Use of Conjunctival Pedicle Grafts to Treat Corneal Diseases in the Horse. Retrospective Review of 26 Cases

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April 25, 2024

Abstract

Background There are limited data on outcomes and complications of conjunctival pedicle grafts in horses. Objective Document the indications, complications and outcomes of conjunctival pedicle grafts in horses. Study Design Retrospective case series. Methods Review of case records of horses with corneal diseases managed using conjunctival pedicle grafts. History, clinical findings, treatments, complications, and outcomes were recorded. Results 26 horses were treated by conjunctival pedicle grafts over a 16 years period. The indications were deep corneal ulceration (n=9), non-healing superficial corneal ulceration (n=6), corneal stromal abscessation (n=5), corneal laceration (n=3) and keratomalacia (n=3). Short term complications occurred in 12 horses (46%), the commonest being necrosis of the graft (n=6); in 3 cases, the corneal lesion healed following debridement, but in 2 the affected eye required enucleation and one was euthanased. Keratomalacia and ulceration extending beyond the graft occurred in 3 horses, all of which were enucleated. Uveitis occurred in 6 horses (4 cases prior to discharge and 2 after discharge); enucleation was required in 5 of these horses. Phthisis bulbi occurred prior to discharge in one horse and after discharge in another. Two horses had decreased faecal output after surgery (one had caecal impaction). In 6/26 cases (23%) enucleation was required prior to hospital discharge. One horse was euthanased due to post-operative caecal impaction. The short-term success rate was 69%. Two horses (8%) required enucleation after discharge from the hospital and the long-term success rate was 58%. Main Limitations Small number of cases with variety of different diseases of varying severities. Conclusions Conjunctival pedicle grafts were successfully employed to treat several corneal diseases including chronic superficial corneal ulceration, deep corneal ulceration, corneal stromal abscesses, corneal lacerations and keratomalacia. The short-term success rate was 69%. Long-term follow-up indicated a good prognosis for most horses that had a successful short-term outcome.

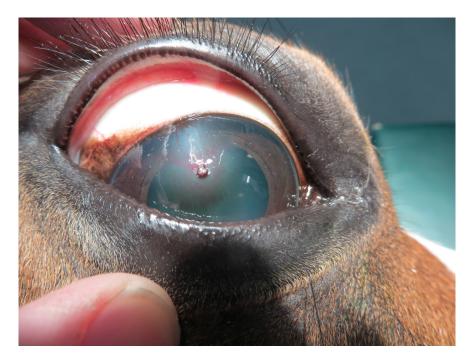
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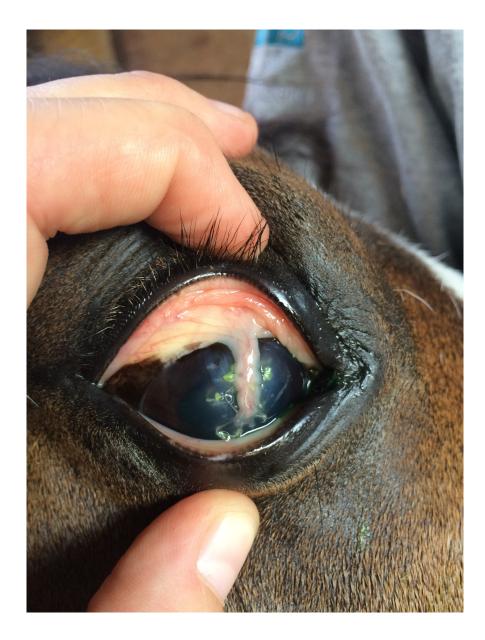








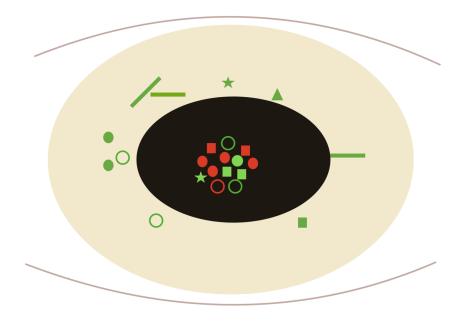












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