



## MEASURING SUICIDAL IDEATION AMONG DRUG ADDICTS IN THE REHABILITATION CENTER

Norshahira Osman<sup>1\*</sup>, Ateerah Abdul Razak<sup>2</sup>, Lukman Z. Mohamad<sup>1</sup>, Hayuni Mazlan<sup>1</sup>

<sup>1</sup> Faculty of Applied Social Sciences, Universiti Sultan Zainal Abidin, 21300 Kuala Nerus, Malaysia

<sup>2</sup> Faculty of Language Studies and Human Development, Universiti Malaysia Kelantan, 16300 Bachok, Malaysia

\*Corresponding Author Email: [Norshahira\\_osman@yahoo.com](mailto:Norshahira_osman@yahoo.com)

Received: 08 August 2022 • Accepted: 13 September 2022 • Published: 30 April 2023

### *Abstract*

*The prevalence of suicide among drug addicts is common and one of the biggest challenges faced by society. Studies have found that substance use is associated with suicide ideation. Early detection of suicidal intent among addicts is important to ensure they do not take further action to prevent suicidal acts. This study used a psychometric instrument, namely the Suicidal Ideation Behavioural Assessment (SIBA<sup>®</sup>). The four main components involved were interpersonal conflict, emotional disorder, depression, and hopelessness. A descriptive study was conducted in this study. Altogether, a total of 123 drug addicts in Malaysia participated in this study as respondents. The descriptive analysis shows that 52.85% of addicts had low suicidal ideation behaviour, 21.95% were moderate, 3.25% high, and 0.81% very high. Findings from this study showed that drug addicts have high suicide ideation, which can be a risk factor for suicide attempts. It is suggested to focus on early detection of suicide ideation. This study is expected to make a significant contribution to the government, especially the rehabilitation centre, in helping addicts who have suicidal ideation behaviours to be given better attention and psychosocial support services.*

**Keywords:** *Conflict Interpersonal; Emotional Disorder; Depression; Hopelessness; Suicidal Ideation*

**Cite as:** Osman, N., Abdul Razak, A., Mohamad, L.Z., & Mazlan, H. (2023). Measuring Suicidal Ideation Among Drug Addict Involved in the Rehabilitation Centre. *Asian People Journal*, 6(1), 133-142.

## INTRODUCTION

Suicide among drug addicts is a significant public health problem that can be minimized by programs and appropriate prevention policies (Inman et al., 2011; Taylor & Jacqueline, 2018; National Survey of Drug Use and Health, 2018). Given the well-established association between drug addicts and suicide, understanding the nature and mechanisms of linkage between these two is important for designing and developing appropriate interventions (Vijayakumar et al., 2011). In 2013, between 324 million people, i.e., from 3.50% to 7.00% of the world population between 15- 64 years, consumed illicit drugs at least once. There are an estimated 183 thousand deaths and 16 to 39 million drug addicts related to this harm to health (United Nations Office on Drugs and Crime, 2014). The World Health Organization (WHO) report estimated that 7,888,000 suicides occurred worldwide in 2015. Malaysia, which is currently undergoing modernisation, is also experiencing a problem with suicide cases. Malaysia was ranked 146th in the world in suicide cases in 2017, and 7.85% of suicides occur for every 100,000 people detected in Malaysia (WHO, 2018). Also, the prevalence of drug use in the country increased dramatically in 2019. This increase is assumed to be related to psychological, social, and economic factors and the possibility of finding drugs easily (AADK, 2020). Previous studies show that 90% of people who commit suicide experience a substance abuse disorder and that there is a link between drug use or drug addiction with suicidal ideation behaviour (Lesage et al., 1994; Moscicki, 2001; Vehbiu & Bodinaku, 2014).

Several factors contribute to suicidal behaviour among addicts, such as interpersonal conflict, emotional disorder, depression, and hopelessness that occur within them. These factors are highly relevant to suicidal ideation behaviour among drug addicts. Interpersonal conflicts contribute to drug addiction because of the “social pain” they produce. Previous studies show that interpersonal conflict is an interaction between interdependent individuals with disagreements and interests to resist incompatibility, disruption, and negative emotions about themselves to others (Bao et al., 2016; Van Orden et al., 2010). It refers to the aspect of the relationship between an individual and another, including how a person manages behaviours when interacting with oneself or others around them (Bao et al., 2016).

