

## A Clinical Survey to Determine Treatment Needs in Prosthodontic Patients

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### Abstract

*Introduction:* Knowing treatment needs of the patient is important for the Dentist. Loss of teeth results in significant disabilities which profoundly disturbs functions of stomatognathic system, as mastication, phonetics and esthetics. *Aim and objectives:* This survey was conducted to determine the treatment needs of the patients in Prosthodontics. *Materials and method:* 500 subjects above 20 years in 2 months. *Results:* In different genders and ages according to education levels people are aware of needs and their options. *Discussion:* Older people make extensive use of medical facilities but they underuse dental facilities. Mastication is the prime concern. *Conclusion:* There is a high unmet need of Prosthodontic treatment among populations. The patients' expectations can be sought, suitable treatment planned and executed.

**Keywords:** Survey; Dental; Need.

### Introduction

De Van said, "Meet the mind of the patient, before you meet the mouth of the patient." Clinical skills and fulfillment of patient's needs are inseparable so before starting the patient work it is vital to determine what patient has in mind and by knowing this we can truly fulfill our duty by providing successful prosthesis.

The term 'need' is commonly used to describe the type of treatment that dentists judge their patients ought to have, whilst 'demand' refers to the treatment requested by the patients themselves<sup>1</sup> Loose teeth, edentulism or ill-fitting dentures may preclude eating favorite foods as

well as limit intake of favorite foods.<sup>4</sup> Patients' self-perceived needs, expressed desires and expectation are essential parts of an evidence-based model for Prosthodontic treatment planning.<sup>7</sup>

### Aim

To conduct clinical survey using questionnaire and basic diagnostic tools to assess needs and desires of people for treatment of edentulous patients.

### Objectives

To determine expectations of patients. To evaluate reasons for unfulfillment of Prosthodontic needs so that adequate measures were taken.



### Clinical Relevance

Most population do not convey to Prosthodontist about their needs. Once they do so, Prosthodontist can use different treatment options successfully.

### Materials and Methods

Selection and size of samples—250 subjects who were above 20 years and who reported to Prosthodontics dental OPD for prosthesis of missing teeth in 2 months were target of cross-sectional study. These patients were randomly selected. A questionnaire was developed by us in department.

Also patient's consent was taken. Diagnostic tools (mouth mirror, straight probe, explorer) were used. Mouth mask and disposable gloves were used for examination. Questionnaire and consent form

### Results

Table 1 shows the distribution of the clinical study sample to Determine Treatment Needs in

Prosthodontic Patients.

### Discussion

Oral diseases are progressive and cumulative. These become more complex over time.<sup>4</sup>

Premature loss of permanent teeth leads to stomatognathic system disability, loss of masticatory functions, and alterations in speech and face esthetics.<sup>5</sup> Oral health is closely related to several aspects of patients' general health and well being.<sup>6</sup> Thus tooth loss can lead to substantial impacts on quality of life.<sup>7</sup>

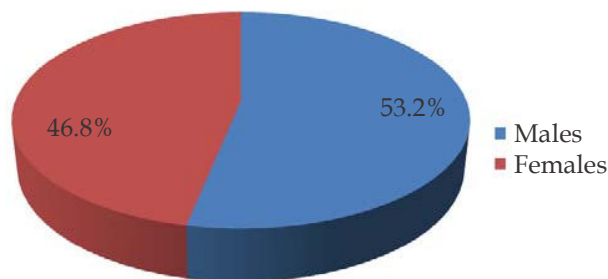
De Van stated that "The patient's fundamental need is the continued preservation of what remains of his chewing apparatus rather than the meticulous restoration of what is missing, since what is lost is in a sense irretrievably lost." Planning of treatment is essential for good prognosis. It also helps to prepare the patients psychologically for the type of treatment they will receive without any unrealistic imagination of the treatment.<sup>8</sup>

It was seen in this study that 53.2% were males and females were 46.8%. Of these, 34% were

