

# EXPLORING THE ASSOCIATION OF MEANING IN LIFE WITH PSYCHOLOGICAL DISTRESS IN MALE PATIENTS WITH SUBSTANCE USE DISORDER IN PAKISTAN

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## ABSTRACT

### OBJECTIVE

Substance use is a public health issue globally. In Pakistan, problems related to substance use are a growing health concern. People with SUD are facing a toll of consequences such as; mental health, social legal as well as financial. The present study aims to determine the association of Meaning in Life (i.e., Search & Presence) with depression, anxiety and stress among male patients receiving treatment for their Substance Use Disorder (SUD).

### STUDY DESIGN

Cross-sectional study

### PLACE AND DURATION OF STUDY

The present study was conducted in Karachi, Pakistan, from March-June, 2018.

### SUBJECTS AND METHOD

200 Muslim male patients with SUD, age ranging from 18 to 45 years (Mean=18; SD=6.55) were recruited from different rehabilitation and treatment centers located in different parts of Karachi, Pakistan, using a purposive sampling technique. The following measures were used in the present study these includes; Personal Information Form, Meaning in Life Questionnaire (MLQ) and Depression Anxiety and Stress Scale (DASS).

### RESULTS

Revealed that there is a highly significant association between meaning in life (i.e., Search and Presence) and psychological distress, i.e. depression (adj  $R^2=.988$ ,  $F(2, 198) = 8278.46$ ,  $p < .0001$ ; anxiety (adj  $R^2=.943$ ,  $F(2, 198) = 1659.82$ ,  $p < .0001$ ); stress (adj  $R^2=.982$ ,  $F(2, 198) = 5390.78$ ,  $p < .0001$ ).

### CONCLUSION

Based on the above mentioned result it can be concluded that meaning in life has a significant contribution in psychological distress of male patients with SUD. Adding these important variables in treatment of male patients with SUD would help clinicians in treating these people to reduce the risk of psychological distress and improve psychological wellbeing. Further, finding and implications are discussed in detail.

### KEYWORDS

Meaning in life, Depression, Anxiety, Stress, Substance use disorder

## INTRODUCTION

In Pakistan, substance use is a growing health concern for health professionals. A study<sup>1</sup> discussed that people with SUD (substance use disorder) are facing a multitude of problems (i.e., social, economic &, psychological). Other researchers conducted a study on patients using drugs via injection and discussed that these people are facing stigma due to their nature of the problem and it has a negative psychological impact on their lives. They further explained that to the fear of rejection from other people, they try to cope with it by isolating themselves, which leads to other psychological problems such as depression.<sup>2</sup> According to Ali and Shahzad<sup>3</sup>, a number of factors contribute to the mental health of individuals with SUD; they mentioned about both risk and protective factors in wellbeing. Risk factors can enhance the possibility of mental health issues. One of the important factors is the meaning in life which is associated with wellbeing in patients with SUD.

Meaning in life is a basic concept in psychology, which has its own place in existential psychology. According to Reker and Wong,<sup>4</sup> it is "the cognizance of order, coherence, and purpose in one's existence, the pursuit and attainment of goals, and an accompanying sense of fulfillment." Later researchers<sup>5</sup> explained it as "making sense, order and reason for one's existence, having a purpose and meaning striving towards goals." Researchers have identified the significant role of meaning in life for transformation from one stage of life to another, for example moving from the phase of adolescence to adulthood, and other phase of life such as success in life and self-acceptance.<sup>5</sup>