Previous research also shows that emotional disorders are risk factors for suicide among drug addicts (Lesage et al., 1994). An emotional disorder is a mental disorder that has a relationship between behaviours or relationships to an individual's psychology that the individual cannot control mentally (Curtin et al., 2016). According to Britannica, individuals with unstable emotions can experience psychiatric, psychological disorders, and mental disorders associated with sadness and pain (Sparks, 2017). However, emotional disorders also will harm the bodily and mental functions of addicts. Adolescents, especially drug addicts, typically experience emotional disorders because they are unable to control their emotions (Brent, 1995). This study is in line with Pompili et al. (2012) the relationship between addicts and emotions among adolescents is increasing and leads to a high risk of suicidal ideation behaviour. Depression is associated with a higher prevalence of substance use among drug addicts. Depression can cause harmful emotional health effects a complicated condition and disrupt personality or stress (Oquendo & Baca-Garcia, 2014). The depressive person suffers from a lowering of mood, anxiety, sadness, reduction of energy, decrease in activity, loss of appetite, weight loss, or weight growth and changes. Depression can reduce focus, interest, and self-motivation but helplessness and indecisiveness are increased (Wong et al., 2013; Stoyanova, 2014). It can also affect the risk of tiredness; appetite is diminished and sleep disorder after even minimum effort is common. Such things are inevitable and especially uncontrollable in this human life. In many cases, effort alone is not enough to overcome it (Stoyanova, 2014).

Then, hopelessness is considered one of the most consistent risk factors and suicidal ideation behaviour, and it has been considered a negative hope for the future that leads suicidal individuals to believe that suicide is the only viable strategy to address their problems (Klonsky et al., 2016). This hopelessness is associated with enthusiasm and happiness, motivation, cognitive despair, and negative expectations about the future. Such psychological characteristics may inhibit intervention efforts aimed at suicide prevention. However, previous research studies have found strong support that despair is a factor in suicidal behaviour (Boduszek & Dhingra, 2016; Lliceto & Fino, 2015). Hopelessness is a cognitive aspect of psychology that is often used as an indicator of accompanying suicidal behaviour and mental disorders (O'Connor & Nock, 2014). These aspects are related to a person's feelings toward the future, loss of motivation, and hope. Dissatisfaction can often be understood by the presence of negative thoughts as everything that happens causes individuals to think in a bad direction or they cannot predict the future.

The conclusion that suicides among drug addicts gives a picture related to suicidal ideation behaviour. Therefore, preventive measures should be implemented to help addicts so they do not commit suicide as a problem-solving measure. The results of this research are expected to play a role in reducing suicide-related deaths. Therefore, there needs to be a prevention approach and intervention strategy for this problem (Conner et al., 2014; Taylor & Jacqueline, 2018). Therefore, this study is an attempt to measure suicide ideation behaviour assessment among drug addicts involved in Malaysia.

## **METHODOLOGY**

Suicide ideation behaviour among drug Addicts in nature is a difficult and sensitive subject (Vehbiu & Bodinaku, 2014; Dwyer, 2013). However, there is an urgent need to research it. One of the reasons for this research is because, as a society, we in Malaysia have very limited knowledge of the phenomenon as well as a limited explanation of the involvement of drug addicts. Therefore, many aspects are still unknown and pretty much concealed from society against that phenomenon (Taylor & Jacqueline, 2018; Maniam Thambu, 2010).