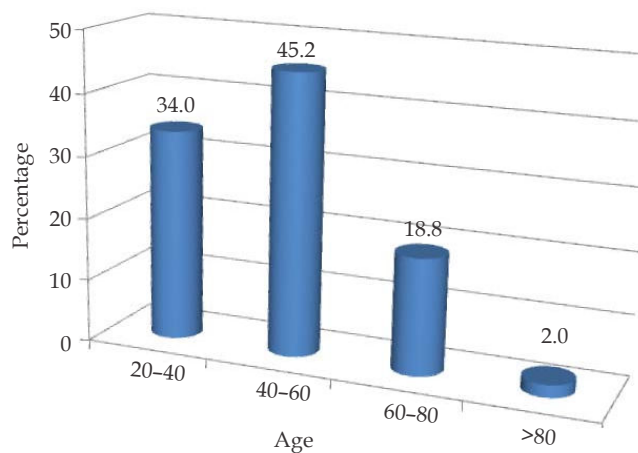
**Table 1:** shows the distribution of the clinical study sample to Determine Treatment Needs in Prosthodontic Patients

		Number	Percentage (%)	
<b>1. Gender</b>				
	Males	133	53.2	
	Females	117	46.8	
<b>2. Age (Yrs)</b>				
	20-40	85	34	
	40-60	113	45.2	
	60-80	47	18.8	
	>80	5	2	
<b>3. Socioeconomic status</b>				
	Poor	151	60.4	
	Middle	70	28	
	High	29	11.6	
<b>4. Occupation</b>	<b>Males</b>	<b>Females</b>	<b>Total number</b>	
	Labor class	20	60	24
	Farmer	28	50	20
	Sweeper	20	41	16.4
	Small gen.merchant	37	37	14.8
	Housewife		33	13.2
	Business	7	16	6.4
	Service	6	13	5.2
<b>5. Education</b>				
	Illiterate	50	117	46.8
	Till primary	36	57	22.8

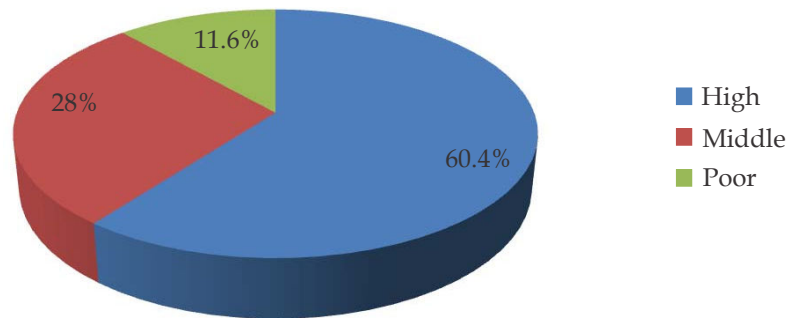
Till high school	21	18	39	15.6
Inter and above	26	11	37	14.8
<b>6. Edentulism</b>			<b>Number</b>	<b>Percentage</b>
Edentulous			184	73.6
Partially edentulous			66	26.4
<b>7. Needs</b>				
Masticaton			131	52.4
Esthetics and mastication			68	27.2
Esthetics, mastication and phonetics			28	11.2
Esthetics			12	4.8
Comfort			11	4.4
<b>8. Desired treatment</b>				
Complete denture			184	73.6
Removable partial denture			48	19.2
Fixed partial denture			18	7.2
<b>9. Treatment explained by clinician</b>				
Implants			155	62
Special denture			25	10
Fixed partial denture			70	28
<b>10. Final treatment opted by patients</b>				
Complete denture			142	56.8
Removable partial denture			70	28
Fixed partial denture			31	12.4
Special dentures			3	1.2
Implants			4	1.6



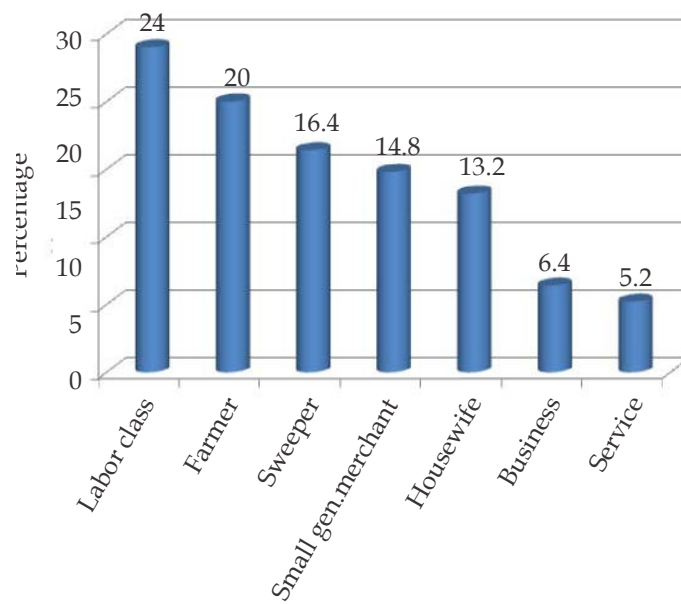
Graph 1: Genderwise distribution of subjects enrolled in the study.



