

# **Self Esteem, Depression and Life Satisfaction among HIV out Patients Receiving Highly Active Anti Retroviral Therapy In A Nigerian Teaching Hospital**

## **Abstract:**

**Aim:** The aim of this study is to investigate self esteem, depression and life satisfaction in a sample of HIV patients receiving highly active anti retroviral therapy (HAART) attending a Nigerian tertiary health institution.

**Study design:** The descriptive cross sectional study design was used for the study.

**Place and duration of the study:** The study was carried out at the HIV/AIDS clinic of the university of Nigeria teaching hospital Enugu in south east Nigeria between the months of January and February 2023.

**Methodology:** A total of 480 HIV/AIDS positive patients on HAARTS aged between 23 to 61 years attending the HIV/AIDS clinic of the University of Nigeria Teaching hospital Enugu who consented to participate in the study were assessed for self esteem, life satisfaction and depression with the Rosenberg self esteem scale, the life satisfaction scale by Diener and the Beck's depression inventory version two.

**Results:** Results revealed that 53.7% of the HIV patients on HAART manifested no signs of depression; 63.8% had high self esteem and 73.1% were satisfied with their lives; however

25.2%; 15.8% and 5.5% showed signs of mild, moderate and severe depression respectively; 36.2% had low self esteem, whereas 26.9% indicated not being satisfied with their lives.

**Conclusion:** Following the benefits of HAARTS on the management of HIV/AIDS patients as noticed in the study, there is need for health workers to ensure strict adherence on HAART regimen for optimum suppression of HIV as recommended by The World Health Organization; furthermore, there is need to ensure continuous provision of psychological support to all HIV/AIDS patients as a way of reducing the psychosocial sequelae associated with HIV/AIDS.

**Key words:** HIV/AIDS, Highly active anti-retroviral therapy, Self esteem, Depression, Life satisfaction, psychosocial conditions.

## 1. INTRODUCTION

According to UNAIDS and the National Agency for control of AIDS in Nigeria (NACA) as at March 2019, the national prevalence of HIV in Nigeria is 1.4% among adults aged 15–49 years, whereas previous estimates had put the national prevalence at 2.8%. Furthermore UNAIDS and NACA said that there is an estimated 1.9 million people currently living with HIV in Nigeria. Arguing further, the report pointed out that more women than men within the same age bracket of 15-49 years are more likely to be living with HIV [1].

The report further indicated that access on treatment of people living with HIV has progressively increased in Nigeria especially following the introduction of the 'test and treat' policy in 2016.

This policy equally improved accelerated referrals to treatment facilities for people who test positive for the virus.

The groups mostly affected by HIV infection are mainly sex workers, gay men and injecting drug users [2; 3].

Some of the psychosocial impacts of HIV are denial of employment; stigmatization and divorce [4, 5]. The WHO [6] had earlier observed that HIV/AIDS caused numerous deaths and disabilities in most low and middle income countries. This world global body further revealed that mental health and

HIV/AIDS are closely connected because according to them mental health problems, including substance-use disorders, are linked with increased risk of HIV infection, and AIDS interfere with the treatment of mental health problems, while some mental health problems arise as a direct result of HIV infection. Equally they reported the presence of intense psychological burden on people with HIV such as depression and anxiety as they adjust to the impact of the diagnosis of HIV/AIDS as a life threatening illness.

According to Julie and Shivaraj [7] highly active antiretroviral therapy (HAART) is a treatment protocol in which three or more antiretroviral drugs are combined with the aim of inhibiting viral replication; and has been reported to lead to improved patient outcomes.

This approach is central to optimizing patient care, as studies have demonstrated that provider-experience positively correlates with improved patient outcomes [8,9,10].

According to WHO [6] to ensure the continuous suppression of HIV there is need to adhere strictly to the highly active antiretroviral therapy regimen. They said that adherence of less than 95% is associated with development of viral resistance and that drug-resistant viruses can be transmitted to other people, thereby limiting their treatment options.

