

Research Article

Subjective Quality of Life of Visually Impaired Patients in Ogbomoso, Oyo State, Nigeria

Susannah Temitope Adepoju^{1*}, Joshua Folusho Owoeye²,
Olukayode Abayomi³, Yinka Ologunsua⁴ and Ugochukwu
Anthony Eze⁵

¹Department of Ophthalmology, Ladoke Akintola University of Technology (LAUTECH) Teaching Hospital, Ogbomoso, Nigeria

²Department of Ophthalmology, University of Ilorin Teaching Hospital Ilorin, Nigeria

³Department of Mental Health and Learning Disabilities, Swansea Bay University Health Board, Swansea, Wales

⁴Sight for Life Eye Centre, Ibadan, Oyo State, Nigeria

⁵Department of Ophthalmology, Federal Medical Centre, Asaba, Delta State, Nigeria

***Corresponding author**

Susannah Temitope Adepoju, Department of Ophthalmology, Ladoke Akintola University of Technology (LAUTECH) Teaching Hospital, Ogbomoso, Nigeria

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Abstract

Aim: To determine the subjective quality of life and associated factors among visually impaired patients in Ogbomoso.

Objectives: A: To determine the subjective quality of life among visually impaired patients in Ogbomoso (considering sustainable development goal 3-health and well-being). B: To determine the factors associated with the quality of life of visually impaired patients in Ogbomoso (considering sustainable development goals 1,4 and 17).

Methods: It was a descriptive, cross-sectional study among institutionalized and community-living patients with loss of vision in a training centre for the blind in Ogbomoso, Oyo State, Nigeria. Interviewer-administered questionnaires (for socio-demographics and WHO QOL BREF -World Health Organization Quality of Life Bref -) were applied to study subjects. Individual score per domain were summed up and the mean for all subjects per domain calculated. Individual score less than the mean was classified as poor quality of life, score greater than or equal to the mean was classified as good quality of life.

Results: Out of the 143 study participants, of whom 41.6% had poor quality of life. Quality of life was found to be associated with increasing age ($p = 0.000$), unemployment ($p = 0.000$) and place of residence ($p = 0.000$).

Conclusion: There is a relatively high poor quality of life among patients with visual impairment in Ogbomoso. Factors affecting their quality of life included increasing age, unemployment and place of residence.

INTRODUCTION

How well the eye and the visual system integrate to observe a target or the outside world is known as visual function [1,2]. Vision is considered the most dominant of all senses and plays a critical role in all aspects of our lives and overall development [3]. Visual impairment (VI) occurs when a condition affects the visual system and its normal function, thus affecting one's perception of the outside world. VI is a heterogeneous condition with different aetiologies, severity and level of progression. The severity of VI one suffers determines the extent and limitation of the person's activities of daily living and overall quality of life [4]. WHO estimates show that about 2.2 billion people (about 27.5% of the world's population) suffer from one form of VI or the other [3].

Vision is so important to a nation's development that, of the 17 United Nations Sustainable Development Goals (UNSDGs), 11 are directly or indirectly tied to vision and its functions [5]. Vision is critical for productivity and economic growth and power, mental health and overall wellbeing, education and learning, gender equality and equity among nations, healthy environments sustainable cities and climate action [5]. SDG 3 centers on good health and overall well-being, which includes eye health. VI impacts mental health as there is a link between poor vision and depression and anxiety especially due to loss of independence from injury or any other disability related to a person's VI [5,6].

In the past, different studies on VI and quality of life conducted among different groups with VI have shown an association with poor quality of life. While older people with VI are naturally

expected to have lower quality of life compared to their contemporaries [2], this also applies to younger people in their prime who are supposed to be bread winners, principal actors in their respective careers and thus contributing to the society. In other words, visual impairment in younger people has a more profound disruptive effect on their lives than older people, thus negatively affecting their quality of life. Furthermore, studies have reported that certain other factors determine the extent to which quality of life is affected in people with visual impairment. Nyman, et al. reported that an individual's perspective of self and life is directly related to the quality of life in the presence of visual impairment [7]. Adepoju, et al. reported a 50% prevalence of mental illness people with vision loss [8]. This also suggests that the mental state of people with VI affects their quality of life. The purpose of this study is to determine the quality of life and associated factors among people with VI in Ogbomosho, Nigeria, comparing those who reside in an organized centre for the blind and those living within the larger community.

