Assessment of elderly patient's awareness towards prosthodontic rehabilitation and attitude towards utilization of services- A hospital based questionnaire study

Kunal Kumar¹, Vikas Vaibhav^{2*}, Rachna Raj³, Neal Bharat Kedia⁴, Abhinav Kumar Singh⁵, Revati Singh⁶

^{1,6}Senior Resident, ²Associate Professor, ³Lecturer, ^{4,5}Professor, ^{1,2,6}Dept. of Dentistry, ³Dept. of Public Health Dentistry, ⁴Dept. of Orthodontics, ⁵Dept. of Conservative, ^{1,6}Patna Medical College and Hospital, Patna, Bihar, ²Vardhman Institute of Medical Sciences, Pavapuri, Bihar, ³Patna Dental College and Hospital, Patna, Bihar, ^{4,5}Buddha Institute of Dental Sciences and Hospital, Patna, Bihar, India

*Corresponding Author: Vikas Vaibhav

Email: sky20083@gmail.com

Abstract

Introduction: The elderly population of India is most neglected of providing dental treatment, reason being their unawareness and other psychosocial problems. The purpose of this study was to assess the knowledge and attitude towards replacement of teeth among aged patients.

Materials and Methods: A hospital based survey was done on 150 randomly selected elderly patients who reported to the department of Dentistry. A self designed questionnaire was prepared to enter the required data along with clinical examination of patient.

Results: Majority of patients were willing for rehabilitation just to fulfill the requirement of mastication. Esthetics and phonetics part was highly neglected. Patient compliance towards acceptance of prostheses was increased after the motivational program.

Conclusion: Prosthodontic outreach programs are needed to spread dental needs and practices among general ageing population specially belonging to rural areas.

Keywords: Elderly, Prosthodontic, Questionnaire, Rehabilitation.

Introduction

The loss of natural teeth should always be considered as general health issue as it influence the person's functional, esthetic, and other behavioral status.¹ Teeth play a prime role in the preservation of a positive self-esteem of a person. Not only the personal behavior but the social activities can also be disrupted by the absence of teeth. To become edentulous apart from the diseased part, other factors also has strong influence like the attitude, behavior and knowledge of the concerned subject.2 The elderly population of India is most neglected of providing dental treatment, reason being their unawareness and other psychosocial problems.3 In many countries, decrease in number of edentulous patients and increase in number of people retaining teeth for a much longer time results from several integrated and educational programs.⁴ Enhancement of knowledge regarding prosthodontic treatment which is basically concerned with the replacement of missing teeth and restoring oral function further increase the acceptance of prostheses.^{5,6} The present study was done to assess the knowledge of prosthodontic rehabilitation and attitude towards replacement of teeth among aged patients.

Materials and Methods

A present survey was conducted on 150 randomly selected elderly patients who reported to the OPD of Department of Dentistry, Patna Medical College. A self designed questionnaire was prepared to enter the required data from patients who were willing to participate in the study with full consent. It consisted of part A and B, Part A for general information regarding patient; Part B started with patient's chief complaint in his/ her own words followed by questions to assess his knowledge and attitude towards Prosthodontic needs. A complete clinical examination of patient was done before filling the form. All the selected participants were completely edentulous with age more than 50 years.

Results

Table 1 depicts the number and percentage of general information of the study group.

Table 1: Part A questionnaire results

Age:	50-60yrs- 78 (52%)	Education:	Illiterate- 85 (56.67%)
	60-70yrs- 52 (34.6%)		Primary education- 18 (12%)
	>70yrs- 20 (13.33%)		Till Xth-17 (11.33%)
Gender:	Male- 108 (72%)		Till XIIth-20 (13.33%)
	Female- 42 (28%)		Graduate-10 (6.66%)
			Postgraduate- Nil
Address:	Rural- 121 (80.66%)	Income:	No source- 64 (42.66%)
	Urban- 29 (19.33%)		<5,000 – 39 (26%)
			5000-10,000- 28(18.66%)
			10,000-30,000- 08 (5.33%)
			>30,000- 11 (7.33%)

As per our result maximum patients were male in the age range of 50-60 years. Rural population visited frequently for prosthodontic need and among them more than 50% were illiterate or less than primary education. Similarly, low socioeconomic group seems to be effected more than the other groups.

Table 2 analyse the data of Part B questionnaire calculated as number and percentage.

Table 2: Part B questionnaire results

How long have the teeth been missing?	Recently- 28 (18.66%)
	More than a year- 86 (57.33%)
	More than 5 year- 36 (24%)
Are you aware that missing teeth have to be replaced?	Yes- 92(61.33%)
	No- 58 (38.66%)
If Yes, replacement is needed for (out of 92):	
a. Esthetic- 10 (10.86%)	
b. Phonetics- 26 (28.26%)	
c. Mastication- 56 (60.87%)	
d. Combination (more than one option)- 16 (17.4%)	
Did you get them replaced before?	Yes- 36 (24%)
	No- 114 (76%)
Reason for not being replaced (out of 114):	
a. Not needed- 18 (15.78%)	
b. Inadequate Knowledge- 58 (50.87%)	
c. Financial Constraints- 28 (24.56%)	
d. No support- 10 (8.77%)	
Where would you prefer to go for replacement of missing teeth?	
a. Private Dental Clinic- 14 (9.33%)	
b. Government Hospital- 116 (77.33%)	
c. Dental College- 05 (3.33%)	
d. Others- 15 (10%)	

Our study shows that predominately patients were without teeth since more than a year. Majority of patients were willing for rehabilitation just to fulfill the requirement of mastication. Esthetics and phonetics part was highly neglected. Inadequate knowledge was the prime reason for not undergoing rehabilitation followed by financial constraints. Government hospital was suggested as a best place to replace teeth. Patient compliance towards acceptance of prostheses was increased after the motivational program.

