

Challenge, Attitude and Practice of Spectacle Wearers at IOTA Teaching Hospital in 2019.

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Abstract

Introduction: The contribution of spectacles in improving visual impairments is undeniable. But there are situations which have a negative influence on its acceptance. Hence our study in the main objective is to contribute to the understanding of the obstacles to wearing eyeglasses. **Methods:** This was a descriptive cross-sectional study and analysis lasting 12 months, carried out at the CHU-IOTA. **Results:** We collected 326 patients with a female predominance (Sex-ratio M/W = 0.6). The average age of our patients was 25 ±3 years old, with extremes ranging from 18 to 69 years old. About 3/4 of our patients were under of 30 years old. The cost of corrective lenses was a challenge for 11.95% of patients who had good attitudes. **Discussion:** In addition to the challenges, the patient must be actively involved in the management of his or her ametropia. **Conclusion:** Knowledge of the attitudes and practices of wearers eyeglasses contributes positively to changing the behaviour of the wearers. The sensibilisation significantly reduced challenges and reduced patient fear.

Keywords: Spectacle, challenges, attitudes, practices, Bamako.

INTRODUCTION

For the correction of refractive defects, the ophthalmologist has several methods: wearing spectacles, wearing contact lenses and refractive surgery [1]. Spectacles include a lens mounted on a frame and intended to be worn in front of the eyes to enhance visual impairment [1,2]. Notwithstanding these benefits, inaccessibility, prescription errors and the anarchic distribution of eyeglasses raise enormous sources of ocular discomfort and dissatisfaction [3]. Several studies on refractive errors have been carried out worldwide [3-6].

In Tanzania and Nigeria in 2008, the authors found that the major challenge for wearing glasses was the costly of eyeglasses [7,8].

The rareness of literature on the challenges, attitudes and the practice of wearing eyeglasses has led to the realization of this study whose purpose is to contribute to the improvement of the management of the ametropia at IOTA Teaching hospital.

METHODOLOGY

This was a 12-month descriptive and analytical cross-sectional study conducted between July 1, 2018 to August 31, 2019, including by reasoned choice, consenting patients, holders of corrective lenses for at least 06 months and at least 18 years old of age, received in the IOTA teaching hospital consultation boxes during the study period. The data were collected using pre-established and pretested questionnaires covering socio-demographic parameters, challenges, attitudes and practice with regard to the use of spectacles. For the assessment of attitudes and practice, we established a questionnaire of 10 questions and each correct answer was given 1 point to the patient; the addition of the points allowed us to classify the attitudes of the patients in: Good for a score of 10 to 6, Perplexed for a score of 5 and Bad for a score of 4 to 0. The analysis of the data was carried out using the software SPSS version 24, the tables were produced using the 2010 version of Excel software and Word 2010 software was used for text entry. We performed cross-tabulations and the X² statistical test was used with 5% significance threshold.

RESULTS

During the study period, 326 patients met our inclusion criteria. There were 156 Men and 270 Women (Sex-ratio M/ W= 0.6)

Table I: Distribution of patients by socio-demographic profile

Age (Years)	Gender		Vocation				
	M	W	Unemployed	Worker	Student	Civil Servant	Pensioner
< 20	56	83	-	19	120	-	-
21 - 30	39	76	6	12	51	36	-
31- 40	24	52	3	5	-	68	-
41- 50	17	34	3	7	-	43	-
51 - 60	12	22	1	-	-	4	30
> 60	8	3	-	-	-	-	11
Total	156	270	13	43	171	151	41
	Marital Status		Education level				
	Single	Married	Widowed/ Widows	Without education	Primary	Secondary	University
n	89	172	65	41	54	117	114
%							

The mean age of the study cohort was 25 ± 3 years with extremes ranging from 18 to 69 years.