METHODS

The study was conducted at the ophthalmology clinic of the Ladoke Akintola located in Ogbomosho Local Government Area (LGA) the present-day Oyo State. The LGA also plays host to the Nigerian Training Centre for the Blind. This is part of a larger study by Adepoju, et al [8] exploring the prevalence of mental ill- health among persons with visual impairment. This was a descriptive cross-sectional study conducted among people with low vision and total loss of vision living within the training centre for the blind as at the time of the study and community-living patients seen in the eye clinic of Ladoke Akintola University of Technology Teaching Hospital Ogbomosho with low vision or total loss of vision during the 2-month study period. The minimum sample size of 143 was determined using Corlien, M. method [9].

Sample size determination: $n = (u+v)[P_1(1-P_1) + P_2(1-P_2)]$

$(P_1 - P_2)^2$

n = minimum sample size.

P_1 = expected prevalence of psychological distress among people with low vision =18.4%.

P_2 = prevalence of psychological distress among people with loss of vision in a previous study =33.4% [10].

v =percentage point of the normal distribution corresponding to the two-sided significance level of 5% ($v = 1.96$).

u = one-sided percentage point of normal distribution where power equals probability of finding a significant result using the power of 80% ($u = 0.84$).

Seventy-seven people were recruited from the Centre for the blind and sixty-six from the community-based individuals who attended the Ophthalmology clinic of Ladoke Akintola University of Technology Teaching Hospital.

Sampling Method

One hundred people were enumerated at the centre for the blind, 82 people gave their consent but only 77 completed the study. Every alternate community-living individual with best corrected visual acuity (BCVA) worse than 6/18 who attended the eye clinic of Ladoke Akintola University of Technology Teaching Hospital Ogbomosho during the study period was selected.

Ethical Consideration

Approval for the study was obtained from the ethical review committee of the Ladoke Akintola University of Technology Teaching Hospital Ogbomosho. Administrative permission was obtained from the management of the Training Centre for the Blind. The Study followed the tenets of the Helsinki Declaration.

Inclusion and Exclusion Criteria

All consenting individuals with low vision and visual loss living within The Nigerian Training Centre for the Blind in Ogbomosho, and those who presented at the eye clinic of Ladoke Akintola University of Technology Teaching Hospital Ogbomosho during the study period were included while patients whose visual acuity improves to $\geq 6/18$ after refraction and or whose visual field was wider than 10° from fixation were excluded. World Health Organization Quality of Life Bref questionnaire, used in a similar study [11], was administered to participants in the preferred language (English or Yoruba). The questions and options of responses were read out and the option of the answers chosen by participant was marked. The mean score for each domain of quality of life was calculated from the total score of respondents for the domain divided by the total number of respondents. Respondents with individual's total score greater than the calculated mean were categorized as having good quality of life. Those with scores less than the mean were categorized as having low quality of life as used in a similar study [11]. Questionnaires were administered by previously trained research assistants [12,13].

RESULT

A total of 164 questionnaires were distributed while 143 respondents completed it, making 87.2% response rate. Ninety-six (96) of the respondents were males, constituting 67.1% of the total population and with male to female (M: F) ratio of 2:1. The mean age of subjects studied was 44.5 ± 23.1 years (Table 1).

Subjective Quality of Life

The mean and standard deviation of the raw scores and transformed scores in each of the four domains (physical, psychological, social and environment) and the two stand-alone items (overall perception of quality of life and general satisfaction with health) of the WHOQOL-BREF Questionnaire is presented below (Table 2). The table shows the mean raw score and the transformed domain score when transformed to 0-100 scores. Taking into account the general health of subjects, the average

Table 1: Showing the socio-demographic characteristics study of the respondent.

