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## Oral Presentation

We observed that, although the application's form can be different one to another lesion, we concluded that, generally, the time of the wound healing and the symptoms remission always were inferior. Based on it, we require some especial attention at the moment that we use the laser to the tissue absorbs the maximum energy causing a satisfactory therapeutic effect.

Because of the LLLT therapeutic action, the authors can suggest some clinical applications, energy densities, forms and frequency in the various clinical indications with the purpose of offer a better treatment and comfort to the patient.

### OP92

#### Effects of Low Intensity Laser Radiation in the Prevention of Oral Mucositis in Patients Undergoing Bone Marrow Transplant.

Eduardo, F.P.; Nicolli Filho, W.; Migliorati, C.A.; Zzell, D.M.; Eduardo, C.P.; Schubert, M.M. Mestre em Ciências pelo IPEN-USP.

Oral mucositis is one of the complications arising from pre bone marrow transplant conditioning, which can substantially change the patient's quality of life. The purpose of this randomized double blind study was to compare the effects of low intensity laser radiation in the prevention of oral mucositis in patients undergoing bone marrow transplants. Seventy patients at the Seattle Cancer Care Alliance in the U.S.A. were approved by the local ethics committee and gave their informed consent to take part in the study. The 70 patients were divided into three groups (group 1 - laser 650nm; group 2 - laser 780nm and group 3 placebo). The therapy or placebo treatment began on the first day of the conditioning and continued through to two days following the bone marrow transplant. Mucositis was measured according to the oral mucositis rate and the pain assessment rate (VAS). We were thus able to conclude that the diode 650nm laser indeed decreased the severity of oral mucositis as well as the degree the pain when used as a preventative therapy in patients undergoing bone marrow transplants. In this study, low intensity laser therapy was regarded as safe and did not present any side effects.

### OP93

#### Conditioning of Fossulae and Fissures with ER:YAG Laser in Odontopaediatrics.

Samorano, M.K.N.; Nasr, M.K.; Nunes, L.J.; Genovese, M.J.; Paiva, A.F.; Moreira, L.A..

Clinical research accomplished at the Centro de Diagnóstico e Tratamento da ATM and Dental Laser Research Center at the Universidade Cruzeiro do Sul-UNICSUL.

It will be presented clinical pediatric case of fossulae and fissures preparation with Laser of ER:YAG (Kavo Key Laser 2) 2,94 micrometers, class 4, maximum 800 mJ/Pulse.

Duration of the pulse: 250 - 500 microseconds

Frequency of the pulse: 1 - 15 Hz

Pilot laser (635 nm), class 2, maximum of 1mW

The use of Laser of ER:YAG in the cavity preparation has countless advantages in the children's treatment, mentioning as example: pain absence, structural change of the enamel-dentin, turning them resistant to the acids and comfort for the patient.

It will be discussed regarding the times of application of the conditioning as well as of the protocol of use of the Laser of ER:YAG in pediatric patient.

### OP94

#### Dental Cervical Lesions Prepared with Er:YAG Laser Caused by Abfraction, Abrasion and/or Erosion.

Nasr, M. K.; Genovese, W.J.; Paiva, A. F.; Paiva, P. F. ; Nunes, L.J. MSD and Professor at the Curso de Odontologia da Universidade Cruzeiro do Sul (UNICSUL), Director of the Centro de Diagnóstico e Tratamento da ATM.

Three (3) clinical cases of patient with cervical dental lesions were selected. The lesions are respectively classified as abfraction, abrasion and/or erosion. The preparation of the lesions was made with ER:YAG laser (Kavo Key Laser 2). Pulp protection with light cure glass ionomer liner (Vitrebond, 3M ESPE) and restoration with composed resin Filtek Z 250 (3M ESPE). The patient with lesion cervical type abfração was the only to need of anesthesia. The diagnosis and classification of the cervical lesions, exception of the type abfração in youths, is difficult. It is indispensable occlusal analysis of patient with cervical lesions. The use of the laser of ER:YAG was shown extremely effective in the conservation of dental tissue.

### OP95

#### Application of the Laser of Low Intensity in the Muscle Masseter and Temporal: Evaluation electromyography.

Nasr, M. K.; Paiva, A. F.; Paiva, P. F.

The objective of this work is to evidence the answers electromyography of the muscles masseter and previous storm after different forms of application of the Laser.

In a total of 15 individuals, divided in 3 groups, the Laser was applied (LaserMed InGaAs of 905 nm, 60 Watts pick of Carci LTDA) in the muscle Left Masseter: On time 3 Joules (group 1), for sweeping 9 Joules (group 2) and on time and concomitant sweeping (group 3).

Quantified the results, it was possible to verify that so much the muscle that received irradiation of the Laser, as well as the same individual's other muscles, had an increase of the activity electromyography, independent to the application form.