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How I Manage Rectal Tears: First Aide, Client Communication, and Prognosis

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Take Home Message

Rectal tears are a known complication of rectal examination. Unless the veterinarian has been negligent, liability should not be admitted. Immediate recognition of the problem and initiation of appropriate treatment is critical. Direct suture per rectum provides an improved outcome for grade III tears whilst avoiding the expense of general anesthesia and surgery. If referral is declined, medical management of grade III tears can be attempted and may have a successful outcome.

Introduction

According to the AVMA, an equine practitioner should expect to be involved with a case of a rectal tear at least once in their career. Rectal tears are an inherent risk of rectal examination and are one of the most common reasons for lawsuits against equine practitioners. It is often the subsequent management of the situation after the tear has occurred that results in claims of negligence and therefore knowing how to handle the situation appropriately is important. A step by step guide to handling the situation appropriately will be discussed.

Step 1: Prevent it Happening in the First Place

The first step is to make every effort to minimize the risk of a rectal tear occurring. If it is a new client or novice horse owner, it is worth educating them of the potential risks and benefits prior to performing the examination. However, practically most veterinarians do not do this as they already have an established relationship with their client.

The horse must be adequately restrained. Obviously stocks are not always available, so the horse should be in a stall or other confined area that reduces the likelihood of it moving around. Appropriate restraint includes being held by a responsible adult, the use of a twitch, sedating a fractious horse with xylazine and administering N-butylscopolammonium bromide to reduce straining. If the horse cannot be appropriately restrained, for example a capable adult is not available to hold the horse; the rectal examination should not be performed. Excessive force should not be used and special care should be taken with Arabians which seem to be predisposed to rectal tears.

Step 2: Evaluate the Degree of Injury

It is often the subsequent management of the situation after the tear has occurred that results in claims of negligence and therefore knowing how to handle the situation appropriately is
important. If blood is seen on your sleeve after performing a rectal examination further evaluation to determine the extent of the injury should immediately be performed.

This includes sedation of the horse, and treatment to reduce straining. This could be as simple as a dose of N-butylscopolammonium bromide (Buscopan®, 0.3 mg/kg, IV) or administration of an epidural. For an epidural, a combination of lidocaine at 0.22 mg/kg and xylazine at 0.17 mg/kg diluted to 6-ml total volume provides good analgesia in 5-10 minutes with minimal ataxia. The effect of the epidural can be determined by a loss of tail and anal tone.

Once restraint and relaxation are achieved, many people use a bare arm to assess the rectum and determine the degree of injury as they feel it allows for better palpation. Many tears are a Grade I, in which only the mucosa is torn. These tears are difficult to feel and find after the initial injury has occurred. Grade II tears involve the muscular layer only, whilst the mucosa and serosa remain intact. These type are rare and probably only occur during healing from a Grade III tear. With Grade III tears the mucosa, submucosa and muscular layers are all torn, leaving only the serosa intact. These can be felt as a clearly defined tear with distinct edges. The serosa can be felt behind the tear. In Grade IV tears, all layers are torn and the hand can pass freely through the tear into the abdomen and palpate the other viscera.

Step 3: Client Communication

After establishing the severity of the tear, a discussion on finances should ensue. If the standard of care has been met (i.e. the horse was appropriately restrained, was an appropriate size for the veterinarian to rectal, excessive force wasn’t used, etc.) then the veterinarian should not be held responsible as the examination was not negligently performed. It is important in these situations not to admit liability. It is also important to remember that unless the examination was performed negligently then costs will not be covered by professional liability insurance. This is important to remember as a goodwill gesture to cover the cost of treatment can make you feel better until the bill arrives! Therefore, if the standard of care was appropriate, the owner is responsible for the costs of treatment. It is also advisable to contact the AVMA PLIT office to inform them of the situation. Although they will not cover the cost of treatment unless you have been negligent, they will cover legal defense fees if the owner decides to file suit claiming malpractice. Additionally, all examination findings, subsequent treatment and client communication should be thoroughly documented in writing.

Step 4: Treatment

Mucosa heals rapidly and therefore Grade I tears heal well and do not require specific treatment. Because the serosa is fragile Grade III tears can easily become a Grade IV tear. Appropriate immediate first aid is critical for these cases. The prognosis for a Grade IV rectal tear is poor but if abdominal contamination is minimal, treatment can be attempted. Referral of Grade III and IV tears is strongly recommended. In these cases, the next step is to contact your local referral hospital to ask for their specific advice on treatment. Even if the owner declines referral due to cost, the veterinarians at the hospital can provide valuable advice on treatment that should be initiated on the farm. Immediate first aid on the farm should consist
of flunixin meglumine, intravenous antibiotics, and ensuring that tetanus prophylaxis is up to date. In addition, while the epidural is still effective, as much manure should be removed from the rectum and distal small colon as is possible. Some referral practices may ask for rectal packing to be placed. This is to prevent feces becoming packed into the defect which could increase the severity of the tear. However, in some instances the packing may also worsen the tear. To place rectal packing either a rectal sleeve or stockinette is covered in lubricating jelly and inserted as far cranially as possible. Pieces of cotton are then torn off and placed into the lumen to fill it. The anus should then be closed with suture or towel clamps to prevent it from being pushed out.

Management of Grade III tears by referral hospitals has previously consisted of performing a large colon enterotomy and evacuation of the colons and colostomy to divert feces whilst the tear heals and then a subsequent surgery to reverse it once the tear has healed. Two episodes of general anesthesia, and the risk of adhesions made this procedure expensive with a high mortality rate. Other techniques such as a temporary rectal liner have been described. However, the current most favored method, and the technique employed by the author, is nonvisual direct suture per rectum. This technique is most effective for minimizing the likelihood that a Grade III tear will progress to full thickness. After performing an epidural, the tear is sutured, usually blindly, using #2 Vicryl in a simple continuous pattern. Long handled instruments may be used; however, it is the author’s experience that this tends to complicate the procedure. The advantage of this procedure is that costly general anesthesia and surgery are avoided and outcomes have been favorable.

Good success has also been reported with solely medical management of Grade III tears. Management consists of flunixin meglumine, penicillin and gentamicin with metronidazole, and a laxative diet. Careful manual evacuation of the rectum may also be beneficial. Overall survival in this study was 75% with the tear progressing to Grade IV in the 25% that did not survive. Treatment should be continued until the peritoneal fluid cell counts return to normal, which took up to 7 weeks in this study.

Repair of Grade IV tears in post-parturient mares has been achieved by retraction of the small colon and rectum and stapling or hand sewing the tear. This may only be achievable in such mares due to the laxity present in the postpartum period. If minimal contamination is present and the problem is promptly addressed, a fair prognosis can be obtained.

References
