

ABSTRACT

one). One month later, the patient showed enlargement of the known little palatal bone exposure and a huge right mandible exposure (region 4.3-4.5), at the level of toothbrush trauma, associated with 4.5 bicuspid mobility (grade 2); he suffered for lip hypoesthesia and not severe pain (VAS 2-3). Unfortunately, follow-up is lacking due to death of the patient, five months later, after cancer progression.

**DISCUSSION:** This case apparently confirms that sunitinib-related and denosumab-related ONJ might have less pronounced CT alterations in comparison with those usually observed in BRONJ cases. However a possible aid to diagnosis from nuclear medicine techniques is deducible in this case, as well as recently described in BRONJ literature, reporting that bone scan might be more sensible (even if not specific) in identifying ONJ areas.

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**B17 - L-PRF AND LLLT as adjuvant treatments in MRONJ: case series**

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**BACKGROUND:** Nowadays MRONJ's management remains a challenge. The choice between conservative and invasive treatments must be established case-by-case. Complementary treatments include the use of low level laser therapy (LLLT) and platelets concentrates with the aim to improve bone and mucosal healing. Among platelet concentrates, leukocyte and platelet-rich fibrin (L-PRF) is the most recently introduced. L-PRF consists in an autologous three-dimensional material with high concentration of leukocytes and growth factors which promotes neo-angiogenesis, inflammatory homeostasis and stimulates collagen production. A specific and validated protocol for using platelet derivatives in dentistry has still not defined; nevertheless, Literature reports countless examples of their application for preventive and therapeutic purposes about the bone and mucosal tissues defects. Specifically, PRF membranes due to the high density of fibrin fibers are very resistant to mechanical stress frequent in the oral cavity and can resist longer to proteolytic degeneration. LLLT is a non invasive treatment with antibacterial, analgesic and biostimulating effects that increases the mitotic index and the differentiation of osteoblasts and relieve pain. The aim of this report is to describe the management of 3 MRONJs patients treated through the L-PRF and LLLT to support the surgical approach.

**METHODS:** Three patients affected by symptomatic MRONJ stage 2 according to SICMF-SIPMO classification were treated at our Department. One lesion appeared on the toothless ridge bone of the third quadrant in a patient treated with Zometa®; the

other 2 cases were caused by implant rehabilitation respectively of tooth 4.6 in a patient treated with Xgeva® and of tooth 2.4 in a patient who had assumed Zometa®. All patients followed their treatments along 2 years.

All the patients received the same protocol:

— Pre-surgical: 1g of Amoxicillin + Clavulanic Acid and 500 mg of Metronidazole route os twice a day starting three days before surgery and with mouth rinses with 0,2% chlorhexidine gluconate.

— Surgical: necrotic bone was removed with piezosurgery and rotary burs, a curettage was performed until bleeding. L-PRF membranes were obtained through a single centrifugation of patient's blood samples for a period of 12 minutes at 400 rpm, using the L-PRF centrifuge IntraSpin by IntraLock® International. After centrifugation, each L-PRF clot was separated from serum and placed on a sterile surgical plate in order to obtain two thin membranes that were accurately positioned on the bone defects and stabilized with a resorbable suture.

— Post-surgical: for 7 days after surgery the same antibiotic and antiseptic regimen of preoperative was prescribed and patients received daily applications of LLLT with a double diode laser (Lumix 2 Prodent, Italy), realizing scanning movement on the surgical site with 0,5 W in CW for 15' at 146,7 J. Patients were followed up to 3 months postoperatively.

**RESULTS:** Complete healing of the MRONJ sites were observed for 2 patients while the third one had recurrence.

**CONCLUSIONS:** Despite our limited experience, L-PRF and LLLT may contribute to a successful outcome in MRONJ management. L-PRF acts as a physical barrier against microorganisms while LLLT stimulates tissue regeneration and angiogenesis, accelerating the healing process. Further studies on a larger group of patients with a longer follow-up are needed to confirm the efficacy of the association of L-PRF and LLLT.

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**B18 - CGF membrane in the management of medication related osteonecrosis of the jaw: a case report**

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Medication-related osteonecrosis of the jaw (MRONJ) is a severe complication of certain drugs used for the treatment of osteo-metabolic or cancer disease. To date, the management of this complication is controversial and variable on the basis of the necrosis