association*, 71(2), 740-743. doi.org/10.47391/JPMA.1088

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