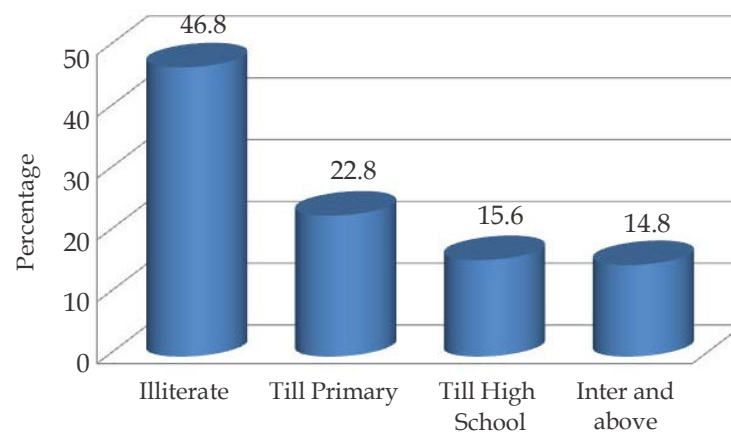
Graph 2: Age-wise distribution of subjects enrolled in the study.



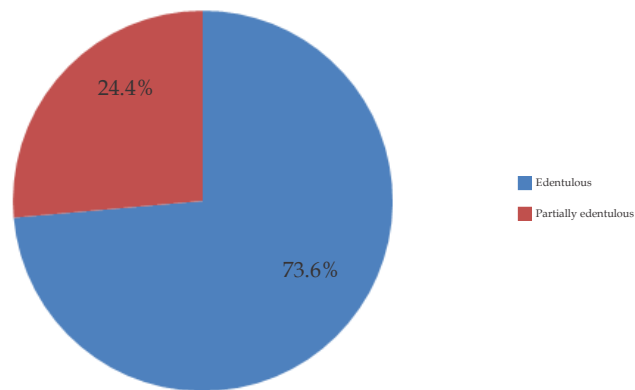
**Graph 3:** Distribution of subjects according to socioeconomic status.



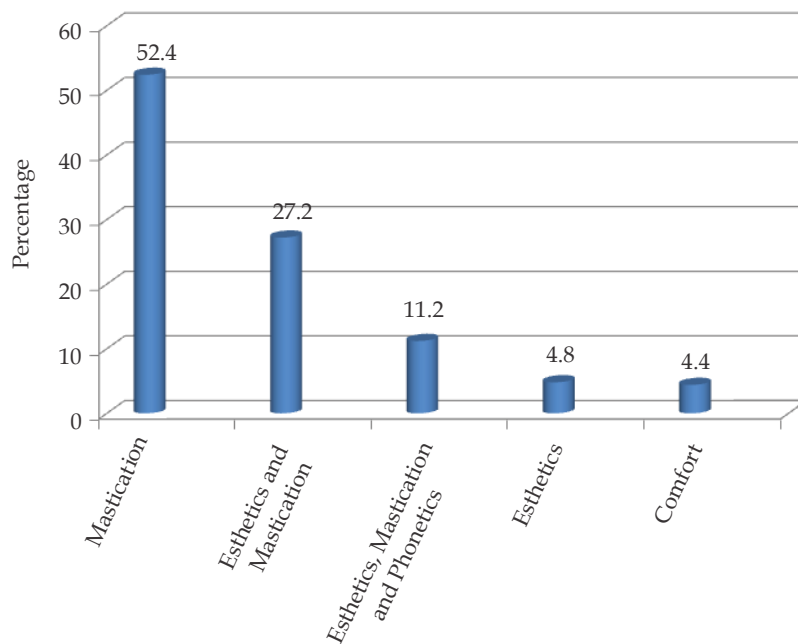
**Graph 4:** Distribution of subjects according to occupation.



