A Case Report on Uterine Prolapse in an indigenous Cow and its Management

Dr. Pubaleem Deka¹, Dr. Gunajit Das²

¹Department of Veterinary Epidemiology and Preventive Medicine, College of Veterinary Science, AAU, Khanapara, Ghy-22
²Department of Veterinary Clinical Medicine, Ethics & Jurisprudence, College of Veterinary Science, AAU, Khanapara, Ghy-22

Abstract: A 4 year old indigenous cow with a history of hanging out of fleshy mass from the vagina and severe straining was presented which was diagnosed as a case of uterine prolapse. It was successfully managed by application of epidural anaesthesia and injecting hydroxyprogesterone and finally replacing the uterus into its normal position.

Keywords: Uterine prolapse, post-partum cows, indigenous cow, hydroxyprogesterone

1. Introduction

Uterine prolapse is an uncommon complication of parturition in the crossbred cows, but when it does occur, rapid effective treatment is required to ensure the survival, recovery and continued fertility of affected animal (Potter, 2008). In ruminants the prolapse is generally a complete inversion of the gravid cornua (Arthur et al., 1996) also called casting of the "wethers" or casting of the "calf bed". 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). Many factors such as poor uterine tone, increased straining, weight of retained fetal membranes, conditions that increased intra-abdominal pressure including tympany and excessive estrogen content in the feed have been associated in causing this complication. (Hanie, 2006; Jackson, 2004).

The aim of this case report is to highlight the correction and management of uterine prolapse of a crossbred cow in field condition.

2. Case History and Clinical Observation

A 4 year old indigenous cow weighing about 150 kgs was presented at Masuwa area of Barpeta Road, Assam with a calving history 8 hours ago and hanging out of a reddish mass from the vagina. The cow was off feed since then. On examining clinically, it was found that the animal was lying in sternal recumbency and there was complete eversion of the uterus exposing its foetal membranes and maternal caruncles underneath. The uterus was enlarged and oedematous with haemorrhage and the cow was severely straining. The respiration was slightly increased due to stress. The general health of the cow was poor. Based on the clinical examination, it was diagnosed to be a case of Uterine prolapse.

3. Treatment and Discussion

The case was managed by injecting Hydroxy-progesterone (Duraprogen, Vetcare) @2ml IM to contradict the oestrogen level as there was severe straining. Epidural anaesthesia with 2% lignocaine hydrochloride was given at the sacro-coccygeal region. A filled gunny bag was put under the hind-limbs in order to elevate the uterus. The uterus along with the perineal region was cleaned thoroughly with potassium permanganate solution. The foetal membrane was removed carefully from the maternal caruncles and Pop-in spray(Natural remedies) was applied over the uterus to reduce the oedema. At first the ventral portion of the prolapsed part was replaced followed by the dorsal part. The uterine pole was pushed ensuring that there was no invagination present and prevent recurrence. Finally shoe lace suture was applied by the use of non-absorbable plastic material. For supportive therapy 1000ml of 5% Dextrose was infused and an antibiotic course of Ceftiofur @ 1.1mg/kg body weight (Xyrofur, Intas) IM for 5 days was administered. Haemostatics (Texableed, Vet Mankind) @ 8ml total dose was injected IM along with antihistaminics and analgesics (Vetalgin, Intervet SPAH) to reduce the pain. Prolapse of the uterus normally occur during the third stage of labour at a time when the foetus has been expelled and the foetal cotyledons has separated from the maternal caruncles (Noakes et al., 2001). The prolapsed uterus is highly susceptible to trauma, laceration, haemorrhages, necrosis and infection leading to higher morbidity of the affected cow (Jana and Ghose, 2004), if not treated earlier. According to (Roberts, 1971) hypocalcaemia plays an important role in pathogenesis of prolapse of genital tract probably because of atony with prolapse created due to it. In this case, the prolapse was probably due to prolonged labour and severe straining because of high oestrogen level. After about 12 hours the owner reported that the animal has stopped straining and has started eating and drinking normally. The case was followed up for the next 7 days and the suture was removed on 7th day.

4. Conclusion

A prolonged stage of labour and severe straining can be a cause of uterine prolapse which can be successfully managed by replacing it into normal position and by application of strong suture material to avoid re prolapse, alongwith administration of supportive treatment with antibiotics, analgesics and fluids to prevent secondary bacterial infection to the prolapsed mass.
Figure 1: The cow with the prolapse uterus.

Figure 2: Application of Pop-in spray to reduce edema.

Figure 3: After successful replacement of the uterus into the normal position.

References