In this research, the use of the drug addict-centred approach would seem to be the right choice, considering that drug addicts have a high risk of suicide ideation behaviour. This approach is concerned with the influences that affect drug addicts involved in research more than other approaches (Cresswell et al., 2011). It can minimise any possible risk to drug addicts resulting from the research. In principle, the approach places drug addicts at the centre of the research process, regarding them as socially competent and worthy of investigation (Taylor & Jacqueline, 2018). This approach would also be an advantage to drug addicts because it gives them opportunities to address their situation without the intervention of outsiders. This research has been conducted among drug addicts in rehabilitation, which is one of the places for rehabilitation in Malaysia (West Malaysia). This research uses quantitative methods due to a greater emphasis on research data values (numerical) and sample number of studies involving many (Ugwuooke, 2016).

A total of 123 drug addicts were interviewed, representing 100% of the respondents who consented to participate in the research. One instrument, namely the Suicidal Ideation Behaviour Assessment (SIBA<sup>®</sup>) was used in this study. SIBA<sup>®</sup> is an instrument to measure psychological suicidal ideation behaviour levels such as interpersonal conflict, emotional disorder, depression, and hopelessness. The instrument is divided into two sections: the main section respondent profile and follows with the SIBA<sup>®</sup>. There are 12 questions in the first section

and 40 questions in the second section. Items for evaluation dimensions are rated on a 4-point Likert scale from strongly disagree to strongly agree (Norshahira et al., 2021; Norshahira et al., 2020).

## RESULTS AND DISCUSSION

For this study, the respondent profile characteristics included in the analysis are the duration of respondents at a rehabilitation centre, age, age of starting using the drug, duration of respondent taking the drug, education, marital status, family raising respondents, employment, residence, the reason for using the drug, types of drugs and psychological test. The respondent profile characterised all 123 drug addicts with diagnoses treated in the rehabilitation centre in this study. According to the data, the most common duration of being in a rehabilitation centre is 7-12 months (48.8%), followed by 0-6 months (46.34%) and 13-18 months (4.88%). This study findings by the age of respondents during the study start with the age of 26-55 years. Respondents aged 26-30 years (26.59%) are the most in this study, followed by respondents aged 31-35 (18.70%), 36-40 years (22.76%), 41-45 years (12.20%), then 46-50 years (8.94%) and the least number of respondents are those aged 51-55 years (0.81%). Next, the age of respondents who started taking drugs in the study was 50 years and below. 16-20 years (26.02%) was the age of most respondents in the study involved in drug abuse, followed by respondents aged between 21-25 years (25.20%), followed by respondents aged 26-30 years (15.45%), then respondents aged 11-15 years (11.38%), then 10 years and below (8.94%), followed by 31-35 years (7.32%), followed 36-40 years (4.07%), 41-45 years (0.8%) and respondents aged between 46-50 years (0.8%).

According to the duration of respondents, most taking drugs is a total of 10-12 years (27.64%). While 4-6 years (22.76%), followed by 4-6 years (10.57%) and 7-9 years (10.57%). Next 19-21 years (8.13%), 22-24 years (4.07%), followed by 13-15 (6.50%), followed by 16-18 years (3.25%), 25-27 years (1.63%) and 28-30 also (1.63%). For 12 months and below, 31-33 years, 34-36 years, and 37-39 years (0.81%) only. For education, the majority of respondents were in secondary school 92 (74.80%), followed by college or university at 18 (14.63%), elementary school was 9 (7.32%), and the unknown level of education was 4 (3.25%). Next, by marriage status respondents, the majority of the single was 69 (56%), followed by 38 (30.89%) who were married, and widowed were 16 (13.01%). Based on the data obtained, the average number of respondents who lived with their parents was 107 (86.99%), followed by single mothers (divorced by husbands) 9 (7.32%), living with single mother (whose husband died) 2 (1.63%), with single fathers (with the death of wives) was 2 (1.63%), 1 (0.81%) living with stepmother, living with single fathers (divorced with wife) were 1 (0.81%) and living with adoptive parents were 1 (0.81%). For the occupation data, the majority of 70 (56.91%) respondents were self-employed, while 34 (27.64%) were working as private officers, 10 (8.13%) were government employees, and 9 (7.32%) respondents did not work. According to the location of residence, most respondents who lived in the village is 92 (74.80%), followed by the city 20 (16.26%), and 11 (8.94%) live in the town.

