Management of dystocia with cervico-vaginal prolapse in a non-descript Doe

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Journal of Livestock Science (ISSN online 2277-6214) 8:134-136 Received on 13/12/2016; Accepted on 6/5/2017

Abstract

A full term non - descript doe in its 4th parity was presented with a complaint of dystocia and cervico –vaginal prolapse since a day. Aetiology of dystocia was found to be entanglement of foetal parts of multiple kids in pelvic inlet that lead to vagina to prolapse further making the delivery difficult. Dystocia was relieved under epidural anaesthesia and four dead foetuses were retrieved manually.

Key words: Non-descript doe, dystocia, cervico-vaginal prolapse, quadruplets.

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Introduction

Dystocia is difficulty in parturition, which may be due to maternal or foetal causes, and needs manual assistance to overcome the problem. In goats, among the foetal causes, dystocia due to postural abnormalities and twins/ triplets were common (Roberts, 1982). But, birth of quadruplets in goats was very rare and found to be 1.6% in pluriparous does of organized herds (Akpa et al., 2011). If more number of foetuses are present, they compete during stage 2 of parturition and often leads to dystocia due to lack of space. Many reports are available regarding uterine prolapse (Makhdoomi et al., 2010, Wachida and Kisani, 2011, Senthikumar, 2014) but very less information was available regarding pre partum vaginal prolapse that lead to dystocia in goats (Kahn, 2005) and was not reported regarding its occurrence simultaneous to dystocia due to quadruplets. A vaginal prolapse usually starts at just cranial to vestibule-vaginal junction as a folding of vaginal floor which progresses till the cervix appear at the most caudal part of the prolapsus (Kahn, 2005). Cases of dystocia must be attended as early as possible else, leads to death of dam, kids or both and may severely affect the fertility of the dam thus causing a great economic loss to the shepherd (Sharma et al., 2014). In the present communication we present a case of dystocia due to quadruplets complicated by cervico-vaginal prolapse in a non-descript doe and its successful management.

Case history and Clinical observations

A full term non-descript doe in its 4th parity was presented to clinic with a difficulty in delivering kids since a day. History revealed that the owner tried to retrieve the kids that struck in the birth canal but in vain. Few hours later cervico-vaginal prolapse occurred.

On clinical examination, the doe was dull, dehydrated and straining intermittently to expel to foetus. Temperature, pulse rate and respiratory rates were 103.4° F, 82/ min and 18/ min respectively. The vagina and cervix were prolapsed (Fig. 1). The prolapsed mass was atonic, traumatised, inflammed, oedematous and heavily soiled with dirt, and part of foetal membranes hanging outside. On thorough cleaning with potassium permanganate lotion found that it was a cervico-vaginal prolapse in which complete dorsal and bilateral walls and half of floor of vagina was everted with part of the cervix conspicuous at the most caudal part of the prolapsus. The genital tract was dry and inflammed.



Fig. 1 cervico - vaginal prolapse



Fig 2. Four retrieved dead fetus.

Treatment and discussion

The doe was administered with 500ml RL and 2ml dexamethasone^a to prevent shock. Epidural anaesthesia was achieved by injecting 1.5ml of 2% lignocaine hydrochloride^b at sacro-coccygeal site. Urinary bladder was evacuated by lifting the prolapsed mass. Once again whole mass was irrigated with cold normal saline and Pop-in spray was applied. Later the mass was liberally lubricated with glycerine. The hind quarters of

a- Doctor's Vet pharma, Nellore; b- Astra-Zeneca; c- Natural Remedies, Bangalore; d- Intas pharma, Ahmedabad; e- Neospark ltd, Bangalore.

the dam were raised and the prolapsed mass was gently repositioned. Upon repositioning, a head and two fore limbs of two separate kids found struck in the dry pelvic inlet. Four dead foetuses (2 males and 2 females) were retrieved by mutation and careful traction (Fig. 2). The uterus was douched with normal saline and two furea boli^c were inserted in the uterus. Post operatively administered with 300ml DNS, 80ml of calciumborogluconate^a slow I/V, inj. Oxytocin 10 IU, inj. ceftriaxone^d 500mg, meloxicam^d 3ml, tribivet^d 3ml I/V and chlorpheniramine maleate^a 3 ml I/M. This treatment was repeated for 5 days and the ewe recovered well

Dystocia was one of the most important factors which lead to great economic loss. Twinning or triplets is common in goats and also one of the major causes of dystocia (Roberts, 1982). In the present case, due to intense uterine contractions in 2nd stage of labour the foetuses in either horn might have pushed in to the birth canal simultaneously and got entangled in the pelvic inlet owing to lack of space. This was evident by palpation of legs and head of different kids. Head of the kid struck in the birth canal was found to be twisted on retrieval because of the prior interference at the field level. Dystocia was relieved under sacro-coccygeal epidural anaesthesia (Makhdoomi et al., 2010) by mutation and careful traction. In the present case, the doe was in its 4th parity supporting the observations of Akpa et al (2011) that the birth of quadruplets was very rare that too in does above 3rd parity. In multiple births in caprines, male progeny were predominant (Akpa et al., 2011), but here two male and two female kids were born.

Factors responsible for pre partum vaginal prolapse include excessive relaxation of pelvic ligaments, increased intra abdominal pressure by gravid uterus, large foetus, bloat, hypocalcaemia, clover poisoning (Drost, 2007), heredity (Kahn, 2005). In this case dystocia due to quadruplets lead to vaginal prolapse which further complicated parturition. The entanglement of kids in pelvic inlet and concurrent severe labour contractions might have forced the dorsal wall followed by lateral and floor of vagina to prolapse. Discomfort caused by this eversion, coupled with irritation and swelling of the exposed mucosa resulted in more extensive prolapse. Due to the action of Pop-in spray the prolapsed mass markedly reduced in size, which helped in easy repositioning of prolapsed mass (Tiwari et al., 2013). Administration of RL and calciumborogluconate counteracted the dehydration and uterine atony and oxytocin in increasing uterine tonicity.

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