Self-esteem refers to the degree of consideration or respect an individual has for oneself and a way to measure the values attributed to his/her own judgments and capabilities. It is related to the concept of oneself and influenced by the way he or she is seen by loved ones.

Blascovich and Tomaka [11] argued that Self esteem is the degree of self approval a person has about him or herself. Furthermore, Hewitt [12] said that people with low self esteem usually pay attention to negative life events as against those with high self esteem.

Depression is an emotional problem in which a person experiences deep, unshakable sadness and diminished interest in nearly all past pleasurable activities or past times.

The American Psychiatric Association [13] pointed out the signs of depression to include deep sorrow or grief, insomnia, loss of appetite, unpleasant mood, hopelessness, irritability, self dislike and suicidal tendencies. Gelder and Mayou [14] posited that risk factor of depression are female gender, unemployment, divorce, chronic medical illness and stressful life events.

Variations in the prevalence of depression among people living with HIV/AIDS have been

reported [15]. Low self esteem positively correlated with depressive symptoms across gender and age groups, and among diverse populations living with HIV [16, 17]; whereas high self esteem was reported to predict low levels of depression [18].

HIV positive individuals apparently experience low self esteem due to rejection, problems of social identity and other physical conditions associated with HIV [19].

Beutell et al. [20] posited that life satisfaction is a multifaceted concept that includes things like friendships, hobbies, general health, income, living conditions, family life and partnership.

Life satisfaction has been reported to correlate significantly with variables like good interpersonal relationships, better physical and mental health, good job, positive life events, and high income [21, 22].

Heckman et al. [23] looked at the psychosocial predictors of general life satisfaction in a community sample of 275 persons living with HIV/AIDS in a large Midwestern state and reported that improved physical/functional well-being, increased social support, more frequent use of active coping strategies, and fewer incidents of AIDS-related discrimination and stigma predicted higher levels of general life satisfaction.

Sevgi et al [24] revealed that self-reported life satisfaction was strongly associated with concurrent depressive symptoms, hope and anxiety. In their study on Depression and thoughts of suicide among middle-aged and older persons living with HIV-AIDS, Kalichman et al. [25]

reported that their subjects who thought about suicide reported greater levels of emotional distress and poorer health-related quality of life than those who had not considered suicide.

They concluded that Persons who are in midlife and older and are living with HIV-AIDS experience significant emotional distress and thoughts of suicide, suggesting a need for targeted interventions to improve mental health and prevent suicide.

In their study on Psychosocial differences between urban and rural people living with HIV/AIDS, Heckman et al. [26], measured quality of life, perceptions of loneliness, social support, experiences with AIDS-related discrimination, access to services, and illness-related coping strategies in a sample of 276 people living with HIV/AIDS. They argued that Compared with their urban counterparts, rural people with HIV reported a significantly lower satisfaction with life, lower perceptions of social support from family members and friends, reduced access to medical and mental health care and elevated levels of loneliness among other symptoms.

Given the paucity of data on this subject matter within the study area, the aim of the present study is to investigate self esteem, depression and life satisfaction in a sample of HIV patients receiving highly active anti retroviral therapy (HAART) attending a Nigerian tertiary health institution. The following hypotheses guided the study: (1) there will be no significant difference between self esteem, depression and life satisfaction among HIV/AIDS patients on HAART; (2) there will be no significant gender difference between self esteem, depression and life

satisfaction among HIV/AIDS patients on HAART. (3) HIV/AIDS patients on HAART will not manifest low self esteem, depression and low life satisfaction.

## **2. MATERIALS AND METHOD**

**2.1. Study location:** The study was conducted at the HIV/AIDS clinic of university of Nigeria teaching hospital Enugu in south east Nigeria. Enugu is a mainland state and occupies an area of about 7,161 square kilometers and has a population of about 5,590,513. Due to the abundance of coal deposits, Enugu is also referred to as the coal city state. The university of Nigeria teaching hospital is the largest tertiary health institution in the state; while the HIV/AIDS clinic of the hospital receives and treats patients from across the state and other parts of the south east of Nigeria, with an average daily clinic attendance of 400 patients. This study adopted the cross sectional descriptive method and was conducted in Enugu, south east Nigeria between the months of January and February 2023.

**2.2. Subjects:** A total of 480 HIV/AIDS positive patients on HAARTS attending the HIV/AIDS clinic of the University of Nigeria Teaching hospital Enugu were randomly recruited and served as the subjects for the study. Patients with HIV positive diagnosis and screened by ELISA and confirmed by western blot technique; have been on HAART for about five months; aged 23-61 years and gave their consent to participate were included in the study. On the other hand patients who are too ill to participate, those outside the age range, those who decline consent and those with previous DSM IV axis I diagnosis of depression were excluded. The Ethics committee of

the University of Nigeria teaching hospital gave approval to conduct this study. All the subjects who met the inclusion criteria were invited to participate in the study. After explaining the purpose and procedure of the study and assuring them that their responses will be treated with confidence, they were also assured that non participation will not prevent them from receiving their usual clinical attention. All the subjects agreed and signed the consent form, and responded fully to the instruments of data collection, thereby given a hundred percent response rate.

**2.2.1. Data collection and instruments:** Data for the study was collected by the authors between the months of January and February 20223. The following instruments were used for data collection: (1) a socio demographic questionnaire containing information bothering on age, sex, occupation, educational status, religion and marital status. (2) The Rosenberg Self Esteem scale [27] was used to assess self esteem. It is a ten-item measure that is scored on a 4-point Likert type response format starting from 1=strongly disagree to 4= strongly agree. Total obtainable score ranged from 10-40 with high scores indicating high self esteem. This instrument has been validated and used for various studies in Nigeria [28, 15]. (3) The five- item Life Satisfaction scale [29] was used to measure life satisfaction among the respondents. The Scores ranged from 5-35 with higher scores indicating high life satisfaction. This scale has been widely used in assessing life satisfaction in various countries including Nigeria [30]. (4) Beck depression inventory-version two (BDI-2) was used to assess depression among the respondents.

It is a well-known self-report measure used to assess depression and its severity. This inventory has been used for various studies in Nigeria [31, 15].

### **2.3. DATA ANALYSES**

The Statistical package for social science; version 16.0 was used to analyze the data of the study; while means, standard deviations, percentages and chi square test were performed to find relationships between variables. The significance level chosen for this study is  $p \leq 0.05$  at 95% confidence interval.

### **3. RESULTS**

Age of respondents ranged from 23 to 61 years with a mean of 39.2 years and standard deviation of 8.7 years. There were equal number of males and females. They had various levels of educational attainment ranging from primary to tertiary levels. 237 (49.4%) were married.

Furthermore, the respondents had one form of employment or the other even as 73 (15.2%) were students. Although 257 (53.5%) showed no depressive symptoms yet others showed various signs of depression with 26(15.5%) of them showing signs of severe depression. 174(36.2%) had low self esteem whereas 129(26.9%) were not satisfied with life (Table I). No significant

association was noticed between self esteem, life satisfaction, depression and age (Table II).

Equally no significant association was observed between self esteem, life satisfaction, depression and gender (Table III). Results further revealed significant associations between education and depression (Table IV); occupation and life satisfaction; occupation and depression (Table V); as well as marital status and life satisfaction; self esteem and depression respectively (Table VI).

