

Quality Of Life Of Patients Undergone Full Mouth Implant Supported Prosthesis- A Retrospective Study

Research Article

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Abstract

Background: It has been found that changes in oral health negatively affects a person's quality of life. This can also be affected by satisfaction or dissatisfaction with an oral disease. Therefore, the aim of the current study was to assess the QoL of patients who have undergone full mouth implant supported rehabilitation.

Materials and Methods: This was a retrospective study of 4 years follow-up in subjects with implant-supported prosthesis. 21 subjects who met with the criteria were allotted in the study, out of which, 2 subjects were dropped out of the study due to no response. Chewing efficiency, Cleaning efficiency, Speaking efficiency, Stability and Satisfaction were assessed. Descriptive statistics based VAS, LIKERT'S satisfaction scale, OH QOL-questionnaire.

Result: There was a significant improvement in overall satisfaction, stability, chewing efficiency, speaking efficiency as well as cleaning efficiency with usage (after a short period of adaptation).

Conclusion: Within the limitations of the present study, it can be concluded that fixed implant hybrid prosthesis appears to be a success amongst patients and also, provides an improved QoL thereby, improving the physical, psychological and social well-being of the patient.

Keywords: QoL; Implant Supported Prosthesis; OhQoL Questionnaire.

Introduction

Edentulism, defined as the complete loss of all dentition, is a worldwide phenomenon. According to the criteria of the World Health Organization, edentulous patients are considered to be physically disabled and handicapped due their inability to chew and speak properly [1, 2]. This could be due to various reasons such as dental caries, periodontal diseases, trauma, and oral cancer.

Although public health programs and technology development have contributed to improved oral hygiene, tooth loss remains a reality [3].

Toothloss and these of full dentures lead to a significant reduction in chewability and efficiency [4]. Moreover, there is inevitably the possibility that problems arise after the insertion of the complete denture. These problems can be temporary and essentially ignored by the patient, or they can be so severe that the patient cannot tolerate dentures, such as, atrophic mucosa, poor denture stability, patient adaptational factors [5].

Owing to the limitations of conventional prosthetic treatments, implant-borne prosthesis are preferred now-a-days due to their superior stability, retention, masticatory function and phonetics. In addition, it also improves physical, psychological and social

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Received: April 08, 2021

Accepted: June 16, 2021

Published: July 08, 2021

Citation: Shreyam Barthwal, Subhasree R, Thiyaneswaran N. Quality Of Life Of Patients Undergone Full Mouth Implant Supported Prosthesis- A Retrospective Study. *Int J Dentistry Oral Sci.* 2021;8(7):3151-3154. doi: <http://dx.doi.org/10.19070/2377-8075-21000641>

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well-being of the patient, in view of that fact, this is considered the gold standard for the treatment of edentulism [6, 7]. Significant literature is available on therapy with implant-supported prostheses and has been largely studied for the oral rehabilitation of edentulous patients [8].

The satisfaction with treatment result and success is multifactorial, and is often not related to objective criteria of the treatment need. The patient's perception of a successful treatment outcome differs from that of the dentist. Avoiding patients' expectations on the part of professionals can additionally contribute to oral rehabilitation failure and produce psychosocial responses, such as anxiety, insecurity, low self-esteem and introversion [9]. According to the World Health Organization (WHO), QoL is the perception, on the part of individuals or groups, regarding the satisfaction of their own needs and what is not denied in propitious for their happiness [10]. However, due to its subjectivity, complexity and individual perception, it is difficult to assess the QoL.

When assessing the QoL in relation to oral health, it has been found that changes in oral health negatively affect a person's quality of life. This can also be affected by satisfaction or dissatisfaction with an oral disease [11]. Therefore, the aim of the current study was to assess the QoL of patients who have undergone full mouth implant supported rehabilitation.

Materials And Methods

Study design

This was a retrospective study of 4 years follow up in subjects with implant-supported prosthesis. The data was retrieved from the archived database and subjects were followed up after 4 years in order to evaluate clinical as well as satisfaction parameters.

Sample size

A sample size of subjects who were treated with implant-supported prosthesis in the time period of 2015 were appointed.

Inclusion criteria

Patients who received a fixed implant hybrid prosthesis

Exclusion criteria

Patients rehabilitated with over dentures and other removable hybrid or telescopic options.