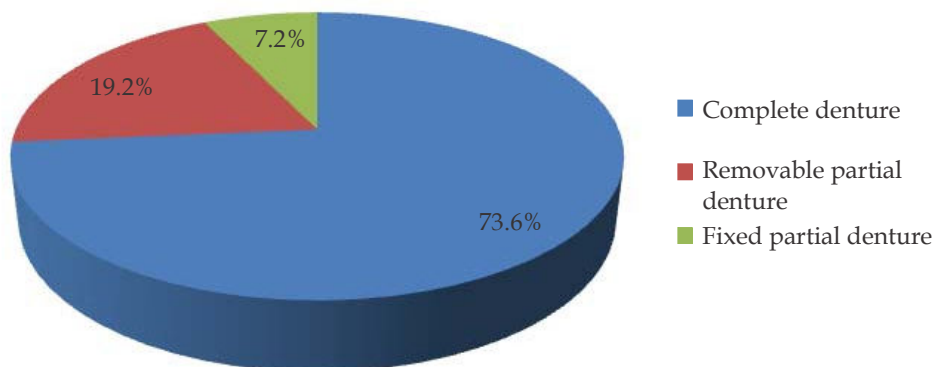
**Graph 5:** Distribution of subjects according to education.



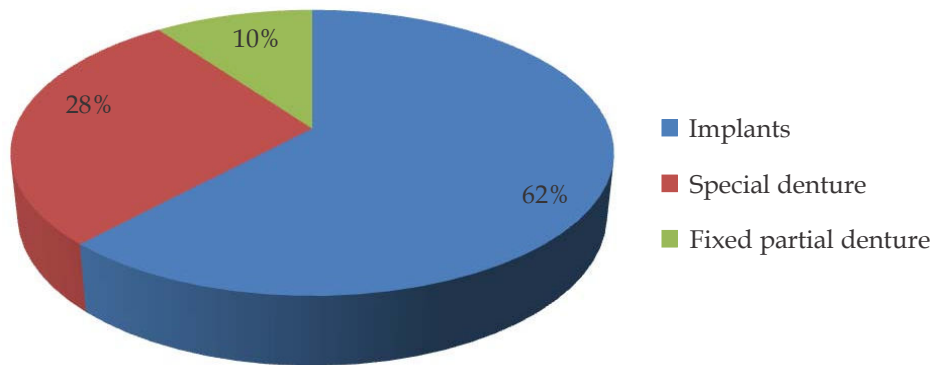
Graph 6: Distribution of subjects according to edentulism.



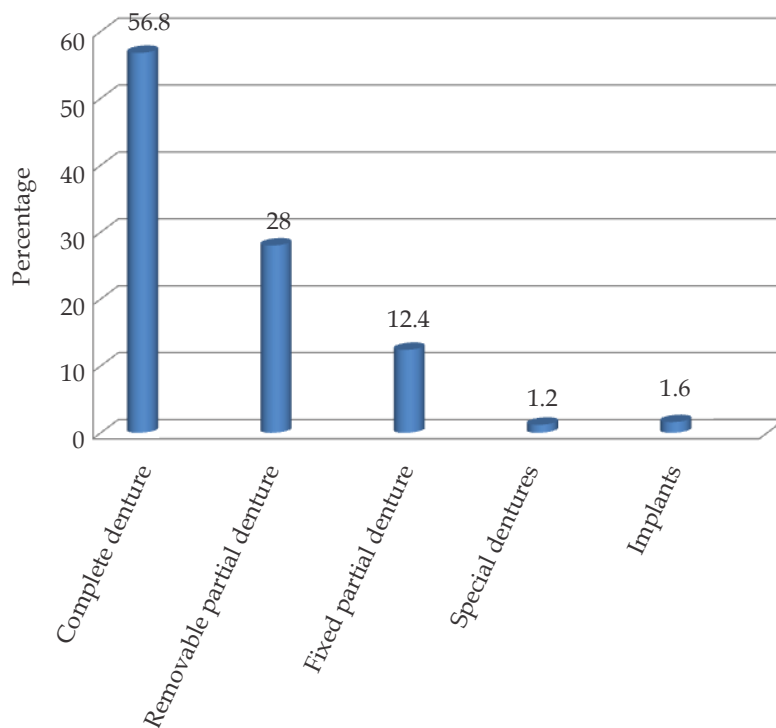
Graph 7: Distribution of subjects according to needs.