**TABLE I: Distribution of Socio Demographic Variables, Depression, Self Esteem and Life Satisfaction among the Respondents**

<b>VARIABLE</b>	<b>FREQUENCY</b>	<b>PERCENTAGE (%)</b>
<b>GENDER</b>		
Male	240	50
Female	240	50
<b>AGE (in years)</b>		
23-39	266	55.4
40-61	214	44.6
<b>RELIGION</b>		
Christianity	480	100

<b>EDUCATION</b>		
Primary	50	10.4
Secondary	191	39.8
Tertiary	239	49.8
<b>MARITAL STATUS</b>		
Single	83	17.3
Married	237	49.4
Divorced/Widowed	160	33.3
<b>OCCUPATION</b>		
Student	73	15.2
Self Employed	115	24.0
Public Servant	292	60.8
<b>DEPRESSION</b>		
Non depressed	257	53.5
Mild	121	25.2
Moderate	76	15.8.
Severe	26	5.5

<b>SELF ESTEEM</b>		
Low	174	36.2
High	306	63.8
<b>LIFE SATISFACTION</b>		
Not Satisfied	129	26.9
Satisfied	351	73.1

**TABLE II: Self Esteem, Life Satisfaction and Depression among Age Group**

<b>SELF ESTEEM</b>	<b>AGE GROUP</b>	
	23-39Years(N=266)	40-61 Years( N=214)
High	165 (62.0 )	141 ( 65.9)
Low	101 ( 38)	73 (34.1)
	N/S	
<b>Life Satisfaction</b>		
Satisfied	189(71.1)	162 ( 75.7)
Not Satisfied	77 (28.9)	52 (24.3)

	N/S	
<b>DEPRESSION</b>		
None	145 (54.5)	112 (52.3)
Mild	71 (26.7)	50 (23.4)
Moderate	39(14.7)	37( 17.3)
Severe	11(4.1)	15 (7.0)

**TABLE III: Self Esteem, Life Satisfaction and Depression among Gender**

<b>SELF ESTEEM</b>	<b>GENDER</b>	
	<b>MALE (N=240)</b>	<b>FEMALE (N=240)</b>
High	150 (62.5)	156(65.0)
Low	90 ( 37.5)	84 (35.0)
<b>LIFE SATISFACTION</b>		
Satisfy	184 (76.7)	167 (69.6)
Non satisfy	56 (23.3)	73 (30.4)

<b>DEPRESSION</b>		
None	129(53.8 )	128(53.3)
Mild	63 (26.3 )	58(24.2 )
Moderate	34(14.2 )	42(17.5)
Severe	14(5.7 )	12 (5.0)

**TABLE IV: Self Esteem, Life Satisfaction and Depression among Education**

<b>Self Esteem</b>	<b>Education Level</b>		
	Primary(N=50)	Secondary(N=191)	Tertiary(N=239)
High	39 (78.0 )	119(62.3 )	148 (61.9 )
Low	11(22.0 )	72 (37.7 )	91(38.1 )
<b>Life Satisfaction</b>			
Satisfy	28 (56.0 )	125(65.4 )	198 (82.8 )
Non Satisfy	22 (44.0 )	66 (34.6 )	41 (17.2 )
<b>DEPRESSION</b>			
Non	11(22.0 )	114 (60.0 )	132 (55.2 )
Mild	36 (72.0)	31 (16.2 )	54 (22.6 )
Moderate	2(4.0 )	35 (18.3 )	39(16.3 )
Severe	1 (2.0)	11 (5.5)	14 (5.9 )
		$\chi^2=67.3;P= 0.000^*$	

\*=Significant

**TABLE V: Self Esteem, Life Satisfaction and Depression among Occupation**

<b>Occupation</b>	<b>Public Servant(292)</b>	<b>Self employed(115)</b>	<b>Student(73)</b>
<b>Self Esteem</b>			
High	189 (64.7 )	71 (61.7 )	46(63.0 )
Low	103(35.3 )	44(38.3 )	27(37.0 )
<b>Life Satisfaction</b>			
Satisfy	203 (69.5 )	83(72.2 )	65 (89.0 )
Non Satisfy	89 (30.5 )	32 (27.8 )	8 (11.0 )
	$\chi^2=11.8; P = 0.00^*$		
<b>DEPRESSION</b>			
Non	143(49.0 )	56 (48.7 )	58(79.5 )
Mild	73 (25.0)	39(34.0 )	9(12.3 )
Moderate	54(18.3 )	16(14.0 )	6(8.2 )
Severe	22 (7.7 )	4 (3.3)	0(0 )
		$\chi^2=30.4; P = 0.00^*$	

