

Complete Postparturient Uterine Prolapse in HF Cross Bred Cow

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Abstract: A case of complete uterine prolapse in 9 years old HF cross bred cow was presented to Department of Veterinary Gynaecology and Obstetrics, Veterinary College, Hebbal, Bangalore. The uterine prolapse was replaced to normal position under epidural anesthesia followed by application of Bhuner's vulval sutures. The reoccurrence of the prolapse was noticed again by next 12 hours. The Bhuner's vulval sutures were removed and the prolapse was again repositioned to normal position.

Keywords: Uterine prolapse, Epidural analgesia, Bhuner's vulval suture.

1. Introduction

Prolapse or eversion of the uterus may be called casting of the "wethers" or casting of the "calf bed". It is observed most commonly in the cow and ewe, occasionally in sows and rarely in dogs, cats and mares. It occurs most often immediately after parturition and occasionally up to several hours afterward. In rare cases, it may occur 48 to 72 hours after parturition (Roberts, 1971).

2. Case History and Observation

A cross bred HF cow aged about nine years in her fifth lactation was referred to the Department of Veterinary Gynaecology and Obstetrics, Veterinary College, Hebbal, Bangalore, with the complaint of complete uterine prolapse of about four hours duration. The owner reported that the

animal had completed the gestation period and experienced dystocia during delivery which was relieved by a veterinarian by following mutation procedures. A live female calf had been delivered and about an hour later, the owner observed complete uterine prolapse with the membranes still attached. The veterinarian was called again who on examination immediately referred the case for further treatment.

On presentation, the animal was in standing posture with a completely prolapsed uterus hanging upto a point below the hock joint. The placenta was intact and soiled, the animal appeared restless, and exhibited intermittent abdominal contractions. The prolapsed mass appeared pink in colour with mild edema and did not exhibit any tears or lacerations. Physical examination of the cow revealed a normal colored conjunctiva, temperature, pulse and respiratory rate.



Uterine prolapse: Cow before and after replacement

3. Treatment

Following clinical examination, the cow was subjected for epidural analgesia (Lignocaine 2%, 6 ml), the soiled prolapsed uterus was washed thoroughly with warm water, the intact placenta was removed manually and the uterus was raised and supported to the level of the vulva and was replaced into the normal position as per the procedure described by Noakes et.al (2001). Bhuner's vulval sutures (Buhner, E., 1958) were applied followed by Oxytocin 30 IU

IM, Calcium Borogluconate 250ml Slow IV and Meloxicam 15 ml IM. The cow was admitted for further observation and treatment.

The cow was again presented next day morning and the owner complained that the animal was again restless throughout the night and continued to intermittently strain and the vulva had bulged. The animal not taken any feed but had passed urine and feces. The Buhner's sutures were opened and immediately the uterus prolapsed outside the

vulva. The prolapsed mass was again thoroughly washed with copious amounts of warm water and the mass lifted above the level of vulva, lubricated with small quantity of water based lubricating gel and replaced back into the abdominal cavity as per the procedure followed earlier occasion. Fortunately, the cervix was still found to be opened and the prolapsed mass could be replaced back through the cervix. Following replacement, the uterine cavity was filled with around 15 liters of warm water and subsequently siphoned out. The animal was again treated with 30 IU of oxytocin mixed in 5 % DNS, IV given slowly over a period of 30minutes. The animal was also infused intravenously with 250 ml of 20 % calcium borobluconate and another 250 ml subcutaneously. It was also injected with oxytetracycline at the rate of 22mg /kg bwt. Closure of the vulva with Buhner's sutures was however, not carried out this occasion and the animal again admitted for further observation. On vaginal examination twelve hours later, the cervix has considerably closed permitting only one hand to pass through. The owner reported that the animal was active, had stopped straining and has started consuming feed and water. The animal was discharged after another 12 hour later with a prescription of antibiotics.

4. Discussion

The presented case was fresh and the duration of the prolapse was very short (four hours), which helped us to replace to normal position without struggling much. The occurrence of uterine prolapse in this particular case seems to be affected by traction applied by the Veterinarian during delivery of the calf. In this particular case the reoccurrence of prolapse was could be due to straining caused by Buhner's vulval sutures which was applied previous day (Arthur et al., 2001). Hypocalcaemia plays an important role in pathogenesis of prolapse of genital tract (Robert, 1971) probably because of atony with prolapse created due to it. Odegaard (1977) is of the view that although the incidence is higher in heifers as compared to the animals up to fifth lactation and thereafter the incidence is higher again but it is the hypocalcaemia which play a dominant role.

It has been customary to insert vulval sutures to prevent the possibility of re prolapse. This practice is controversial. Many consider that it serves no useful purpose since, if the prolapse has been replaced correctly, it should not reoccur. It may even stimulate the cow to strain, allowing the prolapse to reoccur within the animal and thus not be detected. Others consider that, provided the cow is re-examined 24hrs later and the sutures are removed, it can prevent the reoccurrence of a complete prolapse which will be much more difficult to replace a second time. In the present case the cow was recovered uneventfully after removal of the Bhuner's vulval sutures and replacing the uterus to normal position.

In general, if Buhner's sutures are applied, it is advisable to reexamine the cow 24 hours after the reposition of the prolapsed uterus. Posterior portion elevation for 2-3 days, feeding laxative diet, hygienic is surrounding to the animal and check for invagination of the tip of the uterine horns are the important points to be followed to restore good fertility of the cow.

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