



OP-8 구연

A proposal for design of miniscrew assisted TPA in lingual orthodontics

박현상
박현상 치과의원

치열의 부조화를 동반한 상악전돌의 교정치료를 위해 소구치를 발치하면 발치공간의 폐쇄는 이루어져야 하며 상악 전치부 후방견인 시에 고정원의 조절은 매우 중요합니다. 최근에 이러한 문제점을 보완하기 위하여 skeletal anchorage system이 많이 사용되고 있습니다. 골격에 임플란트나 miniscrew 혹은 miniplate를 식립하여 고정원으로 사용하는데, 상악에서 miniplate를 식립하는 것은 외과적인 기술이 miniscrew 보다는 간편하고 miniscrew를 구치부 설측에 식립하는 것도 어렵고 탈락되는 경우에 screw를 재식립하거나 하는 경우도 발생합니다. 그래서 저는 정중구개부위가 골질이 좋고 탈락율도 적고 식립하기가 용이해서 TPA 에 miniscrew를 이용하여 고정원을 보강하는 방법을 사용하게 되었습니다. 여러증례의 임상결과로서는 환자분의 적응이나 치료성고가 좋게 나왔습니다. 상악전치부를 후방견인시에 lever arm을 이용하였고 구치부는 miniscrew assisted TPA를 사용하였습니다. 여러 치료증례를 준비하여 발표하고자 합니다. 여러 교수님들과 선생님들의 증례 case가 많지만 TPA에 miniscrew를 연결해서 사용한 증례는 적은 것 같아 감히 글을 올립니다. 기본 디자인은 아래와 같습니다. miniscrew 위치를 후방에 정하는 것이 역학적으로 좋습니다. 이에 대한 분석이 있습니다.

OP-9 구연

Cephalometric Changes after Long-term Early Treatment with Face Mask and Maxillary Intraoral Appliance Therapy

Prinda Lertpitayakun*, Kuniaki
Miyajima, Ryuzo Kanomi and
Pramod K. Sinha
Thiland Association of
Orthodontists

The purpose of this study was to evaluate the long-term changes of face mask therapy of Class III malocclusions and anterior crossbites in a sample of 25 Japanese subjects compared to 10 untreated Class III samples. This retrospective study followed patients from primary dentition to permanent dentition. Ten boys and 15 girls were selected with the mean age at the start of treatment of 4 years 2 months. All patients were treated with face mask therapy and no other orthodontic appliances. Cephalometric radiographs were taken for all treated subjects at three intervals: before treatment (T0), after treatment (T1), and at posttreatment follow-up (T2). The control samples consisted of 10 untreated Class III children. Six boys and four girls were matched as best as possible with the treated group. Mean age at the start of observation was 3 years 11 months. Cephalometric radiographs were taken periodically for observation. Thirty skeletal and dental measurements were used. Paired t-tests ($p < 0.05$) were performed to compare skeletal and dental changes within groups. Independent t-tests ($p < 0.05$) were used to compare skeletal and dental changes between groups. The early correction of Class III malocclusion with maxillary protraction headgear produced significant skeletal and dentoalveolar changes. The maxilla moved further forward in the treated group. Mandibular growth was similar in both treated and untreated groups. There were no statistically significant differences in the changes from T0 to T1 between females and males in the treated group. There was an improvement in maxillo-mandibular relationship after the face mask therapy. The result was due to the maxillary proclination of upper incisors and