Variable	Frequency (N)	Percentage (%)
Sex		
Male	96	67.1
Female	47	32.1
Total	143	100
Age group (Years)		
< 20	30	21
20-29	38	26.6
30-39	24	16.8
40-49	13	9.1
50-59	16	11.2
60-69	22	15.4
Total	143	100
Marital Status		
Single	65	45.5
Married	55	38.7
Others	23	16.1
Total	143	100
Level of VI		
Low vision	78	54.5
Total visual loss	65	45.5
Total	143	100
Place of residence		
Institutionalized (Training centre for the blind)	77	54
Community	66	46
Total	143	100

Table 2: Whoqol-Bref (Mean Raw and Transformed Scores).

Domains	Raw Scores	Transformed Scores
	Mean (± SD)	Mean (± SD)
Physical	24.1 (±4.1)	61.1 (±14.6)
Psychological	20.0 (±3.8)	58.4 (±15.9)
Environmental	26.0 (±4.7)	58.4 (±20.6)
Social	11.1 (±2.5)	67.6 (±20.8)
Overall QOL	3.6 (±1.2)	
General Health	3.3 (±1.3)	

overall poor quality of life among people with low vision and total loss of vision was found to be 41.6% as shown in (Table 3). Values less than the mean transformed score in each domain is taken as low quality of life in that domain. (Table 4) shows that the quality of life of respondents is not dependent on their gender (p-values greater than 0.05 in all domains). (Table 5) shows increasing number of subjects with poor quality of life with increasing age in two domains (physical and psychological). However, this increasing poor quality of life with age is statistically significant only in the physical domain ($p = 0.000$).

In (Table 6), all domains of subjects' quality of life demonstrated improvement with increasing level of educational attainment, but the improvement is not statistically significant in any of the domains. In (Table 7), unemployment is associated with statistically significant poor quality of life in the physical domain ($p=0.000$) Students showed the highest quality of life in all domains, but the values are not statistically significant. (Table 8) shows that single subjects have the best quality of life

compared with the married and others (divorced and widowed) in the physical, psychological and overall perception of life domains. This finding is however statistically significant only in the physical domain ($p = 0.000$). Married subjects have the highest percentage of quality of life than others in the social domain, although this was found to be statistically insignificant ($p = 0.971$). (Table 9) shows that people with loss of vision

Table 3: Quality of life of subjects.

Quality of life		
Domain	Good (%)	Poor (%)
Physical	70 (49)	73 (51)
Psychological	69 (48)	74 (52)
Environment	73 (51)	70 (49)
Social	65 (45)	78 (55)
Overall perception of quality of life	89 (62)	54 (38)
General satisfaction with health	77 (54)	66 (46)
Average =		41.60%

Table 4: Gender and Quality of life.

Domain of QoL	Male	Female	Total	p - value
Physical				
Poor QoL	48 (50.0%)	25 (53.2%)	73 (51.1%)	0.72
Good QoL	48 (50.0%)	22 (46.8%)	70 (48.9%)	
Psychological				
Poor QoL	43 (44.8%)	20 (42.6%)	63 (44.1%)	0.8
Good QoL	53 (55.2%)	27 (57.4%)	47 (55.9%)	
Social				
Poor QoL	50 (50.6%)	27 (57.5%)	77 (54.2%)	0.588
Good QoL	45 (47.4%)	20 (42.5%)	65 (45.8%)	
Environmental				
Poor QoL	45 (46.9%)	19 (40.4%)	64 (44.8%)	0.466
Good QoL	51 (53.1%)	28 (59.6%)	79 (55.2%)	
Overall Perception of QoL				
Poor QoL	36 (37.5%)	18 (38.3%)	54 (37.8%)	0.926
Good QoL	60 (62.5%)	29 (61.7%)	89 (62.2%)	

QoL means quality of life.

Table 5: Age group and Quality of Life.