**TABLE VI: Self Esteem, Life Satisfaction and Depression among Marital Status**

<b>Marital Status</b>	<b>Single(N=83)</b>	<b>Married(N=237)</b>	<b>Divorced/Widowed(160)</b>
<b>Self Esteem</b>			
High	48 (57.8)	166 (70.0)	92 (57.5)
Low	35 (42.2)	71 (30.0)	68 (42.5)
		$\chi^2=8.12;P=0.044^*$	
<b>Life Satisfaction</b>			
Satisfy	59 (71.1)	190 (80.2)	102 (63.8)
Non Satisfy	24 (28.9)	47 (19.8)	58 (36.2)
		$\chi^2=22.2;P=0.000^*$	
<b>DEPRESSION</b>			
Non	52 (62.7)	120 (50.6)	85 (53.1)
Mild	19 (22.9)	56 (23.6)	46 (28.8)
Moderate	7 (8.4)	43 (18.0)	26 (16.3)
Severe	5 (6.0)	18 (7.7)	3 (1.8)
		$\chi^2=22.6;P=0.000^*$	

**NOTE: \*= Significant; N/S = Non Significant**

#### **4. Discussion:**

53.7% of the HIV patients on HAART manifested no signs of depression; 63.8% had high self esteem and 73.1% were satisfied with their lives. This underscores the benefits of HAARTS in the management of HIV patients as has been reported by many authors [8, 9, 10].

However, in spite of the absence of psychosocial consequences of HIV on some of the patients on HAARTS, a number of them still manifested varying degrees of depression, low levels of self esteem and diminished life satisfaction. For instance, 25.2%; 15.8% and 5.5% showed signs of mild, moderate and severe depression respectively; 36.2% had low self esteem, whereas 26.9% indicated not being satisfied with their lives. This pattern of finding is consistent with previous reports on studies with HIV patients on HAART. For instance The WHO [6] had earlier reported the presence of intense psychological burden on people with HIV such as depression and anxiety as they adjust to the impact of the diagnosis of HIV/AIDS as a life threatening illness.

Previous studies had linked low self esteem with depressive symptoms among people living with HIV [16,17]. Van Dyke [19] posited that the low self esteem experienced by HIV positive individuals may be related to problems associated with HIV, such as rejection, problems of self identity and other physical conditions. Furthermore Heckman et al. [23], reported significantly

lower levels of life satisfaction, lower perceptions of social support from family members and friends and higher levels of loneliness among rural people with HIV. The pattern of findings noticed in this study corroborates these previous reports.

The significant relationship between education and depression may be attributed to the increased understanding of educated HIV positive people on the negative consequences of HIV; they therefore tried to cope with these negative consequences and did not allow these consequences to wear them down emotionally. There was significant association between occupation and life satisfaction in this study. This was in line with earlier observations which posited that Life satisfaction correlates significantly with variables like good interpersonal relationships, better physical and mental health, good job, positive life events, and high income [21, 22].

## **5. CONCLUSION**

This study had pointed out the absence of some psychosocial consequences associated with HIV on some of the patients on HAARTS thereby proving the benefits of HAARTS in the management of HIV. However in spite of this, a number of patients on HAARTS who participated in the study manifested some psychosocial consequences of HIV like various degrees of depression, low self esteem and low life satisfaction. In this regard, there is need for government to ensure strict adherence on HAART regimen for optimum suppression of HIV as recommended by The World Health Organization; and ensure continuous provision of

psychological support to all HIV/AIDS patients as a way of reducing the psychosocial sequelae associated with HIV as reported in this and other studies.

**CONSENT:** All the subjects consented to participate in the study.

**ETHICAL APPROVAL:** The university of Nigeria research and ethics committee approved the study.

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