



PYOGENIC GRANULOMA OF THE GINGIVA: A MISNOMER? – A CASE REPORT

Medical Science

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ABSTRACT

Gingival enlargements in children are a relatively common finding and are usually the result of a reactive response to local irritation or trauma. An enlargement may represent a variation of normal anatomic structures, inflammation, cysts, developmental anomalies and neoplasm. Within these lesions is a group of reactive hyperplasias, which develop in response to a chronic, recurring tissue injury that stimulates an exuberant or excessive tissue repair response. A case report of a 6-year-old boy who presented with pyogenic granuloma and was successfully treated is presented.

KEYWORDS

Pyogenic granuloma; Gingival growth; Inflammatory hyperplasia; Granuloma pyogenicum.

INTRODUCTION

In children gingival lesions are relatively common and can exhibit an exuberant growth in a relatively short period of time. Pyogenic granuloma or granuloma pyogenicum is a relatively common benign mucocutaneous lesion. The term pyogenic is a misnomer in that, contrary to what the name implies, the lesion does not contain pus. Pyogenic granuloma is a benign lesion; therefore surgical excision is the treatment of choice. To avoid the possibility of recurrence the lesion must be excised down to the underlying periosteum and predisposing irritants must be removed².

CASE REPORT:

A 6 year old healthy boy reported with his parents to the Dept of Pedodontics & Preventive Dentistry, Buddha Institute of Dental Sciences & Hospital, with the chief complaint of swelling in the left upper back tooth region of the jaw for past one month. His parents reported a history of trauma to this region one month back. The swelling was initially painless and has gradually increased in size to attain the current dimensions.

Intraoral examination revealed a soft tissue mass extending mesiodistally in the region of maxillary left deciduous 1st and 2nd molar teeth (figure 1). The swelling was sessile, and was approximately 1cm in antero-posterior dimension and 1cm in supero-inferior dimension. The soft tissue over the swelling was erythematous with areas of creamy-white sloughing of tissues. On palpation, the swelling was tender and exhibited blanching on application of slight pressure. Digital radiographs (OPG) did not reveal any associated osseous defect (Figure 2).

Routine haemogram did not reveal any unusual finding. Treatment planned was excision of the mass, followed by histopathological examination.

Local anesthesia (2% lignocaine solution with adrenaline) was administered as local infiltration in the area, and excision of the mass was performed with the help of tissue forceps, BP handle & BP blade no.15, the excision initiating from distal aspect of the mass and proceeding mesially (Figure 3). Simple interrupted sutures were placed in the region using non-absorbable (3-0 black silk) and adequate haemostasis was achieved (Figure 4). Post-operative instructions were given, along with antibiotics and analgesics.

The patient reported back after 10 days, and sutures were removed. Satisfactory wound healing was observed.

DISCUSSION:

The incidence of the pyogenic granuloma has been described as between 26.8% to 32% of all reactive lesions. Although it has been reported in all age groups, The most common location of PG is the anterior gingiva's region 3,4,5,6 with higher prevalence between the second and third decades of life. 8,9,11 In the present report, however, the lesion was on the upper lip of a 2-year-old girl.

According to some authors, Pyogenic Granuloma's main etiological factor is the traumatic injury, characterizing the lesion as reactional. 1,5,10 In this case the lesion in this case appeared a few weeks after the girl had fallen from the stairs and developed due to a lip-sucking habit. It presented with bleeding and ulceration as the result of a chronic traumatic injury caused by pacifier sucking and lesion biting, corroborating the findings of some authors. 4,8,13,11 Although it can present in many sizes, 3,6,8,10 The Pyogenic Granuloma in the present case measured 16 mm, which is uncommon when compared with other reports that observed a mean size of 7.3 mm⁷. In the case of a small child, it causes a bigger impact on the caregivers.

The clinical examination of the lesion suggested the probable diagnosis of PG, which was only confirmed by histopathologic examination, corroborating the findings of other authors. 4,9,10,11 Furthermore, this lesion has several differential diagnoses, such as: angiosarcoma; basal cells carcinoma; squamous cell carcinoma; Kaposi carcinoma; hemangioma; bacillary angiomatosis; parulis; peripheral giant cell granuloma; peripheral ossifying fibroma; peripheral fibroma; leiomyoma; hemangioma- dothelioma; hemangiopericytoma; metastatic tumor; gravidic tumor; and postextraction granuloma, which were only discarded after the histopathologic examination¹¹.

There are several treatment methods for the PG. The patient's hemogram was within normal limits, eliminating any chance of infection, and the PG is a benign lesions of any size. 9 The surgical excision provided an immediate esthetic improvement; addressing the mother's main complaint and allowing the child better feeding conditions.

CONCLUSION

To make a differential diagnosis and allow adequate treatment, it is important that a detailed medical and dental history and clinical examination be allied to the histo- pathologic examination with the aim of discarding other lesions.



Figure 1: view of the soft tissue growth

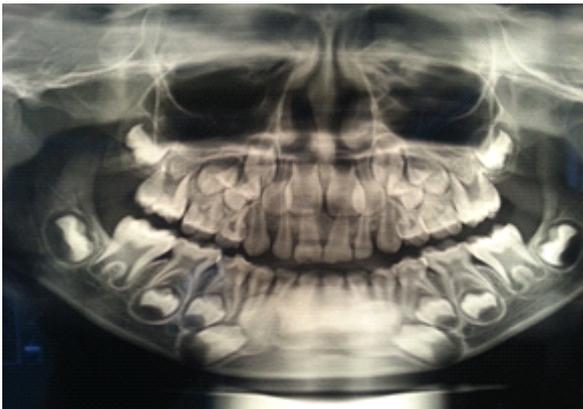


Figure 2: OPG



Figure 3: Excised specimen



Figure 4: Clinical aspect after excisional biopsy

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