SMILE PROFILE AND ITS RECONSTRUCTION IN YOUNG INDIVIDUAL - A CASE REPORT

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ABSTRACT

We live in a health and gorgeousness society. In fact since the turn of century the idea that “beautiful is better” have been strapped up. Today’s patient is health oriented, esthetically driven and wants the best cosmetic health care that can be delivered. Smile is the most recognized expression used to convey a sense of temperament and well-being as it is the integral part of this superficial health. The Prosthodontist today plays a vital role in civilizing the smile of an individual. Through this case appearance, the treatment options for various clinical circumstances needing handy and aesthetic reconstruction of spaced, damaged, missing, discolored, malpositioned, anterior teeth will be tinted in a young individual.

INTRODUCTION

In our modern economical society, an attractive appearance often means the difference between the victory and letdown in both our individual and proficient. Charles Reade “Beauty is Power; a smile is its sword". In physiology a smile is a facial expression formed by the flexing the muscles most notably near both ends of the mouth.

Among humans, it’s customarily an expression of pleasure, happiness or amusement but can also be an involuntary expression of anxiety, in which case it can be known as grimace (Solomon, 1999; Morley, 1999; Petti and Tarsitani, 1996).

Components of a Smile

The individual's capability to exhibit a pleasing smile directly depends upon diverse components of smile- that are Lip line, smile line, negative space, smile symmetry, dental and gingival components and occlusal line. All these components produce an aura that contains their conventionality to the rules of structural beauty, the relations existing between the teeth and lips during smile and its harmonious integration in the facial composition.

Reconstruction of a new smile

A new smile- a well-designed smile is an invention of well consolidated efforts accomplished by the accurate diagnosis, methodological treatment planning, use of unconventional materials and techniques. Here the role of esthetic dentistry originates in. Esthetic has been derived from the Greek word as esthesia. Esthetic reshaping is the amendment of the surfaces of the teeth to improve appearance. Esthetic and cosmetic are though dissimilar term but serves the same purpose. In this paper going focused on the role of esthetic in modernization of smile in cases like eradicating stains, repairing fractures, closing spaces and replacing missing ones is done (Kaizer et al., 2008; Tavano et al., 1994; Singer, 1994; Messing, 1995).

Case Report

A 16-year-old girl was referred to the Department of Prosthodontics including crown and bridge, for examination, evaluation and treatment of discolouration, fractures, carious and his missing teeth (figure 1). A detailed medical, dental, and social history was obtained.
He was both self-conscious and unhappy as regard to the appearance of his teeth. Clinical examination revealed that carious and stained upper both central and left lateral incisor and missing upper left lateral incisors. Gross calculus and plaque deposition on all teeth predominately on upper anteriors. Radiographic examination of the patient revealed deep carious lesions in the maxillary right and left central incisors and left maxillary lateral incisor and canine. And right maxillary lateral incisor was missing.

A treatment plan was developed with the following aims: to reduce the reported sensitivity of the teeth related to carious teeth, to restore fractures and to improve the aesthetics. The patient was informed of the diagnosis and all treatment plans were discussed with her and his parents.

**Steps of treatment followed**
- First, root canal treatment was done for maxillary central incisors and composite filling in right central incisor.
- Then, tooth preparation was done for porcelain fused to metal crowns on maxillary incisors right maxillary canine and temporization was done (Figure 2,3).
- The root canal of left maxillary lateral incisor, followed with custom made post placement in maxillary left lateral incisor (Figure 4).
- Tooth preparation was done for porcelain fused to metal crowns of left maxillary lateral incisor and shade matching was then done using Vita Shade Guide (Figure 5)
- Finally porcelain fused to metal bridge was done on right maxillary anteriors and porcelain fused to metal crowns on left maxillary central and lateral incisors (Figure 6,7).

The patient was recalled at 2-month intervals. On recall clinical and radiographic examination revealed no pathology associated with the rehabilitation, and the patient’s aesthetic and functional expectations were satisfied (Figure 8).

**Figure 1. Before treatment**

![Figure 1. Before treatment](image)

**Figure 2. Root canal treatment done on both central incisor and tooth preparation done on left incisors and canine for placement of porcelain fused to metal crowns incisor**

![Figure 2. Root canal treatment done on both central incisor and tooth preparation done on left incisors and canine for placement of porcelain fused to metal crowns incisor](image)

**Figure 3. Temporization done of right canine and both central incisors**

![Figure 3. Temporization done of right canine and both central incisors](image)

**Figure 4. root canal treatment of left lateral incisor followed by custom made post placement on left lateral incisor**

![Figure 4. root canal treatment of left lateral incisor followed by custom made post placement on left lateral incisor](image)
DISCUSSION

Space analysis helps the dentist to measure the amount of space accessible during the treatment planning stage. The concept is to measure the widths of all the teeth and to compare it with space present in the arch. This determines whether the space accessible for restorations and natural teeth is less or more than required (Dorfman, 1995).

Disproportionate spaces may be due to discrepancies in jaw and tooth size, malformed teeth, missing teeth, mal-aligned teeth etc. The space analysis will provide a standard or a frame work within which the esthetic dentist has to plan each renovation (Yilmaz et al., 2008).

Profile analysis

While examining the patient’s profile, the normal profile is raised to as straight orthognathic. Any deviation from this should be chronicled and considered in treatment planning. Examination of the profile could be in the antero-posterior plane or in the vertical plane (McIntyre, 2003).

Computer Analysis

Radiographs and photographic images have been used as an important aid in diagnosis, record keeping, communications and treatment planning. Computer aided technology has broadened the scope of bids as well as enhanced the value of radiographs and photographs in the dental arena. The new intra-oral cameras with digital support and the radio-visiographs are vital tools at the esthetic dental office. These tools used in smile analysis are used in this case as well.

CONCLUSION

In this fluctuating world, the appearance is important. A pleasing is important not only socially and romantically, but also economically, for it has been formed that good-looking people tend to get the better jobs. It is no longer a matter of vanity, but rather a necessity to pay close courtesy to one's appearance not only for the distinct self-confidence but also for the image, he or she portrays to other.

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REFERENCES