Scholars have identified and explained the significance of meaning in a person's life and how it affects mental health. Researchers found a significant positive linkage of meaning in life with mental health.<sup>6</sup> A study<sup>5</sup> found that searching for meaning in life is an important buffering factor against emotional problems and has a positive contribution to mental wellbeing. Researchers further found that hope, faith, love and happiness have negative linkage with depression and anxiety and drugs and alcohol use.<sup>7</sup> Other researchers have also found that meaning in life is linked to an individual's happiness; furthermore, it plays a pivotal role in managing negative life experiences, including traumatic ones.<sup>8</sup> Meaning in life serves as key in developing hope in the face of despair. Another study<sup>9</sup> found that individuals experience deep peace even if they are experiencing mental distress. Other researchers have found that less meaning in life is linked to psychological conditions such as depression, stress and suicidal ideations in patients with SUD.<sup>10</sup> Other studies found similar findings; researchers found that individuals having short of meaning in life and religious orientation are prone to emotional problems (i.e., depression & anxiety).<sup>11,12</sup>



Substance use is most common among the psychiatric disorders, which increase burden on society.<sup>13</sup> Individuals with SUD face a toll of issues due to their drug use: They are unable to get access to services because of fear of being labeled for taking substances; this may increase the risk of mental distress. Research identified that positive health outcomes are also linked to an individual's spiritual life. In a research reviewed by Gartner<sup>14</sup> on religiosity and spirituality, researchers found a significant linkage of spirituality with relationship satisfaction, well-being, and overall psychological functioning. Researchers also found that the higher level of an individual's moral striving, the higher the level of purpose and meaning in life.<sup>15</sup> Other researchers conducted to see the association of spirituality with psychological health found a sturdy relationship between the variables.<sup>16</sup>

There is robust evidence on the association of meaning in life with positive mental health. However, in Pakistan, there is a dearth of empirical evidence in patients suffering from psychiatric problems disorder in general, and specifically in patients with SUD. Understanding the concept of meaning and purpose in life and making connections with psychological wellbeing in patients is of great value. So, the present study examines the predictive association of presence, and search for meaning in life with psychological distress, in people with SUD in Pakistan. As mentioned above, there is a dearth of studies on linking the meaning in life with psychological distress and this study would be helpful in adding literature in the context of SUD in the local context. This study will further help show how these variables can be used to build a buffer against psychological distress and improve the wellbeing of patients with SUD.

## SUBJECTS AND METHOD

### Sample

The sample of the present study consisted of 200 participants. Participants' minimum age was 18 and maximum age was 45 years (Mean = 28.14, SD = 6.55). Only those patients who meet the prerequisite criteria, i.e., diagnostic criteria of SUD given in DSM-5<sup>17</sup> were included in this study. All participants were recruited from different residential facilities who were offering treatment for SUD (i.e., Addicare Center, Parvarish Recovery Center, AAS Treatment Center, & New Horizon Care Center) located in Karachi, Pakistan.

### Measures

#### a) Consent Form

This Form consisted of items including aims and objectives of present research, invitation to participate in this research on a voluntary basis. Other items included in this section were confidentiality and privacy, anonymity, risk and benefits to partake in the present study, etc.

#### b) Personal Information Form

This section comprised participants' personal, family, and information related to their substance use. These include participant's age, gender, education, family structure, family members, family income and number of earning members, primary choice of drugs used with other drugs, history of drug use, lapse and relapse if any, any co-morbid mental or medical problem, and etc.

#### c) Meaning in Life Questionnaire

This tool consists of 10 items, with a response format of seven (7) options ranging from absolutely Untrue to Absolutely True, where 1 = Absolutely Untrue, and 7 = Absolutely True. It has two subscales, i.e., Presence of Meaning, and Search for Meaning. Each subscale can be scored independently. Sample items of presence of meaning includes; "I understand my life's meaning", "I am always looking to find my life's purpose", and "I am always searching for something that makes my life feel significant." In a recent study conducted by Shahzad and colleagues found the reliability of the Urdu version of MLQ. Researcher found the Cronbach's alpha for the MLQ (Cronbach's alpha = .80), with sub-scales of MLQ-S (Cronbach's alpha = .89), and MLQ-P (Cronbach's alpha = .90), and test retest reliability of subscale of MLQ-S is  $r = .94$ , and for MLQ-P, it is  $r = .97$ , which is high. This is relatively better than the original study conducted by Steger and colleagues. The original scale has good internal consistency with the Cronbach's alpha of the MLQ-P subscale varying between 0.82 and 0.86 and for the MLQ-S subscale between 0.86 and 0.871.<sup>8</sup>

#### d) Depression Anxiety and Stress Scale (DASS-21)

The DASS-21 is a self-report tool comprised 21 of items, developed by Lovibond and Lovibond.<sup>19</sup> This tool has three subscales (i.e., Depression, Anxiety, & Stress). The response format of this is from "Not at All (0) to "All the Time" (3). Few of the sample items are "I was unable to become enthusiastic about anything", "I found it difficult to work up the initiative to do thing", "I found it hard to wind down", and "I was aware of the action of my heart in the absence of physical exertion" (e.g. sense of heart rate increase, heart missing a beat). The score can range from zero (0) to 126. Reliability of the Urdu version of DASS-21 inferred by Cronbach's alpha and test retest reliability. Shahzad and associates found the psychometric properties of the Urdu version of this scale found to be good. The Cronbach's alpha for the DASS-21 (Cronbach's alpha = .94), with sub-scales of Depression (Cronbach's alpha = .85), Anxiety (Cronbach's alpha = .90), and Stress (Cronbach's alpha = .84), and test retest reliability of this translated version is ( $r = .93$ ) is good.

### Procedure

The present study was approved by the Departmental Ethical Committee. Samples of present study were approached after fulfilling all the legal and ethical requirements from different treatment and rehabilitation centers situated in different areas of Karachi, Pakistan. After obtaining permission from the concerned authorities of treatment and rehabilitation centers/hospitals for SUD, each participant was approached and took consent to participate in this study. Only those participants were recruited who met the pre-requisite criteria to participate in this study and then informed consent was obtained. After signing the informed consent form, researchers then discussed the aims and objectives of the present research and were assured that the data would purely be used for the present study and their personal information will not be disclosed to anyone. Once researchers established rapport with participants, then they were asked to fill the Personal Information Form, then Meaning in Life (MLQ), and Depression, Anxiety, and Stress Scale (DASS). After collecting the data, all participants were thanked for their support and giving their time to participate in this study.



**Statistical Analysis**

Descriptive statistics, such as frequency and percentage, were used to identify demographic characteristics with SUD. Further, mean and standard deviation were also used to carry out other significant factors which were related to SUD. To analyse data, multiple linear regression models for statistics were applied using SPSS Version 22.

**RESULTS**

The participants' ages were between 18-45 years (Mean age=28.14, SD=6.55), minimum education of 0 and maximum level of education was 16 grade (Mean education=8). Monthly income of the family was between PKR 7000-50000 (Mean=88100), and the average daily expenses to buy drugs was PKR 1149. The minimum age of first-time drug use was 8 years and the maximum age was 41 years (Mean=18.78).

**Table 1**  
Descriptive statistics of variables (i.e., presence of meaning, search for meaning, depression, anxiety, stress and DASS Total (N=200)).

	N	Min	Max	Mean	SD
Search	200	5.00	34.00	15.2800	9.21009
Presence	200	-2.00	34.00	14.4600	10.79682
Depression	200	.00	21.00	12.6250	6.44376
Anxiety	200	.00	19.00	7.2250	4.97576
Stress	200	1.00	21.00	12.9750	5.51420
DASS Total	200	2.00	59.00	32.8250	15.59875

Table 1 shows the summary of descriptive statistics of measures used in this study.

**Table 2**  
Multiple regression analysis for investigate predictive relationship meaning in life (presence & search) with Depression

Model	Unstandardised		Coefficients		Standardised coefficients	
	B	Std. Error	Beta	T	Sig.	
(Constant)	24.069	.119		20.191	.000	
Presence	-.269	.022	-.356	-12.387	.000	
Search	-.452	.020	-.647	-22.490	.000	

Note: a. Dependent Variable: Depression  
b. Predictors: (Constant), Presence of meaning, Search for meaning

**Table 3**  
Multiple regression analysis to investigate predictive relationship meaning in life (presence & search) with anxiety

Model	Unstandardised		Coefficients		Standardised coefficients	
	B	Std. Error	Beta	T	Sig.	
(Constant)	17.361	.201		86.530	.000	
Presence	-.891	.037	-.1527	-24.332	.000	
Search	.319	.034	-.590	9.401	.000	

Note: a. Dependent Variable: Anxiety  
b. Predictors: (Constant), Presence of meaning, Search for meaning

**Table 4**  
Multiple regression analysis to investigate predictive relationship meaning in life (presence & search) with stress

Model	Unstandardised		Coefficients		Standardised coefficients	
	B	Std. Error	Beta	T	Sig.	
(Constant)	22.568	.126		179335	.000	
Presence	-.171	.023	-.264	-7446	.000	
Search	-.439	.021	-.734	-20.662	.000	

Note: a. Dependent Variable: Stress  
b. Predictors: (Constant), Presence of meaning, Search for meaning

**DISCUSSION**

Findings of the current study revealed that meaning in life is a significant predictor of psychological distress in patients receiving treatment for SUD. The findings show a negative predictive relationship of meaning in life (i.e., presence & search) with depression (adj R<sup>2</sup>=.988, F (2, 198) =8278.46, p < .0001); anxiety (adj R<sup>2</sup>=.943, F (2, 198) =1659.82, p < .0001); stress (adj R<sup>2</sup>=.982, F (2, 198) =5390.78, p < .0001). These findings are consistent with the study findings of other researchers<sup>20</sup> who found that the higher the level of meaning in life, the high the level of psychological well-being. They further found that it can enhance individuals' social functioning, and reduce the risk of mental health issues such as anxiety and sleep related issues. Other researchers<sup>21</sup> have similar findings, in which they found that low levels of meaning in life can increase the financial burden, which further leads to impairment in social activities, and increases the risk of unhealthy behaviours, like aggression and the use of drugs.<sup>22</sup>

Further, the results indicate that the variable of “presence of meaning” is significantly negatively associated with the variable of anxiety. These findings are in line with other researchers conducted previously. Researchers found that “presence of meaning in life” is linked with well-being,<sup>23</sup> and positive thinking.<sup>24</sup> Individuals with greater presence of meaning will have a positive contribution in reducing the mental conditions, such as anxiety and other uncertain feelings, to the situations in people with SUD. Patients receiving treatment for their SUD with care were in residential facilities were thinking positively about their treatment outcomes and they were looking forward to getting rid of SUD and will be able to reintegrate with their family and community. After the first phase of treatment (detoxification), during the psychosocial rehabilitation phase they were in abstinence where they wanted to make amends which were negatively affected by their drug use. Thinking about making amends and bringing positive change in their attitude and behavior is a positive way forward, which is an arduous job but this is possible to work on their abstinence and sustaining recovery. While they are working on their own attitude and behaviors, it requires lots of effort, but this can positively contribute in moving forward and to improve their wellbeing.



Findings of present study i.e., which investigated the predictive relationship of meaning in life with stress are also supported by the studies conducted previously by other researchers<sup>25</sup> who found that higher-level meaning in life reduces the risk of stress related issues. So, the lower the level of presence in meaning in life can increase the risk of stress in people receiving treatment for their SUD. These drugs can have a negative impact on individuals' thought process, perception and emotions. Individuals' negative thinking patterns about him/herself, others and environment can negatively affect them to cope with the stressors in their lives. In addition to this, there may be other possible reasons too for the present findings, these includes, individuals with presence of meaning in life may have capacity to handle difficult situation, as they might think there are stressors in life, so the best way to overcome those obstacles is to think rationally about the problem and to deal appropriately with it.

Another important point is that the presence of meaning can inculcate hopefulness and this way they do not stop in handling the difficult situations. On the one hand, individuals without presence of meaning in life might have feelings of hopelessness, and this can lead to depression. Individuals with SUD have problems that they do not look forward positively, and this could be due to the negative experience they have in their lives, experiences with their family members, peers and other people around them, and can negatively affect their meaning in life and as a result they develop mental health issues. Other researchers<sup>26</sup> also found similar findings that individuals with higher levels of meaning in life appear to have higher levels of happiness, fulfillment, optimism, and lower levels of depressive symptoms.

By summarising the results, we can say that meaningfulness is one of the important factors which serve as a buffer against psychological distress in people with SUD. Helping individuals to their presence and search for meaning in life will have a positive impact on their wellbeing. There is a lack of scientific evidence in Pakistan on this topic with reference to patients with SUD. So, this study will serve as a base for the future research on meaning in life and other variables to improve the wellbeing of people with SUD.

This study would be a valuable addition to literature when addressing the issues of patients with SUD contextually, but like other studies, this study has also some limitations which should be addressed in future research. These include the small sample size and inclusion of only male participants, this can restrict use in generalizing findings to all patients with SUD. In future studies, other studies may consider adding sample size and female participants and investigate the similarities and differences among both groups with reference to meaning in life and psychological distress. This may help clinicians to design appropriate interventions to address gender-specific issues.

## CONCLUSION

We conclude that people with SUD disorder face numerous issues which are related to individual level, family, and community as well as system level. Importantly, these issues are directly related to their nature of the problem (i.e., SUD). Substance use is a complex problem, and understanding this complex issue is not an easy job. This chronic and relapsing problem comes in the way of people to improve their wellbeing. One of the areas which need to work on is the presence and search for meaning in life, which is weak for patients with SUD. By facilitating in improving their meaning and purpose in life may be an important tool to reduce the risk of psychological distress (i.e., depression, anxiety & stress).

## REFERENCES

1. Shahzad S, Begum N, Malik S. (2014). Multi-dimensional perceived social support as determinant of wellbeing in people with substance use disorder. *International Journal of Prevention and Treatment of Substance Use Disorders*. 1(2), 63-70.
2. Saif SB, Shahzad S. Urdu translation and adaptation of the HIV stigma scale in Pakistani injectable drug users with HIV. *J Pak Med Assoc*. 2020;70(3):505-510. doi:10.5455/JPMA.19937
3. Ali M, Shahzad S. Risk and protective factors for mental health problems in patients with substance use disorder. *Pak J Psychol*. (2020) 50:55–69. Retrieved from: <http://www.pjpk.com/index.php/pjp/article/view/24>
4. Reker GT, & Wong PTP. Aging as an individual process: Toward a theory of personal meaning. In J. E. Birren & V. L. Bengtson (Eds.), *Emergent theories of aging* (pp. 214–246). Springer 1998
5. Rathi N, & Rastogi R. Meaning in life and psychological well-being in pre-adolescents and adolescents. *Journal of the Indian Academy of Applied Psychology*. 2007 33(1), 31-38.
6. Emmons RA, Paloutzian RF. The psychology of religion. *Annu Rev Psychol*. 2003; 54: 377-402. doi:10.1146/annurev.psych.54.101601.145024
7. Schulenberg SE, Schnitzer LW, Buchanan EM. The purpose in life test-short form: Development and psychometric support. *Journal of Happiness Studies*. 2011;12(5):861–876. doi: 10.1007/s10902-010-9231-9.
8. Diener E, Lucas RE, Oishi S. Subjective well-being: The science of happiness and life satisfaction. In *The Oxford Handbook of Positive Psychology*; Snyder, C.R., Lopez, S.J., Eds.; Oxford University Press: Oxford, UK, 2002; pp. 463–473.
9. Underwood LG, Teresi JA. The daily spiritual experience scale: development, theoretical description, reliability, exploratory factor analysis, and preliminary construct validity using health-related data. *Ann Behav Med*. 2002;24(1):22-33. doi:10.1207/S15324796ABM2401\_04
10. Harlow LL, Newcomb MD, Bentler PM. Depression, self-derogation, substance use, and suicide ideation: lack of purpose in life as a mediational factor. *J Clin Psychol*. 1986; 42(1): 5-21. doi: 10.1002/1097-4679(198601)42:1<5::aid-jclp2270420102>3.0.co;2-9