Domain	Age Group			Total	p - value
	< 20yrs	20-54yrs	55yrs and above		
Physical					
Poor QoL	7 (30.4%)	24 (38.1%)	42 (73.7%)	73 (51.0%)	0
GoodQoL	16(69.6%)	39 (61.9%)	15 (26.3%)	70 (49.0%)	
Psychological					
Poor QoL	8 (34.8%)	24 (38.1%)	31 (54.4%)	63 (44.1%)	0.124
Good QoL	15 (65.2%)	39 (61.9%)	26 (45.6%)	80 (55.9%)	
Social					
Poor QoL	11 (47.8%)	35 (55.6%)	31 (55.4%)	77 (54.2%)	0.797
Good QoL	12 (52.2%)	28 (44.4%)	25 (44.6%)	65 (45.8%)	
Environment					
Poor QoL	8 (34.8%)	35 (55.6%)	21 (36.8%)	64 (44.8%)	0.069
Good QoL	15 (65.2%)	28 (44.4%)	36 (63.2%)	79 (55.2%)	
Overall Perception of QoL					
Poor QoL	7 (30.4%)	26 (41.3%)	21 (36.8%)	54 (37.8%)	0.645
Good QoL	16 (69.6%)	37 (58.7%)	36 (63.2%)	89 (62.2%)	

Table 6: Level of education and quality of life.

Domain	Level of Education						p-value
	None	Primary	Secondary	Tertiary	Others*	Total	
Physical							
Poor QoL	24 (64.9%)	17 (51.5%)	10 (43.5%)	7 (31.8%)	15 (53.6%)	73 (51.1%)	0.154
Good QoL	13 (35.1%)	16 (48.5%)	13 (56.5%)	15 (68.2%)	13 (46.4%)	70 (48.9%)	
Psychological							
Poor QoL	22 (59.5%)	18 (54.5%)	7 (30.4%)	9 (40.9%)	7 (25.0%)	63 (44.1%)	0.027
Good QoL	15 (40.5%)	15 (45.5%)	16 (69.6%)	13 (50.1%)	21 (75.0%)	80 (55.9%)	
Social							
Poor QoL	21 (58.3%)	18 (54.5%)	11 (47.8%)	10 (45.5%)	17 (60.7%)	77 (54.2%)	0.776
Good QoL	15 (41.7%)	15 (45.5%)	12 (52.2%)	12 (54.5%)	11 (39.8%)	11 (39.8%)	
Environment							
Poor QoL	19 (51.4%)	14 (42.4%)	10 (43.5%)	9 (40.9%)	12 (42.9%)	64 (44.8%)	0.923
Good QoL	18 (48.6%)	19 (57.6%)	13 (56.5%)	13 (50.1%)	16 (57.1%)	79 (55.2%)	
Overall Perception of QoL							
Poor QoL	16 (43.2%)	16 (48.5%)	7 (30.4%)	7 (31.8%)	8 (28.6%)	54 (37.8%)	0.413
Good QoL	21 (56.8%)	17 (51.5%)	16(69.6%)	15 (68.2%)	20 (71.4%)	89 (62.2%)	

*Those with informal education, including those who learned how to read and write outside a school set-up.

Table 7: Occupation and Quality of Life.

Domain	Occupation				p-value
	Employed (n = 76)	Student (n = 55)	Unemployed (n = 12)	Total (N = 143)	
Physical					
Poor QoL	49 (64.5%)	16 (29.1%)	8 (66.7%)	73 (51.1%)	0
Good QoL	27 (35.5%)	39 (70.9%)	4 (33.3%)	70 (48.9%)	
Psychological					
Poor QoL	40 (52.6%)	17 (30.9%)	6 (50.0%)	63 (44.1%)	0.43
Good QoL	36 (47.4%)	38 (69.1%)	6 (50.0%)	80 (55.9%)	
Social					
Poor QoL	46 (61.3%)	24 (43.6%)	7 (58.3%)	77 (54.2%)	0.129
Good QoL	29 (38.7%)	31 (56.4%)	5 (41.7%)	65 (45.8%)	
Environment					
Poor QoL	37 (48.7%)	23 (41.8%)	4 (33.3%)	46 (44.8%)	0.522
Good QoL	39 (51.3%)	32 (58.2%)	8 (66.6%)	79 (55.2%)	
Overall Perception of QoL					
Poor QoL	31 (40.8%)	17 (30.9%)	6 (50.0%)	54 (37.8%)	0.34
Good QoL	45 (59.2%)	38 (69.1%)	6 (50.0%)	89 (62.2%)	

Table 8: Marital Status and Quality of Life.