After applying the eligibility criteria, 21 subjects who met with the criterias were allotted in the study, out of which, 2 subjects were dropped out of the study due to no response. The parameters evaluated in the subjects have been mentioned in Table 1.

Statistical analysis

Descriptive statistics-based VAS, LIKERT'S satisfaction scale, OH QOL-questionnaire. The result was interpreted on Microsoft excel sheet.

Results And Discussion

The data was collected and analyzed. It was observed that VAS scale, LIKERT'S satisfaction scale, OH QOL-questionnaire indicated excellent patient satisfaction after the placement of implant supported hybrid prosthesis.

On evaluating the chewing efficiency, it was noted that 90% of the subjects had no difficulty in chewing apart from the 10% who faced difficulty (fig 1). Whereas, on evaluating the speaking efficiency, satisfaction and stability, 95% of the subjects reportedly faced no difficulties (fig 2, fig 3, fig 4). However, only 75% of the subjects got accustomed to efficient cleaning and the rest 25%, faced difficulty (fig 5).

There was a significant improvement in overall satisfaction, stability, chewing efficiency, speaking efficiency as well as cleaning efficiency with usage (after a short period of adaptation).

Table 1. Parameters evaluated.

| Parameters evaluated |
|----------------------|
| Chewing efficiency |
| Cleaning efficiency |
| Speaking efficiency |
| Stability |
| Satisfaction |

Figure 1. pie chart representation of chewing efficiency.

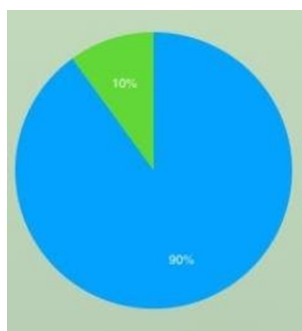
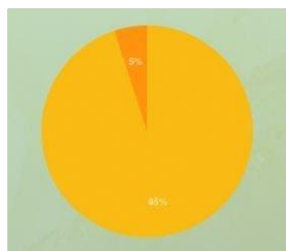
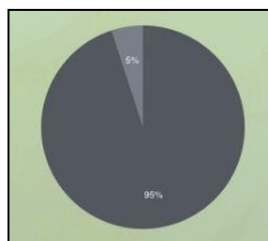
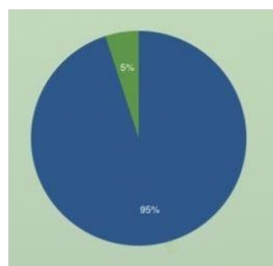
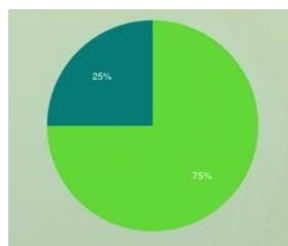


Figure 2. pie chart representation of speaking efficiency.**Figure 3. pie chart representation satisfaction.****Figure 4. pie chart representation of stability.****Figure 5. pie chart representation cleaning efficiency.**

In the current study it was reported that there was a significant improvement in overall satisfaction, stability, chewing efficiency, speaking efficiency as well as cleaning efficiency.

These findings were in agreement with the study reported by Costa et al wherein the patients presented a high level of quality of life, regardless of age, duration of use and the type of prosthesis used [12]. Similarly, Preciado et al reported screw retained restorations provided significantly better OHRQoL [13]. Other studies have also reported that the use of implants for retention of prostheses promotes significant improvements in quality of life. If the treatment is well planned, it causes less psychological discomfort and also ensures aesthetic stability, retention and satisfaction [14, 15].

Limitations of the present study were that there was no randomization performed. Hence it can be concluded that the patients were selected from a single cohort at a single treatment centre and this could be non representative of the general population. Secondly, it does not account for dropped out patients.

Future scope of the present study would be to add in more parameters such as age, gender, as well as increasing the sociodemographic area.

Within the limitations of the present study, it can be concluded that fixed implant hybrid prosthesis appears to be a success amongst patients and also, provides an improved QoL thereby, improving the physical, psychological and social well-being of the patient.

Acknowledgement And Declarations

We would like to acknowledge the support of Thiyaneswaran N for his constant support and guidance.

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