Discussion

Like the general health, oral health is also necessary for general well being of patient. Replacement of absent teeth is must to maintain oral functions. Awareness among general population is necessary to maintain overall oral health of society. Although government is taking several steps in expanding dental care facilities even in villages, but unfortunately we still lacking behind in this regard, the reason may be high degree of illiteracy and financial constraints of persons belonging to rural areas. 8

As per our results maximum patients were male in the age range of 50-60 years which is in concordance with other study of Dental College, Belgaum. The reason proposed was dental health is underprivileged among geriatric patients, although they extensively use medical facilities.² More than 80% of patient visited were belonging to rural areas for prosthodontic need as dental facilities are not provided at the village health centers. Among them more than 50% were

illiterate or less than primary education and only about 20% were with some degree. Similarly, low socio-economic group seems to be effected more than the other groups.

Our study shows that predominately patients (more than 75%) were without teeth since more than a year. 24% were without teeth and any denture for more than 5 years, which clearly indicates the need of awareness strategies for old aged patients belonging to rural areas. Majority of patients (60%) were willing for rehabilitation just to fulfill the requirement of mastication. Esthetics and phonetics part was highly neglected. Similar results were also obtained by Shigli and Rastogi et al.^{5,7} This also indicates that geriatric population gives less priority to esthetics and more importance to rehabilitation of function i.e. mastication. Only 24% were previously got denture that too from local dental shop but not aware of their exact degree and were not satisfy with the quality. 76% were the first time denture wearers. Among these 76% patients the reason for not being replaced was inadequate knowledge (50%) followed by financial constraints (24%). Even 15 % were in favor that it was not needed and 8% were not having any kind of family support which is the matter of concern as geriatric patient should get necessary dental facilities at nearby health centers. 77% of patients suggested Government hospital as a best place to replace teeth. Raj et al in their study also confirm that patients were interested in taking dental treatment from Dental College as compared to private clinics due to financial issues.⁶ Patient compliance towards

acceptance of prostheses was increased after the motivational program.

Further studies are needed to address dental issues among geriatric patients and who have limited financial resources. Government should also put insights into such issues noticed by the studies reported in literature. Dentists should also influence and provide knowledge to patients to influence their attitudes towards prosthodontic rehabilitation.

Conclusion

Majority primary health care centers in rural areas of India are devoid of any assistance in dental treatment. For the same reason people are unaware of dental health importance and treatment options. Prosthodontic outreach programs are needed to spread dental needs and practices among general ageing population specially belonging to rural areas.

Source of Funding

None.

Conflict of Interest

None

References

 Kumar K, Choudhary S, Singh R, Yadav SK, Kedia NB, Singh AK. Awareness and perception of patients towards dental implants- A hospital based survey. *Indian J Conserv Endod*. 2019;4(4):116-20.

- Shigli K, Hebbal M, Angadi GS. Attitudes towards replacement of teeth among patients at the Institute of Dental Sciences, Belgaum, India. J Dent Educ. 2007;71(11):1467-75.
- 3. Parlani S, Tripathi A, Singh SV. Increasing the prosthodontic awareness of an aging Indian rural population. *Indian J Dent Res.* 2011;22:367-70.
- 4. Carlsson GE, Omar R. Trends in prosthodontics. *Med Princ Pract.* 2006;15(3):167-79.
- Shigli K, Angadi GS, Hebbal M. Knowledge of prosthodontic treatment among denture wearers and non denture wearers attending a dental institute in India: a survey report. Gerodontol 2007;24(4):211-6.
- Raj N, Reddy N, Japatti S, Thomas M, Uthappa R. Knowledge, Attitudes towards Prosthodontics Rehabilitation and Utilization of Dental Services among Songadh and Amargadh Population. J Dent Med Med Sci. 2004;4(1):1-6.
- Rastogi I, Mahendra A, Anand Y, Mishra SS. Assessment of prosthodontic awareness and edentulism in populations of Lucknow-A clinical survey. *Int J Dent Oral Health*. 2017;3:23-30.
- Singh SV, Tripathi A, Akbar Z, Chandra S, Tripathi A. Prevalence of dental myths, oral hygiene methods and tobacco habits in an ageing North Indian rural population. *Gerodontol*. 2012;29:e53–e6.

How to cite: Kumar K, Vaibhav V, Raj R, Kedia NB, Singh AK, Singh R. Assessment of elderly patient's awareness towards prosthodontic rehabilitation and attitude towards utilization of services- A hospital based questionnaire study. *IP Ann Prosthodont Restor Dent.* 2020;6(1):31-3.