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O.288 The Le Fort III osteotomy in pediatric patients with OSAS

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Objectives: The Le Fort III osteotomy is the surgical treatment performed in patients with midfacial retrusion sufferent from craniofacial dysostoses such as Crouzon, Apert, Pfeiffer syndromes, etc. In most cases such treatment can correct both clinical and dysfunctional aspects, such as exorbitism, dentalskeletal malocclusions, aesthetic defects and obstructive sleep apnea syndrome (OSAS), which may manifest as sleep breathing difficulties with nocturnal-sleeping desaturations. The purpose of this study is to evaluate the Le Fort III osteotomy role, in pediatric patients with OSAS caused by midfacial hypoplasia.

Methods: Three patients in the age group of 3-8 years diagnosed with OSAS caused by midfacial hypoplasia underwent Le Fort III osteotomy for midfacial advancement. Telecranium x-rays in 2 projections (P-A and L-L), Panorex, CT scan and polisomnographic exams were carried out for pre-and post-operatively evaluation.

Results: In each case, a clear postoperative improvement of this pathology was found, documented by a further polisomnographic exam. A drastic reduction, and the resolution in two cases, of the apneic crisis and of the snoring was reached too.

Conclusion: LeFortIII advancement is an effective method to correct either midfacial hypoplasia and at the same time the obstructive sleep apnea syndrome.

O.289 The Sleep-Nasoendoscopy in patients with **OSAHS**

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Objectives: Obstructive sleep apnea-hypopnea Syndrome (OS-AHS) is caused by collapse of the upper airway during sleep. The aim of our study was to establish the Sleep-Nasoendoscopy, as a diagnostic tool for identifying the obstructive site and viewing the mechanism of obstruction of the upper airway in snorers and patients with OSAHS.

Methods: 57 patients with OSAHS were examined using Sleep-Nasoendoscopy with scarce compliance to CPAP. After the induction of the sleep by controlled infusion of Propofol, a transnasal fiberoptic endoscopy was performed in the supine position until the visualization of the upper airway and identifying the site of obstruction at the level of velo pharynx, oro-pharynx, hypopharynx or larynx. An anterior traction of the mandible was performed to valuate the effects of this manoeuvre at the level of the upper airway obstruction. The same procedure was repeated after therapy. All patients underwent physical examination, Muller manoeuvres and polysomnography.

Results: After the Sleep-Nasoendoscopy evaluation we obtained appropriates indications for therapy, in order to use oralapplicances, or for surgical therapy (UPPP, septoplasty, tonsillectomy, bimaxillary osteotomies, etc).

Conclusions: We believe that Sleep-Nasoendoscopy is a reliable noninvasive method for investigating the exact pathogenetic mechanism and obstruction site in patients with OSAHS and to achieve the more appropriate indication for therapy.

Friday, 12 September 2008, 08.30-10.30

Room 1

Oral surgery I

O.290 Alveolar distraction osteogenesis: histodensitometric evaluation

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Objective: Vertical defect of the alveolar ridge may render the use of dental implants difficult or impossible owing to an insufficient bone volume. Various methods for alveolar ridge reconstruction exist, such as autogenous bone grafting, guided bone regeneration and alveolar distraction osteogenesis (ADO). ADO is a process which forms new alveolar bone to correct alveolar deformities in ridge height and width. This work aims to verify the predictability of the augmentation of height mandibular atrophic alveolar ridges using an extralveolar distraction device and to study the bone processes in order to optimize implantoprosthetic rehabilitation.

Methods: ADO was performed on 10 patients with ridge deformities to obtain the required ridge augmentation. Clinical and radiological (OPT and CT with densitometric assay) evaluations were carried out during the following 12 weeks, before implant insertion. Biopsies at 40, 60 and 88 days were studied after general, specific and histochemical staining of slides; microradiographs were analyzed to evaluate the Trabecular Bone Volume. Results: The densitometric assay shows values increasing from the end of distraction, particularly after implant insertion. Histological results show a regression in bone deposition processes 88 days after the end of distraction culminating in a virtual steadystate after a certain time.

Conclusions: The results suggest that early implant insertion may be desirable to avoid bone loss due to mechanical unloading.

O.291 Dental extractions in patients on anticoagulant therapy

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The purpose of this study is to assess the incidence of bleeding complications after dental extractions in patients submitted to oral anticoagulant therapy with warfarin, without therapy modification or withdrawal, and to compare it with bleeding complication incidence in healthy patients with no coagulation therapy.

Two groups have been compared: the first group (test group) included 400 patients that have been treated with warfarin for at least six months, submitted to dental extractions without modifying the anticoagulant therapy; the second group (control group) included 400 healthy patient matched by age, sex and type of performed extractions. The results have been statistically evaluated with Chi square test.

856 extractions have been performed in the test group: 437 single tooth extractions, 419 multiple extractions and 368 surgical extraction. All patients have been treated with suture, positioning of oxidized cellulose and topic tranexamic acid. The level of INR. appraised immediately before surgery, ranged from 1.8 to 4.

In the control group 842 extractions were performed: 416 were single, 426 multiple and 327 surgical. Seven cases of late bleeding have been observed in the first group, 5 in the second. All these bleeding complications have been treated with socket toilette and a new suture, in no case more than local hemostatic measures were needed.

Statistical analysis with Chi square, revealed no statistical difference between the two groups for an interval of confidence of 95%, incidence is 1.75% in cases 1.25% in controls.

The cases that showed bleeding complications have been then separated in 3 groups, the group A (INR among 1.8 and 2),