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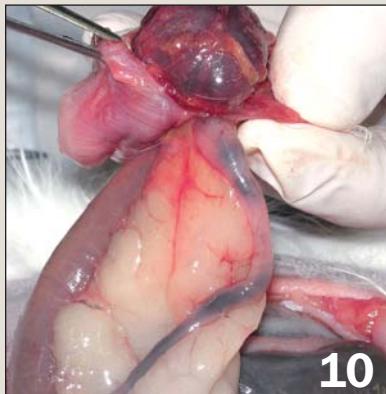
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Surgical Correction of a Rectal Prolapse in a Pet Skunk

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Kevin Bowman

In many states, ownership of skunks as pets requires special permitting, regardless of whether they have been wild-caught or domestically raised. Owners acquire skunks through breeders, from pet stores and occasionally, as injured or orphaned wildlife. Domestically raised skunks have been bred to some degree for pet quality and unusual color patterns, and anecdotal reports indicate these generally are better pets than wild-caught animals.

Skunks sold in pet stores and most individuals offered by breeders are descented prior to purchase. However, in some cases, practitioners may be requested to descent them by performing a bilateral anal sacculectomy. While illegal in many parts of Europe, elected anal sacculectomy is considered a legitimate procedure in the United States.

Due to the relatively large size of the anal sacs even at an early age, the ductal approach is recommended. Complications include damage to the anal sphincter and resulting rectal prolapse.

Surgical Procedure

An 8-week-old female skunk weighing 3.5 kg was presented with prolapsed rectal mucosa. Surgical correction of the disorder was scheduled.

Preanesthesia was administered with diazepam (2 mg/kg SC). Induction of anesthesia was achieved with an IM combination of medetomidine

(10 mcg/kg) + ketamine (10 mg/kg). Anesthesia was maintained with isoflurane (1-2%) delivered by endotracheal tube. Intraoperative pain control was achieved with carprofen (2 mg/kg IM) and maintained at 1 mg/kg q12h PO for the following 3 days.



Fig 1. Appearance of prolapsed rectal mucosa in an 8-week-old female skunk previously descended using the ductal approach. Descending had been performed prior to the sale from a pet shop; the age at the time of the surgery was unknown.



Fig 2. Defecation caused exacerbation of the prolapse. In this case, a recent meal of vegetables produced yellow-pigmented feces.



Fig 3. Closer inspection under anesthesia revealed two lesions of the internal sphincter muscle at the site of previous removal of the anal sacs and ducts. The lesion on the right (arrow) is more severe than that on the left. The skunk is positioned in dorsal recumbency.

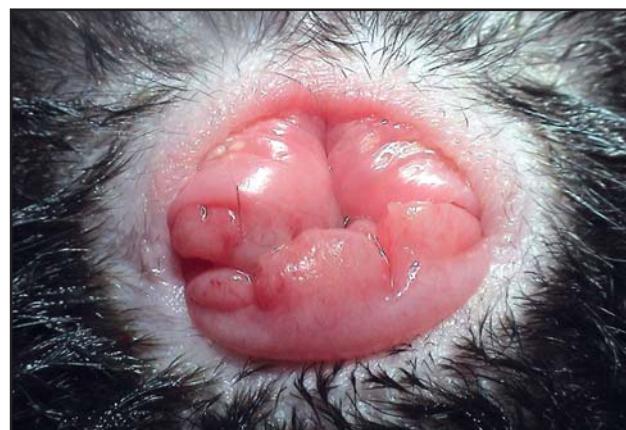


Fig 4. The goal of surgery is to debride and close the defects, restoring the integrity of the internal sphincter muscle. The mucosa of the internal sphincter is separated from the muscle to allow proper apposition of the muscle for suturing.



Fig 5. After debridement, two simple interrupted sutures using 3.0 absorbable monofilament are placed to close the defect of the muscle and mucosa.



Fig 6. Despite correction, the prolapse is still evident, likely due to edema of the tissues.



Fig 7. Placement of a 3.0 nylon purse string suture allows correction of the prolapse and time for the internal sphincter to heal.



Fig 8. The suture is tightened to produce resolution of the prolapse yet still allow normal passage of feces.



Fig 9. Shown is the postsurgical appearance following suture of the ductal incisions (not visible) and the purse string suture of the internal sphincter. Postoperative antibiotic treatment was provided by amoxicillin/clavulanate (10 mg/Kg q12h PO).



Fig 10. Follow-up 10 days post surgery and immediately after suture removal shows normal appearance of the anal sphincters.

References and Further Reading

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