

Successful surgical correction of ventral hysterocele in a goat

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ABSTRACT

A successful surgical correction of left side unilateral ventral hysterocele in a goat and its subsequent successful conception and parturition is reported.

Key words: Hysterocele, ventral hernia, caprine

Unilateral Ventral abdominal hernia resulting in hysterocele of gravid uterus is occasionally seen in goat and ewe during the last month of pregnancy (Arthur *et al.*, 1996). In majority of these cases, a severe blow on the abdominal wall is the exciting cause. Usually, this unilateral ventral hysterocele is commonly recorded on the right side of the abdomen in cattle (Krishnaswamy and Dubey, 1996) and doe (Balasubramanian *et al.*, 1991) and left side in case of mare (Roberts, 1972). Further, there is no report regarding the history of subsequent pregnancy and parturition. In this case report, a successful surgical correction of unilateral ventral hysterocele on the left side and subsequent successful conception and parturition are reported in a goat.

History and clinical observation: A non-descript two year old female goat (primi) in full term pregnancy was brought to the Gynaecology and Obstetrics ward of the Rajiv Gandhi College of Veterinary and Animal Sciences, Pondicherry with the history of being budded by a cow while grazing and soft swelling seen on the left ventral side of the abdomen.

The fetal mass and fluid thrill were felt on palpating the swollen area, suggestive of herniation of the gravid uterus through the abdominal muscles. The case was tentatively diagnosed as left ventral hysterocele. On vaginal examination, the vaginal passage was dry and

there was no sign of relaxation of the cervix. Elective caesarean section and herniorrhaphy to correct the herniation of the uterus were decided since the animal was in full term and dystocia was anticipated.

Surgical Procedure: Under xylazine sedation and local infiltration of lignocaine 2% (inverted "L" block), laprotomy was performed on the left lower flank region. Immediately after incising the skin and the cutaneous muscles, the gravid uterus was seen. Irregular tear in the transverse abdominalis muscle was also noticed along with local congestion. Hysterotomy was performed on the body of the uterus and two live male fetuses along with fetal membranes were removed, one from each uterine horn. The uterus was sutured by Lemberts suture technic with chromic 1-0 catgut. Before closing the uterus, ampicillin 1 G was infused into the uterus. The torn abdominal muscle layers were brought together in apposition and sutured by interrupted overlapping mattress suture with chromic No. 2 catgut. It was reinforced with simple continuous suture. The skin was sutured with horizontal mattress using braided silk thread.

Post-operatively, the animal was treated with parental antibiotics and anti-inflammatory drugs for five days. The skin suture was removed on seventh day after operation and the animal recovered uneventfully. In ruminants, unilateral ventral hernia with hysterocele is common on the right side of the abdomen (Roberts, 1972). In this case it was on the left side due to traumatic injury on the left side of the abdomen.

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Subsequent parturition : Seven months after the caesarean operation, the same goat was attended to the Gynaecology and Obstetrics ward with the history that animal came to oestrus around two months after caesarean operation and was mated to a male resulted in pregnancy and ended with safe parturition of a live female kid. The duration between the kidding and the first oestrus was around 60 days in does, which concurs with the normal range of 60 to 70 days (Honmade, 1977). However, it was brought for check-up for intermittent straining. This time there were no signs of herniation in the left lower flank, which was recorded in the last parturition due to trauma. On abdominal palpation, fetal mass was felt. Per vaginal examination revealed mummified fetus in the vaginal passage. Two mummified fetuses were removed one after another by gentle traction. The mummified fetuses were brown and rather leathery, moist on the surface with mucus without any signs of putrefaction. The goat was treated with parenteral injection of antibiotic for five days with supportive medications, which ultimately showed uneventful recovery. The co-existence of live fetus and mummified

fetus in-utero and its normal expulsion at the termination of gestation is not uncommon in polytocous species (Arthur *et al.*, 1996).

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