Graph 8: Distribution of subjects according to desired treatment.



Graph 9: Distribution of subjects according to treatment explained by clinician.



Graph 10: Distribution of subjects according to treatment opted by patients

between the ages of 20–40 years, between 40–60 years were 45.2%, in between 60–80 years were 18.8% and more than 80 years were 2% subjects. For older people, aging alone is not responsible for the deterioration of their oral health, several other factors such as multiple chronic diseases, socioeconomic factors, lack of dental facilities and psychological factors such as depression and isolation, because of gradual loss of spouse and friends and feeling of being unwanted by family members, leading to negligence of personnel and oral hygiene and health are also involved.<sup>9</sup> The Geriodontist (generally the Prosthodontist) is in a

strategic position to evaluate, correct and reduce the number of prosthetic failures in aging patients by a thorough understanding of the various oral changes occurring during this period.<sup>10</sup>

Owing to the monthly income, the socioeconomic status was seen as the poor were 60.4%, the middle were 28% and high were 11.6%. The occupations of the people were that the labor class were 28.3%, farmers were 23.5%, sweepers were 19.2%, small general merchants were 17.4%, housewives were 15.5%, businessmen were 7.5% and servicemen were 6.1%. According to the education, illiterate people were 46.8%, those educated till primary

level were 22.8%, people with education till high school were 15.6% and higher education was seen in 14.8%. The edentulous people were 184 and partially edentulous were 66. The treatment desired by the patient was that complete dentures were desired by 73.6%, acrylic removable partial dentures were wished by 19.2% and fixed partial dentures were demanded by 7.2%. Perceived needs are important determinants in assessing the requirements for prosthetic replacement of missing teeth.<sup>11</sup>

It was seen that majority patients were poor, labor class and illiterate. These patients had maximum edentulous and partially edentulous state. Therefore they expressed willingness for conventional acrylic complete and removable partial dentures. The study by Eklund S A and Burt and Gilbert G A et al. also found the prosthetic status to be better among the subjects in the higher classes.<sup>12</sup> An inverse relationship was observed between the socioeconomic status and prosthetic need.<sup>13</sup> This is in agreement with study by Marcus et al. Those who have attained higher levels of education are more apt to have greater financial opportunity and place a higher priority on dental health.

Among the needs, mastication was the chief need in 52.4%, esthetics and mastication was needed in 27.2%, esthetics, mastication and phonetics was needed in 11.2%, esthetics was desired by 4.8% and comfort in 4.4%. Similar findings have been given as by Annette Thomas-Weintraub, who stated that masticatory difficulty was the most frequently voiced complaint.<sup>14</sup>

The clinician explained different treatment options to the patients. Implants were suggested to 62%, fixed partial dentures were told to 28% and special dentures explained to 10%. The final treatment that was opted by the patient after being told about various options by the clinician were that complete denture were opted by 56.8%, acrylic removable partial dentures were agreed to by 28%, fixed partial dentures were the choice of 12.4%, implants were agreeable with 1.6% and special dentures were finalized by 1.2%. It can be seen that though the clinician suggested better options to the patient, majority of them chose to conventional acrylic prosthesis. It could be due to the low economic state, education, awareness, age and ability to afford extra visits to the institution. However demand for prosthetic replacement by patients was much less than their actual need also the clinical possibilities to prosthetic replacement for each patient according to the missing teeth were

significantly different from patient desire. It has to be realized that the decision of whether or not to undergo prosthodontic treatment belongs to the patient, who when properly educated about the dental aspects of the decision can best weigh his or her own priorities.

## Conclusion

Prosthodontists should be able to understand a patient's motive in seeking Prosthodontic care and identify these before starting the treatment. Communication with the patient before initiating treatment and devoting time with the patient prior to clinical work will help us attend to the actual need of the patient well. Also the unmet prosthetic treatment need should be met to rehabilitate needy people so that their disability may be limited.

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