11. Azad N, Gondal M, Abbas N. Frequency of depression and anxiety in patients attending a rheumatology clinic. *J Coll Physicians Surg Pak.* 2008;18(9):569-573.
12. Morris KC. Psychological distress in carers of head injured individuals: the provision of written information. *Brain Inj.* 2001;15(3):239-254. doi:10.1080/02699050010004068
13. French MT, Dunlap LJ, Zarkin GA, McGeary KA, McLellan AT. A structured instrument for estimating the economic cost of drug abuse treatment. The Drug Abuse Treatment Cost Analysis Program (DATCAP). *J Subst Abuse Treat.* 1997;14(5):445-455. doi:10.1016/s0740-5472(97)00132-3
14. Gartner J. Religious commitment, mental health, and prosocial behavior: A review of the empirical literature. In Shafranske E.P. (Ed.), *Religion and the clinical practice of psychology.* Washington, DC: American Psychological Association., 1996, pp. 187–214.
15. Joshi S, Kumari S, & Jain M. Religious belief and its relation to psychological well-being. *J Indian Acad Appl Psychol.* 2008; 34(2), 345-354.
16. Oman D, & Thoresen, CE. Do Religion and Spirituality Influence Health? In R. F. Paloutzian & C. L. Park (Eds.), *Handbook of the Psychology of Religion and Spirituality* New York: Guilford. 2005 pp. 435-459.
17. American Psychiatric Association D, American Psychiatric Association. *Diagnostic and statistical manual of mental disorders: DSM-5.* Washington, DC: American psychiatric association; 2013 May 22.
18. Steger MF, Frazier P, Oishi S & Kaler M. The meaning in life questionnaire: Assessing the presence of and search for meaning in life. *Journal of Counseling Psychology.* 2006; 53(1), 80–93. <https://doi.org/10.1037/0022-0167.53.1.80>
19. Lovibond SH, Lovibond PF. *Manual for the depression anxiety stress scales.* 2nd ed. Sydney: Psychology Foundation; 1995
20. Demirbaş-Çelik N, Keklik İ. Personality factors and meaning in life: The mediating role of competence, relatedness and autonomy. *Journal of Happiness Studies.* 2019; 20(4), 995-1013.
21. Melton AM, & Schulenberg SE. On the measurement of meaning: Logotherapy's empirical contributions to humanistic psychology. *The Humanistic Psychologist.* 2008; 36(1), 31-44.
22. Santrock JW. *Adolescence.* New York: McGraw-Hill; 2003

23. De Klerk BM, Schiphof D, Groeneveld FP, et al. No clear association between female hormonal aspects and osteoarthritis of the hand, hip and knee: a systematic review. *Rheumatology (Oxford).* 2009;48(9):1160-1165. doi:10.1093/rheumatology/kep194
24. Zika S, Chamberlain K. On the relation between meaning in life and psychological well-being. *Br J Psychol.* 1992;83 ( Pt 1):133-145. doi:10.1111/j.2044-8295.1992.tb02429.x
25. Halama P. & Bakosova K. (2009). Meaning in life as a moderator of the relationship between perceived stress and coping. *Studia Psychologica.* 2009; 51(3), 143.
26. Shao J, Zhang L, Ren Y, Xiao L, Zhang Q. Parent-Child Cohesion, Basic Psychological Needs Satisfaction, and Emotional Adaptation in Left-Behind Children in China: An Indirect Effects Model. *Front Psychol.* 2018;9:1023. doi:10.3389/fpsyg.2018.01023

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