Domain	Marital STATUS				P - value
	Single (n = 65)	Married (n = 55)	Others (n = 23)	Total (N = 143)	
Physical					
Poor QoL	21 (32.3%)	37 (67.3%)	15 (65.2%)	73 (51.0%)	0
Good QoL	44 (67.7)	18 (32.7%)	8 (34.8%)	70 (49.0%)	
Psychological					
Poor QoL	24 (36.9%)	25 (45.5)	14 (60.9%)	63 (44.1%)	0.134
Good QoL	41 (63.1%)	30 (54.5)	9 (39.1%)	80 (55.9%)	
Social					
Poor QoL	35 (53.8%)	29 (53.7%)	13 (56.5%)	77 (54.2%)	0.971
Good QoL	30 (46.2%)	25 (46.3%)	10 (43.5%)	65 (45.8%)	
Environmental					
Poor QoL	31 (47.7%)	27 (49.1%)	6 (26.1%)	64 (44.8%)	0.143
Good QoL	34 (52.3%)	28 (50.9%)	17 (73.9%)	79 (55.2%)	
Overall Perception of QoL					
Poor QoL	23 (35.4%)	23 (41.8%)	8 (34.8%)	54 (37.8%)	0.73
Good QoL	42 (64.6%)	32 (58.2%)	15 (65.2%)	89 (62.2%)	

have better quality of life in the psychological and physical domains, whereas those with low vision were shown to have better quality of life in the environmental domain. Both groups have similar quality of life in the social and overall perception of quality of life. However, these are not statistically significant. In (Table 10), community-living subjects have poorer quality of life as compared with those residing in the centre for the blind in all domains except in the overall perception of quality of life in which both groups have similar quality of life. However, the poorer quality of life in community-living subjects is only significant in the physical domain ($p = 0.000$). (Table 11) shows that poor mental health is directly related to poor quality of life and the relationship is statistically significant (p -value < 0.05) in all domains. NB: The mean transformed scores serving as cut-off point between good and poor quality of life are in (Table 1).

DISCUSSION

This study has shown a high frequency (41.6%) of poor QoL among the respondents. This high proportion suggests the

negative correlation between visual status and QoL. The results obtained here are similar to what was earlier reported (41.4%) in 2014 by Adigun, et al [4] at neighbouring Ibadan. Our result showed up to 2.5-fold poor QoL compared to 17% who reported poor quality of life in a low vision centre in Ghana [14]. The reason for this difference probably include the severity of the VI in the subjects in this study and the difference in sample size (143 in our study and 294 in the Ghanaian study). The study in Ghana considered people with normal vision in their population [14]. In this study, QoL was significantly affected by age group, employment status and place of residence ($p = 0.000$). This study had more male respondents than females (M: F = 2:1). This is contrary to 1:1.1 reported by Adigun, et al [4]. Though they were both clinic-based cross-sectional studies, the details of selection and residence of respondents was not well described by Adigun, et al. However, this study had more institutional based respondents (54%) than community-based respondents. This difference albeit little, may have affected the sex distribution of our respondents. Another adducible reason for the difference is the difference in sample size of the two populations in the two

Table 9: Severity of Visual Impairment and Quality of Life.

Domain	Severity of Visual Impairment			p - value
	Low vision (n = 42)	Loss of vision (n = 101)	Total (N = 143)	
Physical				
Poor QoL	28 (66.7%)	45 (44.6%)	73 (51.1%)	0.016
Good QoL	14 (33.3%)	56 (55.4%)	70 (48.9%)	
Psychological				
Poor QoL	22 (52.4%)	41 (40.6%)	63 (44.1%)	0.196
Good QoL	20 (47.6%)	60 (59.4%)	80 (55.9%)	
Social				
Poor QoL	23 (54.8%)	54 (54.0%)	77 (54.2%)	0.934
Good QoL	19 (45.2%)	46 (46.0%)	65 (45.8%)	
Environmental				
Poor QoL	14 (33.3%)	50 (49.5%)	64 (44.8%)	0.077
Good QoL	28 (66.7%)	51 (50.5%)	79 (55.2%)	
Overall Perception of QoL				
Poor QoL	15 (35.7%)	39 (38.6%)	54 (37.8%)	0.745
Good QoL	27 (64.3%)	62 (61.4%)	89 (62.2%)	

Table 10: Place of Residence and Quality of Life.

