

Excessive crying due to erupting neonatal tooth: A case report

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ABSTRACT

Tooth eruption normally starts from 6 months of age. Teeth that appear at birth are called natal teeth, whereas, teeth that erupt during the first month of life are called neonatal teeth. Both are uncommon, with the ratio of natal to neonatal is 3:1. Presence of neonatal teeth may lead to complication in mother like painful bitten or bleeding nipples or it may cause complications in babies like difficulty in feeding, pain/distress due to erupting tooth, swallowing of the tooth, repeated trauma to the tip or undersurface of the tongue resulting in Riga-Fede ulceration and rarely aspiration. We are presenting a 15-day-old male baby who admitted in our hospital primarily with excessive crying and poor feeding and on a thorough physical examination revealed an erupting neonatal tooth. Other causes of excessive crying have been excluded.

Key words: Tooth, Neonatal, Excessive crying

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INTRODUCTION

The incidence of natal and neonatal teeth varies from 1:1000 to 1:30,000. The incidence may vary between different racial groups. Although there is no sex predilection but few authors have reported a female predominance of the anomaly.^{1,2} Intervention may not be necessary if it does not cause any problem to the infant or mother. But tooth extraction is indicated if it is supernumerary, interfere with feeding or if it is highly mobile. It can rarely lead to sudden death due to aspiration of dislodged tooth.³

CASE REPORT

15-day-old male infant belonging to poor socioeconomic strata from a remote area of West Bengal (India) was admitted to our neonatal intensive care unit with excessive crying and not feeding well for last 3 days. The baby was born by normal vaginal delivery at a rural health center. Parents were non-consanguineous. Antenatal and intranatal events were uneventful.

On examination, the baby weighed 2.4 kg. Reflex and activities were however good. The pulse rate

was 140/minute, respiration rate was 36/minute, and temperature recorded on admission was 99.6^oF. Anthropometric measurements were within normal limits. No definitive infective focus found on initial clinical examination.

A provisional diagnosis of probable sepsis was made and empirical antibiotic with ampicillin and gentamycin was started. Paracetamol drop was given as analgesics. Blood investigations and CSF studies were performed and were within normal limits. Careful examination of oral cavity revealed an erupting whitish left mandibular lower incisor tooth (Figure 1).

As the tooth was mobile, extraction was performed because of the fear of aspiration. Vitamin K injection (1 mg intramuscularly) was given before extraction. Feeding significantly improved on the next day and the baby was discharged on day 4 of admission.

DISCUSSION

The teeth develop from epithelial–mesenchymal interactions between oral epithelium and neural crest–

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Figure 1: Photograph showing an erupting whitish left mandibular lower incisor tooth

derived mesenchyme. The first teeth (called deciduous teeth or milk teeth) appear 6 to 24 months after birth.⁴

Natal teeth are usually small in size, conical in shape and yellowish to whitish in color. They have incompletely developed enamel and dentin with poor or absent root formation. They are frequently attached to pad of soft tissue over the alveolar ridge resulting in excessive mobility and chance of tooth aspiration or swallowing. Natal or neonatal teeth are mostly mandibular incisors (85%) followed by maxillary incisors (11%), mandibular cuspids (3%) and maxillary cuspids (1%).^{2,5}

The exact etiology of teeth formation in neonate is unknown, but factors contributing to their formation include the superficial position of the germ, infection, febrile states, hormonal stimulation, hereditary influences, osteoblastic activity in the germ area and hypovitaminosis.⁶

In most of the cases they occur singly, but rarely they may be associated with several syndromes, including Ellis–van Creveld syndrome, Hallermann–Streiff syndrome, Sotos syndrome, Pierre-Robin syndrome, Steatocystoma Multiplex and Walker-Warburg Syndrome.⁶

They are usually benign and do not cause significant discomfort to mother or baby and such cases do not require any intervention. But tooth extraction is required if they

cause complications like difficulty and discomfort while suckling, sublingual ulceration, injury to the mother's breasts and when there is a chance of aspiration of the tooth. One may give vitamin K (0.5-1.0 mg) injection prophylactically if it is not given after birth as there is a risk of hemorrhage during extraction. In situations where there is more gingival attachment, local anesthetic medication may be needed for extraction. To prevent residual teeth, curettage of extraction site is recommended. Apart from medical and surgical treatment, parent counseling is also necessary because of negative cultural attitudes towards natal teeth.^{7,8}

In the present case, extraction was performed as the tooth interfering with feeding, causing discomfort to the baby, was highly mobile and because of the fear of aspiration.

CONCLUSION

Early detection of natal and neonatal teeth requires a thorough clinical examination, including examination of the oral cavity. The treating physician should keep in mind that erupting neonatal tooth can be a cause of excessive crying in neonate.

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MM, BB – Drafting the manuscript and review of literature; **AR, PK** – Editing and manuscript revision; **SB, TB** – Clinical data and photograph collection; **NB, KSR** – Work up and follow up of the case.

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