

Handling Equine Oral Tooth Extraction Failures

(AAEP 2012)

By [Christy Corp-Minamiji, DVM](#)

Updated: Friday, March 22, 2013 8:00 AM

Posted: Friday, March 22, 2013 8:00 AM

Originally published on [TheHorse.com](#)

Dental extractions don't always go according to plan, so the practitioner needs to be ready for potential complications before removing a tooth. A Pennsylvania practitioner recently described typical reasons why oral extraction fail, alternative approaches when these problems occur, and the equipment, facilities, assistance, and skill a veterinarian should have on-hand to cope with the unexpected.

Usually practitioners extract a tooth orally by gradually breaking down the periodontal ligament that holds the tooth within the alveolus (socket), noted Edward Earley, DVM, FAVE/Eq, of Laurel Highland Veterinary Clinic in Williamsport. If everything goes well, the clinician achieves this through slow, constant force using molar spreaders and molar forceps.

Earley listed some of the circumstances that can cause intra-oral extraction failure:

- Fracture of the clinical crown (the visible portion of the tooth);
- Decay of the crown;
- Retained root tips (following extraction);
- Excessive layers of cementum around the reserve crown (the portion hidden by the gum) and root tip as a result of root disease;
- Fracture of the clinical and reserve crown;
- Dilacerated (abnormally angled or curved) root tips ;
- Maleruption (incomplete or deformed eruption);
- Tooth resorption (loss of density of the tooth itself); and
- Alveolar ankylosis (fusion of the tooth to the surrounding socket).

Earley addressed some alternate techniques for removing teeth or tooth fragments including: directly elevating fragments from the alveolus with a surgical approach through the cheek or sinuses; elevating a tooth fragment down into the mouth via a surgical hole (trephine) created in the sinuses; removing a segment of alveolar bone at the aspect of the cheek; and sectioning the crown using a high-speed bur.

Each of these techniques requires specific, specialized equipment and advanced training and experience. Earley reviewed some of the dental units and tools necessary for completing these techniques successfully, such as a high-speed drill unit, suction unit, and a variety of dental elevators.

He also emphasized the importance of training in each of the surgical approaches, noting that due to the complex anatomy of the head, complications with sinus, nerve, and blood vessel involvement are more likely in untrained hands. Finally, he stressed the importance of having a trained team for equine dental procedures, saying that complex cases often require a surgeon, dental specialist, and a skilled assistant.

Disclaimer: Seek the advice of a qualified veterinarian before proceeding with any diagnosis, treatment, or therapy.