Domain	Place of Residence			p - value
	Centre for the blind	Community	Total	
Physical				
Poor QoL	22 (33.3%)	51 (66.2%)	73 (51.0%)	0
Good QoL	44 (66.7%)	26 (33.8%)	70 (49.0%)	
Psychological				
Poor QoL	24 (36.4%)	39 (50.7%)	63 (44.1%)	0.086
Good QoL	43 (65.2%)	38 (49.3%)	80 (55.9%)	
Social				
Poor QoL	33 (50.0%)	44 (57.9%)	77 (54.2%)	0.346
Good QoL	33 (50.0%)	32 (42.1%)	65 (45.8%)	
Environmental				
Poor QoL	22 (33.3%)	51 (66.2%)	73 (51.0%)	0.622
Good QoL	44 (66.7%)	26 (33.8%)	70 (49.0%)	
Overall Perception of QoL				
Poor QoL	25 (37.9%)	29 (37.7%)	54 (37.8%)	0.979
Good QoL	41 (62.1%)	48 (62.3%)	89 (62.2%)	

Table 11: Mental Health Status versus Quality of Life.

	Mental ill-Health	N	Mean Domain Transformed Score	Std. Deviation	t	df	Sig. (2-tailed)	95% CI of the Difference	
								Lower	Upper
Overall perception of QoL	No	75	3.8933	1.02104	3.228	141	0.002	0.23225	0.96618
	Yes	68	3.2941	1.19774					
Physical domain	No	75	67.381	11.26838	5.984	141	0.000	8.79003	17.46347
	Yes	68	54.2542	14.8638					
Psychological domain	No	75	65.0556	11.45999	5.849	141	0.000	9.27759	18.75019
	Yes	68	51.0471	16.90402					
Social domain	No	75	75.8889	15.95163	5.572	140	0.000	11.40728	23.95259
	*Yes	67	58.209	21.68669					
Environmental domain	No	75	63.4583	17.85574	3.812	139	0.002	4.05605	17.36819
	*Yes	66	52.7462	22.08699					

*Missing data.

studies with 375 in Ibadan approximately 2.6 times a multiple of the 143 respondents that participated in this study.

Again, 64.4% of our study population were < than 40 years. Two reasons may have accounted for this: 1st more respondents reside in the Nigerian Training Centre for the Blind which is expected to have more younger people being an institution and the predominantly young Nigerian population which has a median age of 17.2 years [15]. This distribution is not too different from another study in Ibadan where Olusanya, et al [16] in a study to determine the profile of low vision patients at University College Hospital reported that almost half of their respondents were < 40 years old. It is similar to the findings of Tunde-Ayinmode, et al [17] who reported in their community-based study with 47% of the respondents were aged between 15-45 years. Conversely, despite the sample size difference the study in Ghana showed that 59.2% of their study population were less than 40 years old. Most QoL studies were conducted among elderly people. This is not unexpected as visual impairment is more among the elderly due to the ocular morbidities and systemic comorbidities in the elderly. Like the earlier study in Ghana, this study has usefully highlighted that QoL can be affected in younger individual with visual impairment.