In the study, the reason respondents used drugs and the types of drugs taken by respondents allow them to answer more than one answer according to the reasons involved with drug addiction. The results of the analysis showed the respondent gave reasons involved with drugs 46 (31.90%) from curiosity, followed by 33 (22.92%) stated the influence of friends, followed by 25 (17.36%) stated extra energy for work, then 20 (13.89%) stated they were for fun or entertainment, 12 (8.33%) stated they had emotional stress, 5 (3.47%) were sexual stimulation and 3(2.08%) stated staying up at night.

The first type of drug abused by respondents was Syabu or Ice at 58 (27.62%), followed by Methamphetamine was 40 (19.05%), Heroin is 37 (17.62%), Cannabis is 17 (8.10%), Morphine at 16 (7.62%), "Ketum " was 15 (7.14%) Cough medicine (Codeine) was 10 (4.76%), Erimin 5 was 9 (4.29%), Glue is 3 (1.43%), Ecstasy pills is 2 (0.95%), Amphetamine was 2 (0.95%), and the last one was Rohypnol was 1 (0.48%). The findings showed the total number of respondents and the involvement of respondents undergoing psychological tests related to drug rehabilitation before this. The majority of respondents who have never undergone a psychological test is a total of 87 (70.70%), compared to 36 (29.30%) for respondents who attended a psychological test.

### ***Interpersonal Conflict***

Table 1 shows the measure of suicidal ideation behaviour of interpersonal conflict component for the respondents' score who participated in this study. The score of "no" suicidal behaviour was a total of 27 (21.95%), while "low" score, a total of 63 (51.22%), 26 (21.14%) are "moderate", a total of 6 (4.88%) was "high", and as many as 1 (0.81%) of the respondents were at the "very high" level in interpersonal conflict. Thus, the majority of respondents faced the problem of interpersonal conflict in some differences as many as 27 (21.95%) respondents who do not have interpersonal conflict themselves.

Table 1: Number of Respondents Experiencing Interpersonal Conflict

Score	Frequency	Percentage
None	27	21.95
Low	63	51.22
Moderate	26	21.14
High	6	4.88
Very High	1	0.81
Total	123	100

### ***Emotional Disorders***

Table 2 depicts that the report of suicidal intent behaviour measures for the components found in the instrument, namely emotional disorder for the level of respondents 'score. The score of "none" is a total of 26 (21.14%) respondents who did not have emotional disorders. As for the "low" score, a total of 57(46.34%) respondents gave the result that they had a slight emotional disorder, a total of 31 (25.20%) respondents who had a "moderate" emotional disorder, a total of 8 (6.50%) were at the level of the score "high" and as many as 1 (0.81%) respondent was at a level of "very high" in emotional disorders.

Table 2: Number of Respondents Experiencing Emotional Disorder

Score	Frequency	Percentage
None	26	21.14
Low	57	46.34
Moderate	31	25.20
High	8	6.50
Very High	1	0.81
Total	123	100

### ***Depression***

Table 3 explains the report on the measurement of suicidal intent behaviour for the third component found in the SIBA instrument, namely depression. For the score "none", a total of 19 (15.45%) respondents did not have depression. As for the "low" score, a total of 58 (47.15%) respondents gave the result that they have some depression, a total of 35 (28.46%) respondents have "moderate" depression, a total of 10 (8.13%) were at the level of the score "high" and as many as 1 (0.81%) respondent was at a "very high" level in depression. Therefore, the majority of respondents suffer from depression except for 19 (15.45%) respondents who did not suffer from depression.

Table 3: Number of Respondents Experiencing Depression

Score	Frequency	Percentage
None	19	15.45
Low	58	47.15
Moderate	35	28.46
High	10	8.13
Very High	1	0.81
Total	123	100

### ***Hopelessness***

Table 4 describes the number of respondents experiencing Hopelessness. The score of "none" was a total of 46 (37.40%) respondents who did not have a problem of hopelessness. As for the "low" score, a total of 46 (37.40%) respondents gave a result of little hopelessness, a total of 22 (17.89%) respondents had "moderate" hopelessness, a total of 5 respondents (4.06%) were at the level score "high" and a total of 4 (0.35%) respondents were at a level of "very high" in hopelessness. Therefore, it shows that respondents had problems with hopelessness except for 46 (37.40%) respondents who had no problems with hopelessness.

