



Effect of Socioeconomic status on Felt Needs among completely edentulous patients regarding conventional complete dentures

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Abstract:

The purpose of this study was to determine the effect of socioeconomic status of completely edentulous patients on felt need through a Questionnaire based survey. The Present study was conducted in region of Delhi. 1500 completely edentulous patients with age group of 63-74 yrs who report to Dental OPD first time are taken for the study from the period of January 2015 till January 2016. The sample questionnaire to determine felt needs, and expectation of patient from conventional complete denture therapy was formulated. Results were statistically evaluated. It is found that out of 1500 patients, patients who wanted Replacement of teeth was highest for Combined reasons followed by Appearance, Speech, Function and Comfort. This article concluded that Socio economic status of patients have definite effect on their Needs from the treatment.

Key words: Appearance, Speech, Function and Comfort, elderly patients

Introduction:

There is growing population of elderly patients in India. Although the elderly population in India is 7.4% of total population, but this is expected to increase^[8,25,29] up to 19% by the year 2025. Delhi is capital of India and has population of 18 million people (Delhi Census-2011).

Perception and attitude of patients towards complete denture treatment is changing in present scenario. There is a difference in decision making abilities of upper and lower socioeconomic status patients^[17,19,21,22,30-32]. Moreover sex of the patient also plays the vital role. Female patients have certain preferences for the treatments that male patients may not have and vice-versa. Dentist should also have idea regarding needs as felt by

completely edentulous patients from the complete denture therapy.

The purpose of this study was to assess the effect of socioeconomic status of patients on their Felt needs from the complete denture therapy through the Questionnaire based survey^[1,13]. This will help dentist to formulate treatment planning fulfilling needs and expectation of the patient in a better way.

Material and Method

The Present study was conducted in Delhi region. The nature of study was Observation and Cross-sectional. About 1500 completely edentulous patients^[24] with age group of 63-74 yrs who report to Dental OPDs of Multispecialty Dental Centres for the first time are taken for the study from the period of January



2015 till January 2016. Patients were distributed in following age intervals:

Age interval (years)	63-65	66 - 68	69 - 71	72-74
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The Data collection tool was a Questionnaire. The sample questionnaire to determine Felt needs and expectation of patient was formulated .The questionnaire was tested on a few patients to test validity and reliability of the questions through pilot study. The examiners for the patients[one for each centre] were trained for asking questions and recording the observations to minimize error in filling questionnaire which may arise due to Inter-examiner variability. Confidence level of the study

was set at 95%. Margin of error of the study was 5% with response distribution of 50%.

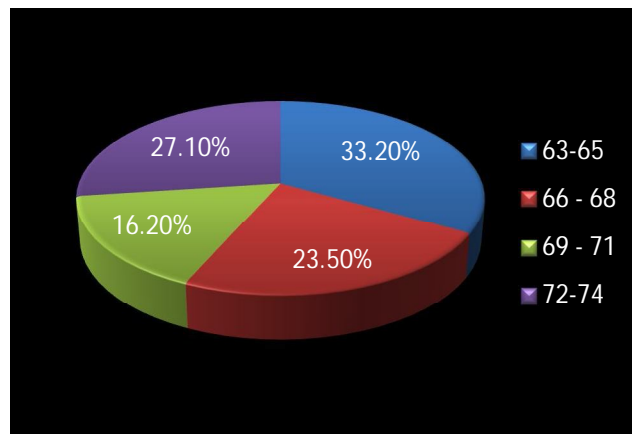
Results:

Total of 1500 patients in age group of 63 – 74 years was considered for the Study. Maximum 33.2% of Patients (498) were between 63-65 Years. Minimum of 16.2% (243) Patients were between 69-71 years. 58% (870) of patients for the study were males and 42% (630) of patients were females.[Table 1 and Figure 1]

Table 1 : % Frequency Distribution by Age of Patients

Age (years)	Frequency	Frequency (%)	Mean	SD	SEM
63-65	498	33.2	68.74	3.525	.091
66 - 68	353	23.5			
69 - 71	243	16.2			
72-74	406	27.1			
Total	1500	100.0			

Figure.1: Patients by Age





Maximum % [Number] of Males was in Upper class 55% [478] and minimum was in Lower class 3% [27]. % [Number] of Females in was also maximum in Upper class 47.9% [302] and minimum in Lower class 2.8% [18]. [Table 2]

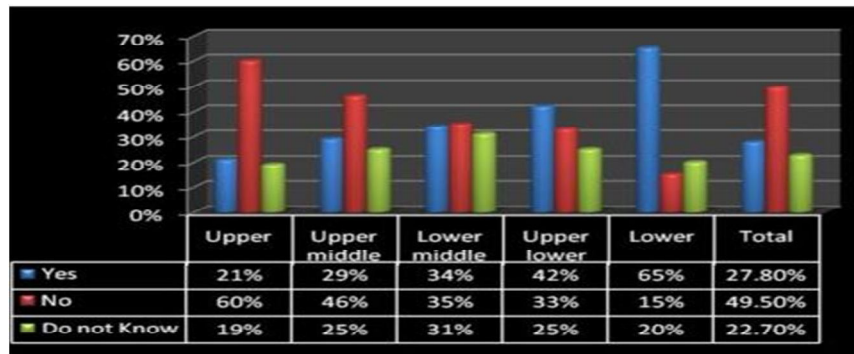
Table 2 : Sex Distribution of Patients based on Socioeconomic status

Sex	Upper		Upper middle		Lower middle		Upper lower		Lower	Total		
	No.	%	No.	%	No.	%	No.	%				
M	478	55	148	17	130	15	87	10	27	3	870	58
F	302	47.9	152	24.2	110	17.5	48	7.6	18	2.8	630	42

[$\chi^2 = 16.522$, $df = 4$, $p = 0.0024$, So, $p < 0.05$ Significant].

