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LETTER

Re: Reduction of Inflammatory RANTES/CCLS Serum Levels by Surgery in Patients with Bone Marrow Defects of the Jawbone [Letter]

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Dear editor

I have read this paper[1] and was surprised to find that the first sentence in the Introduction supports a widely discredited claim that "Bone marrow defects" cause facial neuralgias. It is supported by one reference from 1992 by first author Bouquot.[2] The concept of Neuralgia inducing cavitational osteonecrosis (NICO) has been around for many years and is characterized by usually bilateral, continuous, and paroxysmal pain of moderate to severe intensity in the mandible or maxilla. There is little evidence to support this theory.

Zuniga[3] contributed an extensive Counter point to Bouquot and Mc Mahon's article[4] in which he compared NICO to Trigeminal Neuralgia, Atypical facial Pain, Atypical Neuralgia and Burning mouth syndrome and concluded that these pain conditions met important criteria that included clinical data to support the pathophysiology and diagnostic criteria, scientifically sound data that provide predominantly central nervous system mechanisms and clinical pain data to determine which criteria discriminate between the pain sub groups. The latest classification of orofacial pain[5] has defined 3 types of persistent facial pain (idiopathic facial pain, idiopathic dentolalveolar and post traumatic trigeminal pain). Their common features are persistent pain with variable features, daily occurrence, 2+ hours, 3+ months, poorly localized, dull, nagging, occasionally sharp, radiating with variable intensity. This would seem to fit the "neuralgia" described by Bouquot most closely.

Furthermore, Zuniga analyzed the pathophysiology, histopathology, diagnostic test efficacy, and treatment outcomes to conclude that NICO has been and continues to be a challenged concept.[3]

The most recent literature review[6] of 29 articles concluded that there was "poor evidence" for the etiology, diagnosis and treatment of NICO. No gold standard diagnostic could be identified. All studies were observational in their design and all investigations were rated as poor quality because of high risk of bias and non-transparent reporting. The Authors concluded that prospective diagnostic and therapeutic studies are needed before the usefulness of invasive therapeutic procedures can be evaluated.

The statement that "There is growing evidence…" for its support is not demonstrated by the evidence. PUBMED lists 21 articles since 1986 with only 4 published since 2014.[7]

Furthermore, the theory has come under legal review and Insurance company review.[8,9]

I am not qualified to review the scientific evidence presented in this paper but as an oral and maxillofacial surgeon with a long term interest in pain I have to agree with the literature that the diagnostic criteria have not been validated and that considerable caution needs to be exercised in attributing pain to these putative lesions so patients are not harmed by unnecessary surgical interventions.

Disclosure

The author reports no conflict of interest in this communication.

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