Table 4: Number of Respondents Experiencing Hopelessness

Score	Frequency	Percentage
None	46	37.40
Low	46	37.40
Moderate	22	17.89
High	5	4.06
Very High	4	3.25
Total	123	100.00

### ***Level of Suicidal Ideation Behavioural Assessment of Respondent***

Table 5 shows that, the level of suicidal behaviour among drug addicts. There was a total of 26 (21.40%) respondents in the study are respondents who did not have suicidal behaviour among drug addicts. Next, a total of 26 (52.85%) respondents had a slight feeling of suicidal ideation behaviour. While there was a moderate level of suicidal behaviour that is a total of 27 (21.95%) respondents. There was also a total of 4 (3.25%) respondents who experienced high suicidal behaviour and one respondent who was at a very high level of suicidal behaviour.

Table 5: Level of Suicidal Ideation Behaviour Assessment of Respondent

Overall score	Score	Frequency	Descriptions
None	26	21.14	No Suicide Ideation Behaviour.
Low	65	52.85	Low suicide ideation behaviour
Moderate	27	21.95	Moderate suicide ideation behaviour
High	4	3.25	High suicide ideation behaviour
Very High	1	0.81	Very high suicide ideation behaviour
Total	123	100.00	

The main purpose of this study was to assess suicidal ideation behaviour among drug addicts in Malaysia. The results produced indicate that addicts are having significant suicidal ideation behaviours with the expectations of this study. Similar to previous studies by Vehbiu & Bodinaku (2014); Boduszek & Dhingra (2016) and Ugwuoke, (2016). The findings in the present study demonstrated that drug addicts have a higher tendency to display suicidal behaviour compared with the non-user population. However, previous studies have supported the relationship between drug addicts and suicidal ideation behaviour. According to Vehbiu and Bodinaku (2014), suicidal ideation behaviour among drug addicts is regarded as self-destructive behaviours and considered a slow suicide. In addition, the negative effects of drugs on individual behaviour can lead to suicidal ideation behaviour (Vehbiu & Bodinaku, 2014; Mitchell et al, 2019). In this study, it is noteworthy to state that only men participated, and previous studies have shown that men show higher rates of committing suicide, compared to suicidal attempts among women (Vehbiu & Bodinaku, 2014; NSDUH, 2018). However, this study's lack of women participants may have influenced these findings.

The study's results found that some experienced interpersonal conflict, emotional confusion, depression, and hopelessness. It contributed to the behaviour of suicidal ideation in the drug addicts in this study. This study found that a total of 26 drug addicts that is 21.14%, did not have suicidal ideation behaviour themselves. A total of 65 drug addicts, or 52.85%, showed some suicidal ideation behaviour in themselves. In addition, a total of 27 drug addicts out of 21.95 had moderate suicidal ideation behaviour. A total of 4 drug addicts that is 3.25%, showed high suicidal ideation behaviour, and one that is 0.81% addicts with very high suicidal ideation behaviour. In that regard, results show that a majority of respondents are at that level of low suicidal ideation behaviour followed by moderate, high, and very high levels. Therefore, drug addicts who are at low, medium, high, and high levels should be handed over to responsible parties and experts to assist drug addicts so that they are free from suicidal behaviour. In addition, suicidal ideation behaviour can be understood as an act of suicide or an attempt to inflict death on oneself, but it is not necessarily successful. At this stage, the addicts are likely to continue striving to achieve their desires until death, or they will retreat to living the next life normally (Statovci, 2012; Ibishi et al., 2013). Overall, this study proves that based on the results obtained related to the four components have successfully met the requirements of this study.

## CONCLUSION

Suicide is mental damage, a symptom, or a metaphor for societal decay and morals. It will continue to exist if society allows it if we do not change our attitudes towards the problem or continue to hide the suicidal ideation behaviour. It seems clear that for various reasons, including societal norms and values, the seriousness of suicidal

ideation behaviour remains a hidden social problem in Malaysia. However, the problem is one society cannot afford to ignore today. It should be brought out to the public so that people can directly and intently look at it and see its potential for devastation, morality, and dreadfulness which has always been there in the heart of society. Drug addicts who tend to have suicidal ideation behaviour may suffer from psychological trauma throughout their lives. They are likely to die if they do not receive appropriate help and healing for their traumas. There is a need to provide better support and care for drug addicts in stressful and difficult environments and for those who have problems that they are unable to handle. Perhaps if more effective social support and care can be extended to at-risk drug addicts, there will be fewer problems of suicide in Malaysia.

## REFERENCES

- Agensi Anti Dadah Kebangsaan. (2020). *Laporan Tahunan Agensi Anti Dadah Kebangsaan 2019*. Malaysia: Agensi Anti Dadah Kebangsaan. Bangi, Malaysia: AADK.
- Boduszek, D., & Dhingra, K. (2016). Construct Validity Of The Beck Hopelessness Scale (Bhs) Among University Students: A Multitrait–Multimethod Approach. *Psychological Assessment, 28*(10), 1325-1330.
- Bao, Y., Zhu, F., Hu, Y., & Cui, N. (2016). The Research of Interpersonal Conflict and Solution Strategies. *Psychology, 7*(4), 541-545.
- Brent, D. A. (1995). Risk Factors for Adolescent Suicide and Suicidal Behavior: Mental and Substance Abuse Disorders, Family Environmental Factors, and Life Stress. *Suicide Life Threat Behavior, 25*, 52–63.
- Creswell, J. W., & Plano Clark, V. L. (2011). *Designing and Conducting Mixed Methods Research* (2nd ed.). Thousand Oaks, CA: Sage.
- Conner, K., Bagge, C., Goldston, D., & Ilgen, M. (2014). Alcohol And Suicidal Behavior: What Is Known and What Can Be Done. *American Journal of Preventive Medicine, 47*(3), 204-208.
- Curtin, S. C., Warner, M., & Hedegaard, H. (2016). *Increase in suicide in the United States, 1999-2014* (No. 2016). US Department of Health and Human Services, Centers for Disease Control and Prevention, National Center for Health Statistics.
- Dwyer, S. T. O. (2013). Suicidal ideation and resilience in family carers of people 116 with dementia: A pilot qualitative study Abbreviated Title: Suicidal ideation in dementia carers Wendy Moyle Sierra Van Wyk Centre for Health Practice. *Innovation Griffith University Suicidal, 17*(6), 753–760.
- Hesse, M., Thylstrup, B., & Seid, A. K. (2020). Suicide among people treated for drug use disorders: A Danish national record-linkage study. *BMC Public Health, 20*(1), 1-9.
- Ibishi, N., Kola, V., Ramiqi, V., Musliu, N. (2013). Risk and suicide behavior of hospitalized offenders in the forensic setting clinic of psychiatry -in Kosova (Abstracts of the 21<sup>st</sup> European Congress of Psychiatry). *European Psychiatry, 26*, 1832.
- Inman, D., van Bakergem, K., LaRosa, A., & Carr, D. (2011). Evidence-based health promotion programs for school and communities. *American Journal of Preventive Medicine, 40*(2), 207-219.