Values are expressed in numbers, χ^2 [Standard deviation], df [Degree in freedom] and p .

Figure-2



Percentage [Number] of Upper class patients was highest 52% [780] and Lowest in Lower class and 3% [45]. [Table 3]

Table 3: Distribution of patients based on their Socioeconomic status

Socioeconomic class	Number	Per cent
Upper	780	52
Upper middle	300	20
Lower middle	240	16
Upper Lower	135	9
Lower	45	3



Maximum number of Patients opt for Complete denture therapy because of Combined reasons[56%] and least go for Function[7.6%] in all classes.% of Patients going for Appearance was maximum in Upper class [20%] and least in Lower middle class [13%].% of Patients going for Speech was maximum in Upper

Lower class [15%] and least in Upper class [8%].% of Patients going for Comfort was maximum in Lower middle class [14%] and least in Upper class [7%]. % of Patients going for Function was maximum in Lower class [21%] and least in Upper [5%]. [Table 4 and Figure 2]

Table 4: Distribution of Patients based on their response on Reasons for replacement of Teeth

S. no	Socio-economic Group	N	Appearance	Speech	Comfort	Function	Combined	Mean Rank	X ² Variate	df	P value
1.	Upper	780	156	62	55	39	468	765.53	3.615	4	.361
2	Upper Middle	300	56	28	27	24	165	741.85			
3	Lower middle	240	31	29	34	22	124	739.25			
4	Upper lower	135	14	21	16	19	65	728.12			
5	Lower	45	7	5	6	9	18	674.86			

Discussion:

There has been a few studies regarding Awareness^{11-12,16}, Expectation and Satisfaction^{2-3,5,7,9,13-15,19,28} Needs^{10,16-17} for the Patients for Complete dentures. But a study based on Indian Population that comprises all abovementioned factors and has large sample size to predict outcome with substantial significance was lacking. Delhi was chosen for place of study as it is the capital of India and sample size of 1500 patient with age group of 63-74 was chosen seeing 18 million Population in Delhi and out of which 19% is edentulous^{8, 10,24-25}.

Socioeconomic status of patients was taken in to consideration for classifying patients for the study as it had great impact on all variables used for the study^{27,30-32}. [Expectation and Need].A

sample Questionnaire was used for study¹. Questions based on expectation and Needs of the patients were asked. Most common questions that were used in earlier studies were also taken in to consideration.

Delhi is metropolitan city mainly comprising of Urban and educated class population .Upper middle ,Lower middle and Upper lower class male and female patients % were in decreasing order respectively .It is expected as patients were of Higher income group in Delhi. Only lesser % [3% of males and 2.8% of females]were of lower class who sought for the treatment.

52% of Patients were of Upper class .It is expected as study was conducted in Cosmopolitan city. Only 3% of patients were of lower class.% of Upper middle, Lower middle and Upper Lower were



20%,16% and 9% respectively. This is in accordance with expected trend of population in Delhi.

Maximum % of population in all socioeconomic group wanted complete denture treatment because of combined factors of Appearance, speech, comfort and function. This is in co-relation with earlier studies by Suresh S and Swati S¹⁵. This is expected as patients go for complete denture therapy because of more than one reasons. After combined reasons, appearance is second most important reason for the treatment. This is expected of Upper class[20%], Upper middle[18%] but even lower middle[13%] and Lower [15%] class has same reason for treatment. This might be explained because of increase awareness of materialistic things and peer pressure of looking good in society especially in cosmopolitan cities like Delhi. Esthetic becomes motivating factor for the patients to seek treatment. Moreover % of Lower class population studied was less to be representative of the group. Function becomes other motivating factor for Lower and Upper Lower class[21% and 15% respectively]. This is can be explained by the fact Lower and Upper Lower class dwell in areas or work in profiles where Function mattered the most. They were more of worker class group. Speech ,comfort are secondary factors to motivating factors for seeking treatment.

Surprisingly only 7% of upper class and 9% of upper middle class opted dentures for comfort. It was trend breaker and no specific reason can be given for this. Total 9.2% of patients opted for dentures for comfort.

Conclusion:

1500 completely edentulous patients were evaluated through questionnaire for their expectation and Felt needs regarding complete dentures.

Majority of patients who seek complete denture therapy were from Upper class in metropolitan city like Delhi. Larger % of all socioeconomic classes patients seek treatment because of combined reasons of Appearance, Speech ,Comfort and Function. After Combined reason, Esthetic becomes motivating factor for seeking Treatment. Function also becomes motivating factor for Lower and Upper Lower classes. The Dentist should believe that majority of patients [be it of any socioeconomic group] have higher expectation from treatment. Therefore the dentist should communicate with the patients in such a manner so that they have realistic expectation from treatment and do not get disappointed from outcome of treatment.

Dentist should fabricate complete denture considering that it should fulfill all aspects of outcome of treatment like Appearance, Speech, Comfort and Function as maximum number of patients in all classes go for combined reasons for seeking complete denture therapy. Dentist should also not undermine the importance of Appearance and function especially in Lower middle and Lower classes.

Thus ,it is concluded that socioeconomic status of patients have definite effect on their Needs from the treatment.

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