

7th Global Dentists and Pediatric Dentistry Annual Meeting

March 31- April 01, 2016 Valencia, Spain

The use of the erbium yttrium aluminum garnet (2940nm) in a laser-assisted implant therapy: How far we can push the envelope?

Avi Reyhanian

Hadassah University, Israel

The array of available clinical applications for laser assisted dentistry is growing rapidly, with the greater number of applications being for oral surgery. Er:YAG is a laser wavelength which is located in the infrared zone of the electromagnetic spectrum (2940nm), is considered to be extremely safe and is the dominant wavelength in dentistry today. Er:YAG is one of the most suitable wavelengths for bone applications. The presentation will demonstrate the use of the Er:YAG laser in the world of implantology and the advantages vs. conventional treatment methods. My purpose in this presentation is to put some order into the chaotic information surrounding the subject and to provide some answers to the most common and frequent questions I often meet: How far we can go with this technology? Is it just a marketing tool or proven therapy? Where is the line between reality and fantasy? Does the new technology completely replace the conventional methods and if not, at which point do we lay the laser's hand piece down and re-employ the old tools and conventional ways? This lecture will exhibit, beyond any doubts, that Er:YAG laser is very valuable tools for implantology and will show cases studies with 8-year follow-ups, each procedure explained in details including video exhibitions.

avi5000rey@gmail.com

Timing of adolescent growth spurt among children with different skeletal classes

Waqar Jeelani, Mubassar Fida and Attiya Shaikh

The Aga Khan University Hospital, Pakistan

Introduction: Treatment with the growth modification appliances is only successful if commenced at the right stage of adolescent growth spurt. Variations in the timing of adolescent growth spurt can affect the success of the treatment.

Aim: The aim of this study was to compare the mean age of adolescent growth spurt among children with three skeletal classes.

Methods: A cross-sectional study was conducted on the lateral cephalograms of 440 children (203 boys, 237 girls) aged 9-17 years. Subjects were categorized into three skeletal classes (Class I=187, Class II=169, Class III=84) according to the sagittal relationship between maxilla and mandible. The cervical vertebra maturation stages were recorded using Baccetti's method. The mean age at each cervical stage was compared between two genders and among three malocclusion using Mann-Whitney U and Kruskal-Wallis tests, respectively.

Results & Conclusion: The results of the study showed that the pubertal growth peak occurred on average 1.5 years earlier in girls than boys. The mean difference in the age of adolescent growth spurt between Class I and II girls was of 7.5 months ($p=0.026$) and between Class I and III boys was of 10.5 months ($p=0.022$). All boys older than 16.5 years and girls older than 16.0 years were found to be in cervical stage 6. However, timing of completion of the adolescent growth spurt is comparable among three skeletal classes.

wjeelani@gmail.com

Notes: