



MANAGEMENT OF A RARE CASE OF AN INFANT WITH THREE NATAL TEETH.

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ABSTRACT

Primary teeth normally start to sprout at 6 months of age. However, the eruption of teeth at or shortly after birth is rather rare. Neonatal teeth are those that erupt within the first 30 days of life and are referred to as "natal" teeth if they are present at birth. Although the size and shape of these natal teeth may approximate that of the primary dentition, they frequently have hypoplastic enamel and dentin along with weak or nonexistent roots. They are also frequently smaller, conical, and yellowish. The baby may experience discomfort, including pain and difficulties sucking, sublingual ulcers, lacerated breasts, and even the ability to aspirate teeth. In this situation, extraction is required. Additionally, no treatment is necessary if the tooth is generally asymptomatic and does not obstruct regular breastfeeding. Since there are negative cultural attitudes associated with natal teeth, good parental counselling and vigilant management in relation to child protection are required. As a result, both general practice dentists and pediatric dental specialists may be involved in the supervision or treatment of patients with natal and neonatal teeth. This report describes a rare instance in which a one-month-old baby appeared with three natal teeth that had to be removed to prevent aspiration risk and feeding disruption.

KEYWORDS : Natal tooth, neo-natal tooth, hypoplastic enamel

INTRODUCTION

Numerous changes occur throughout a child's first year of life, from conception to birth. The emergence of the first tooth at around 6 months of age marks a significant developmental stage for both the child's functional and psychological development as well as the parents' emotional well-being. When the first teeth sprout early in the oral cavity, expectations for their eruption are elevated even further. When teeth are seen at birth or in the first month of life, the parents become interested, curious, and worried. Further complicating matters, the mother and the child have a number of challenges related to the natal tooth or teeth, such as pain during sucking and unwillingness to feed. One of the significant occurrences in a baby's first year of life is the eruption of their first tooth. Parents will always be ecstatic when their child's first tooth erupts. It has many different emotional connotations. But when a tooth is discovered at birth or too early, it causes a variety of reactions and a lot of misunderstandings. It is further complicated by a number of issues, including pain during suction, unwillingness to feed, and pain experienced by both mother and child as a result of a natal tooth or teeth. The sharp incisal edge of natal teeth can induce ulceration on the ventral surface of the tongue, which is a serious side effect. The Riga Fede disease or syndrome is another name for this condition. Due to its movement, the teeth may aspirate or swallow, which is another difficulty. Natal teeth can hurt the mother's breast and make nursing difficult. Occasionally, carious lesions, pulp polyps, or the early eruption of succeeding teeth can also result from the natal teeth.

Primary teeth usually begin to erupt normally at 6 months of age.¹ Neonatal teeth are those that appear within the first 30 days of life after birth. Natal teeth are those that exist at the time of birth. Congenital teeth, foetal teeth, and dentition praecox are other terms for premature tooth eruption that have been used in literature. There are only 1:6000 to 1:8000 babies who have teeth, and most of the time there are two or three teeth present. Roman historians Titus Livius (59 BC)² and Caius Plinius Secundus (23 BC) both recorded the earliest instance of natal teeth, which was documented in cuneiform writings discovered at Nineveh.³

Neonatal teeth are those that erupt within the first 30 days of

life, and natal teeth are those that are present at birth, according to Massler and Savara's⁴ classification system developed in 1950. With a stronger preference for girls, natal teeth are met more frequently than neonatal teeth in a ratio of about 3:1. The lower main central incisors are the teeth that are most frequently listed as natal or neonatal teeth, according to King and Lee.⁵ 85% of natal teeth are mandibular incisors, 11% are maxillary incisors, 3% are mandibular canines, and only 1% are maxillary canines or molars, according to Bodengoff's study.⁶ The emergence of more than two natal teeth is uncommon and typically occurs in pairs.

Neonatal teeth and natal teeth are frequently discovered in conjunction with known disorders and developmental problems. Among these syndromes are the following: Ellis-van Creveld (chondroectodermal dysplasia), pachyonychia congenita (Jadassohn-Lewandowsky), Hallerman-Streiff (occulo-mandibulo dyscephaly with hypotrichosis), Rubinstein-Taybi, steatocystoma multiplex, Pierre-Robin, cyclopia, Pallister-H Epidermolysis bullosa simplex, including van der Woude and Walker-Warburg Syndromes, Pfeiffer, ectodermal dysplasia, cranial dysostosis, numerous steatocystomas, Sotos, and adrenogenital.⁷

Infants Are Typically Brought To The Dentist Office For One Of The Reasons Listed Below:

- Due to the tooth's high degree of movement, there is a chance that the baby could inhale it into his or her airway and lungs if it gets loose during nursing.
- A tongue ulcer on the ventral surface. This condition was initially described by Coldarllin in 1857. Riga and Fede documented the lesion histologically, leading to the emergence of the term Riga-Fede illness.⁸
- Pain-related Difficulty Or Refusal To Eat.
- The mother's nipple becoming infected and interfering with breastfeeding. Since the tongue is placed between the natal teeth and the nipple during breastfeeding, Hals, Zhu, and King; and Walter et al. reported that there is no association between damage to the mother's nipple and their presence.⁹
- The legend of the devil's incarnation or terrible omen.
- To determine whether the tooth is an extra tooth or a typical component of the dentition.⁹

As The Natal Teeth Come Into The Oral Cavity, They Can Be Divided Into Four Types Based On How They Look.¹⁰

- Lack of a root and a shell-shaped crown with weak gingival fixation to the alveolus.
- A solid crown with little to no root that is only weakly held to the alveolus by gingival tissue.
- The incisal edge of the crown rupturing through the gingival tissues.
- Gingival tissue edoema with a perceptible but unerupted tooth.

The natal teeth of the first two groups typically need to be excised if the degree of mobility is greater than 2 mm.¹⁰

CASE REPORT

The Department of Pedodontics and Preventive Dentistry at Inderprastha Dental College and Hospital, Sahibabad, had a visit from a 30-day-old female patient whose parents complained that she had refused to nurse and had teeth in her lower jaw that had been there since birth.

The infant's lower anterior area of the jaw has had teeth ever since birth, according to the mother. After birth, the same information was given to the concerned paediatrician. Mother gradually started to feel uncomfortable when feeding the child, and she also noted that the teeth were slightly mobile. An additional oral exam revealed a symmetrical face without lymphadenopathy.

Family and medical history. Intra oral examination revealed three crowns of teeth in mandibular anterior region, whitish opaque in color and exhibiting grade II mobility. The crown size was smaller. The lips, tongue, gingiva, floor of the mouth and buccal mucosa were clinically normal in appearance and there was no ulceration on the ventral surface of the tongue. (Figure 1)



Figure 1: Three Natal Teeth Present In Mandibular Anterior Region

As there was a danger of aspiration of these teeth existed. Therefore, a decision of immediate extraction of the three natal teeth was made. Extraction was carried out under local anaesthesia with epinephrine after application of a topical anaesthetic and careful curettage of the sockets was performed in an attempt to remove any odontogenic cellular remnants that might otherwise have been left in the extraction site (Figure 2). Post extraction haemostasis was achieved (Figure 3). The tooth and the tissue both were sent for histopathological examination for further investigation. (Figure 4). The extracted tooth was hypo-mineralized, shell

shaped and poorly fixed to the alveolus by gingival tissue with absence of any root formation. The histological finding of the longitudinal section of the whole natal tooth specimen showed enamel almost lost due to decalcification, normal dentin and a large pulp chamber with dilated blood vessels was slightly higher in pulpal tissue (Figure 5). Histological examination revealed no extraordinary findings. Postoperative instructions were given and a recall visit after 1 week was scheduled.



Figure 2: Extracted Natal Teeth



Figure 3: Post Extraction Hemostasis

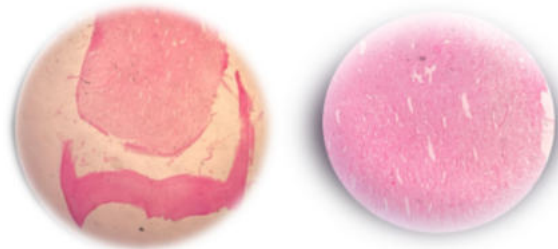


Figure 4 & 5

DISCUSSION

Given that they are typically the first teeth to erupt in the oral cavity naturally, the occurrence of lower central incisors is not surprising. Its level of development is far more significant than the timing of their eruption. An immature tooth has a worse prognosis than a mature natal tooth.¹¹

The superior placement of the tooth germ is the usual explanation for tooth eruption during the perinatal period, but in most cases, specific pathogenetic factors cannot be identified.¹² In the present case, there was no obvious underlying cause for the natal tooth, but it may have been due to the superior placement of the tooth germ. There was no inherited tendency.

After birth, while the newborn is still in the hospital, any loose natal teeth should be extracted. According to reports, the potential of swallowing or aspirating natal teeth is a justification for extracting mobile teeth. A positive prognosis exists for teeth that are stable after four months. Because of the discolouration, they do not look well.¹³ Pediatric dentists must to take every possible step to inform parents and the medical profession about the best way to care for baby teeth. To prevent needless stress to the area, a dentist should extract a natal tooth if such is the case.¹⁴

A paediatric dentist should often check in with the patient to ensure preventive oral health care. Therefore, the management of natal teeth should place a high priority on early identification and appropriate treatment in order to avoid any complications.¹⁰ According to Ooshima et al.¹⁵ and Tsubone et al.,¹⁶ the dental papilla should be removed after a natal tooth is extracted in order to avoid the dental papilla's cells from continuing to develop and erupting into tooth-like structures months later. It was described as a "residual natal tooth" by Tsubone et al. Following a one-year follow-up, we

saw no such changes.

Even though Massler, Savara, and Spouge reported experiencing infantile diarrhoea, saliva drooling, lethargy, and other teething symptoms, none of them were evident in the current case study.¹⁷ We come to the conclusion that babies born with teeth that haven't fully emerged yet need to be thoroughly examined for subsequent treatment planning, and that talking to the parent to raise awareness is just as crucial. To confirm the genesis and nature of natal teeth, as well as to determine whether they are deciduous or supernumerary teeth, longitudinal and more interdisciplinary research are also required.

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