Thirty-seven (26%) had no formal education, while 106 (74%) had some form of education among the study subjects in this research. This is contrary to the finding that most of the subjects 26 (72%) in the study carried out in Ilorin by Tunde-Ayinmode, et al [17] were without any western education and only 5 (29%) had some western education. The finding in the Nigerian National Blindness and Visual impairment Survey was similar as participants who could not read or write had higher prevalence of blindness [18]. This may be explained by the education being provided for most of the younger subjects in this study who are mostly living in the rehabilitation centre (The Nigerian Training Centre for the Blind, Ogbomosho) which has an educational arm and a vocational arm. A relationship was found between educational level and quality of life in this study,

similar to what was found in a study by Andreas, et al [19] which showed that low educational level was related to low health-related quality of life, although general health of participants was considered and the sample size was very large (5,676 subjects) in the study by Andreas, et al, whereas only the vision-related quality of life was measured in this study and the sample size was also not comparable. Another study by Yingfeng, et al [20] shows that illiteracy is associated with visual impairment, which was also associated with poor quality of life. This was also supported by findings of more visual impairment in women due to illiteracy in the Nigerian National Blindness and Visual Impairment Survey [21].

In this study, 76 (53.1%) subjects were employed, most of whom were institutionalized, 12(8.4%) were unemployed, 55 (38.5%) were students. Fourteen (23%) and forty-seven (77%) were employed and unemployed respectively among the subjects studied by Tunde-Ayinmode in a similar descriptive cross-sectional study [17]. Results of this study shows that employed subjects had better quality of life. A similar finding was observed in a study by Adigun, et al [4] in Ibadan and Carlier, et al [22] in Netherlands who showed in a similar descriptive cross-sectional study that being unemployed increased the likelihood of poor quality of life by 2.9 fold compared with the employed. It was found in this study that severity of visual impairment does not significantly affect an individual's quality of life. This finding is contrary to worsening of quality of life with increasing severity of visual impairment found in various other studies by Adigun, et al [4] in Ibadan, Southwest Nigeria, Tran et al [23] in the Nigerian National Blindness and Visual Impairment Survey, Shahiky, et al [24] who studied quality of life of glaucoma patients in the United States and Aspinal, et al [25]. This may be explained by the fact that most of the subjects with total loss of vision in this study were resident in the training centre for the blind and are thus undergoing rehabilitation which has been shown to improve quality of life in some studies [26,27].

In this study, using the WHO QOLBref instrument, poor

quality of life was found among 22 (33.3%) and 51 (66.2%) of the institutionalized and community-living subjects respectively in the physical domain, 24 (36.4%) and 39 (50.7%) respectively in the psychological domain, 33 (50.0%) and 44 (57.9%) respectively in the social domain; 22 (33.3%) and 51 (66.2%) respectively in the environmental domain. This shows a positive relationship between the place of residence and the quality of life of study subjects in the physical domain only. In comparison, Adigun, et al made use of Vision-related Quality of life Questionnaire and found poor quality of life in 241 (64.2%) in the domain of visual function, 166 (42.9%) in the domain of mobility, 191 (50.9%) in the domain of social interaction and 171 (47.2%) in the mental well-being domain. This study identified an association between the subjects' mental health and quality of life. The presence of symptoms of mental ill-health is associated with poor quality of life, similar to what was found in various studies on glaucoma, cataract, age-related macular degeneration and Fuchs corneal dystrophy patients [28-31]. Renauld, et al also showed that visual impairment is more common among the elderly with a resultant high prevalence of depression and associated poor quality of life. Factors affecting subjects' quality of life can therefore be said to also indirectly affect their mental health status. The institutionalized subjects were found to have better quality of life in this study because most of the factors found to affect quality of life, including education, occupation and place of residence, are being taken care of by the government at the rehabilitation centre. However, the irreversibility nature of the visual impairment itself may still account for the occurrence of both poor quality of life among the institutionalized subjects. The small sample size in this study is a potential weakness and may affect generalizability of the results. However, this study was conducted according to international standards on QoL which has received little attention in younger people and in this environment.

CONCLUSION AND RECOMMENDATION

In this study, we have reported a high magnitude of poor QoL in patients with VI. A link with a support system (in this case a rehabilitation institution) reduced the magnitude of poor QoL. Members of the eye care team need to develop more interest in the QoL of the patients. This is in line with the holistic management of the patients with VI and not just as a pair of eyes. There is a need to develop easy-to-use QoL assessment tools that will boost the clinical and interest of the ophthalmologist. This will help to generate a large body of evidence that will positively influence policy in this respect.

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