Table II: Relationship between attitudes and the duration of wearing eyeglasses

		Attitudes			Total
		Good	Bad	Perplexed	
Duration	6 months – 1 Year	45	35	84	164
	1 Year – 5 Years	66	11	12	89
	5 Years – 10 Years	73	0	0	73
	Total	184	46	96	326
$X^2 = 126,098$		$df = 1$		$p < 5\%$	

Table III: Relationship between attitudes and challenges in wearing eyeglasses

		Attitudes			Total
		Good	Bad	Perplexed	
Challenges	Visual discomfort	0	46	83	129
	Incorrect prescription	0	46	92	138
	Cost	22	39	94	155
	Loss	17	12	32	61
	Total	39	143	301	483
$X^2 = 295,935$		$df = 1$		$p < 5\%$	

Table IV: Relationship between attitudes and choice of spectacles frame

		Attitudes			Total
		Good	Bad	Perplexed	
Choice of spectacles frame	Wearers themselves	179	3	-	182
	Parent	1	27	64	92
	Opticien	4	16	32	52
	Total	184	46	96	326
$X^2 = 65,183$		$df = 6$		$p < 5\%$	

Table V: Relationship between attitudes and practice

		Attitudes			Total
		Good	Bad	Perplexed	
Practice	Good lens cleaning	184	12	89	285
	Good eyeglasses conservation	169	7	79	255
	Total	353	19	168	540
$X^2 = 0,888$		$df = 2$		$p > 5\%$	

DISCUSSION

In our study we observed a female predominance (**Table I**), identical to the authors' observations in Tanzania [7]. In addition to the demographic arguments, the strong acceptance of the wear spectacles by the female staff because of their aesthetic contribution would justify our result. The mean age of our series was 25 ± 3 years identical to that of EBEIGBE et al in Nigeria [9], but lower than the mean age of studies of Adeoti et al in Nigeria [11], Ayanniyi et al in Nigeria [8]

and Padma et al in India [10] who respectively found 36.20 ± 13.44 years; 40.2 ± 15.8 years and 49.14 ± 15.413 years. The high proportion of young people in Africa south of the Sahara, would be the cause of the high frequency of young people in our series. We also found that almost all (98.77%) of our patients had intellectual activity (Table I) as corroborated by the results of the studies conducted in the Sub-region and in Asia [8-10]. The constant solicitation of vision in the exercise of everyday intellectual activities, such as reading, writing and drawing, supports our result. As well as the level of education was significant in about 3/4 of our sample (Table I). Our observation is consistent with that of Ayanniyi et al in Nigeria [9] and Padma et al in India [10], which observed 96.7% and 60% respectively. Although the use of spectacles may be useful in domestic work, let us cite the example of the beneficial contribution of vision glasses in thread threading in the needle hole in the presbyope. Nevertheless, a certain level of education is needed to understand the benefits of wearing eyeglasses on quality of life. In addition, patients' attitudes had significantly improved with the length of wearing eyeglasses in our study (Table II). Because of the cumulative acquisition of the experience conferred by the duration of wearing glasses. In addition, our study found the following obstacles to the proper wearing of eyeglasses: visual discomfort, non-compliant prescriptions and the costly of eyeglasses, in almost all of our patients with either Bad attitudes or perplexed attitudes (Table III). Contrary to the Nigerian study [9], the main challenges observed were: costly spectacles (43%), Falling/scratch/broken lenses (29.4%) and Fear of spectacles damaging the eyes (23.8%). This difference would be due to the absence of regulations regarding the quality of the prescriber and the seller of spectacles in Mali. Without ignoring, the lack of coverage of the cost of spectacles by health insurance companies in Mali. Another major result of our study is the significant contribution that the involvement of the patient in the choice of his spectacle frame makes to the acquisition of good attitudes (Table IV). Our result is similar to that of Ayanniyi et al in Nigeria [9]. We specify, without the risk of error, that the involvement of the patient (and his or her family) is a condition considered important in the success of care. Therefore, for a better acceptance of the wear spectacles, patient involvement must be sought and obtained by eye care professionals. Also, the practice was good in almost all of our patients who had good attitudes or perplexed attitudes (Table V). This result, insists on the fact that the major part of the causes of the lack of interest in wearing eyeglasses by patients lies in refractive errors and erroneous prescriptions.

CONCLUSION

In conclusion, the challenges faced by eyeglass wearers affect everyone regardless of gender, occupation and educational level. In order to improve the acceptance of the use of corrective lenses, the regulation of the prescription and sale of glasses coupled with the cost of glasses by the mutual health insurance companies is necessary. It should be noted that the standardization of prescription and sale of eyeglasses, require the availability of a sufficient number of qualified eye care professionals to reduce refractive errors and non-compliant prescriptions. The long wearing time or prolonged years of usage did possess better understanding about the care, as expected. Poor communication from the side of the optician was evident. Therefore, during the consultations, the eye care professional should reserve a place of choice for the Information -

Education activity of visually deficient patients on the good attitudes and practices of wearing eyeglasses.

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