- Klonsky, E. D., May, A. M., & Saffer, B. Y. (2016). Suicide, suicide attempts, and suicidal ideation". *Annual Review of Clinical Psychology*, 12(14), 14-24.
- Lesage, A. D., Boyer, R., Grunberg, F., Vanier, C., Morissette, R., Ménard-Buteau, C., & Loyer, M. (1994). Suicide and mental disorders: a case-control study of young men. *The American journal of psychiatry*.
- Lliceto, E., & Fino, E. (2015). Beck Hopelessness Scale (BHS). A Second-Order Confirmatory Factor Analysis. *European Journal of Psychological Assessment*, 31(1), 31-37.
- Maniam Thambu (2010). *Hidup atau Mati: Masalah Bunuh Diri di Malaysia dari Perspektif Psikiatri*. Bangi, Malaysia: Penerbit UKM.
- Mitchell, K. J., Turner, H. A., & Jones, L. M. (2019). Youth exposure to suicide attempts: relative impact on personal trauma symptoms. *American Journal of Preventive Medicine*, 56(1), 109-115.
- Moscicki, E. K. (2001) Epidemiology of Completed and Attempted Suicide: Toward a Framework for Prevention. *Clinical Neuroscience Research*, 1(5), 310-323.
- National Survey of Drug Use and Health. (2018). *The NSDUH Report: Suicidal Thoughts and Behaviours Among Adults*. Rockville, MD: Substance Abuse and Mental Health Services Administration.
- Norshahira, O. Norashida, S. R. & Lukman, Z. M. (2021). Keabsahan dan Kebolehpercayaan Instrumen Psikometrik Ujian Tingkah Laku Hasrat Bunuh Diri. *Malaysian Journal of Social Sciences and Humanities (MJSSH)*, 6(9), 117-128.
- Norshahira, O, Norashida S. R, & Lukman Z. M. (2020). Validity and reliability test for suicidal ideation behaviour instrument for drug addicts. *International Journal of Research and Innovation in Social Science*, 4(9), 548-553.
- O'Connor, R. C. & Nock, M. K. (2014). The psychology of suicidal behaviour. *Lancet Psychiatry*, 1(1), 73-85.
- Oquendo, M. A., & Baca-Garcia, E. (2014). Suicidal behavior disorder as a diagnostic entity in the DSM-5 classification system: Advantages outweigh limitations. *MWorld Psychiatry*, 3(2), 128-130.
- Pompili, M., Serafini G., Innamorati M., Biondi M., Siracusano A. & Di Giannantonio M. (2012). "Substance abuse and suicide risk among adolescents". *European Archives of Psychiatry and Clinical Neuroscience*, 262, 469-485.
- Sparks, K. J. (2017). *Encyclopedia Britannica 2017: Book of the year*.
- Statovci, S. (2012). The relationship of anxiety, depression, and hopelessness with suicidal ideation and behavior among youth (abstracts of the 20th European Congress of Psychiatry). *European Psychiatry*, 27(1), 1-1.
- Stoyanova, S. Y. (2014). Depression—Factors, symptoms, prevention and the role of open journal of depression. *Open Journal of Depression*, 3(01), 3-4.
- Taylor, J. (2018). *Illegal Drug Use, Suicidal Ideation, and Attempted Suicide among New York Adolescents* (Doctoral dissertation, Walden University).
- Ugwuoke, A. C. (2016). Precipitants of suicide among secondary school students in Nigeria. *Bassery Andah Journal*, 9(2), 147-156.

- United Nations Office on Drugs and Crime. (2014). *World Drug Report*. Vienna, Austria: United Nations Office on Drugs and Crime.
- Van Orden, K. A., Witte, T. K., Cukrowicz, K. C., Braithwaite, S. R., Selby, E. A., & Joiner, T. E. (2010). The interpersonal theory of suicide. *Psychological Review*, *117*(2), 575-600.
- Vehbiu, B., & Bodinaku, B. (2014). Prevalence of suicidal behavior among male drug users in Kosovo. *Procedia-social and behavioral sciences*, *159*, 375-380.
- Vijayakumar, L., Kumar, M. S., & Vijayakumar, V. (2011). Substance use and suicide. *Curr Opin Psychiatry*, *24*(3), 197-202.
- Wong, S.S., Zhou, B., Goebert, D., & Hishinuma, E.S., (2013). The risk of adolescent suicide across patterns of drug use: a nationally representative study of high school students in the United States from 1999 to 2009. *Social Psychiatry and Psychiatric Epidemiology*, *48*, 1611–1620.
- World Health Organization (2018). *Suicide In The World: Global Health Estimates*. Geneva, Switzerland: WHO.