

Dystocia due to Dog Sitting Posture with Lateral Deviation of Head in a Mare

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ABSTRACT

A case of dystocia due to dog sitting posture with lateral deviation of head in a mare and its successful management through fetotomy is reported here.

Keywords: Dystocia, Fetotomy, Lateral deviation, Mare

Parturition in the mare is an efficient and explosive event with all the three stages being over within 60 to 75 minutes in normal course. These highly coordinated events are crucial to the well-being of both the dam and the fetus (Steven, 2011) and it is one of the most difficult obstetrical challenges is the dog sitting posture (Card, 2002). The incidence of dog-sitting posture is reported to be 0.7% (Baldwin *et al.*, 1991). Equine dystocia is a true emergency and threatens survival of dam and fetus both (Freeman *et al.*, 1999). Although showing a lower incidence in horses than in cattle, defects of limb posture cause more serious dystocia in mares than in cows. Dog sitting posture along with lateral deviation of head has a very rare incidence and to best of our knowledge such type of case has not been reported in India, so far.

CASE HISTORY AND OBSERVATIONS

A four year primiparous mare (OPD-04-9426

dated 12.04.2017) suffering with dystocia was presented to Teaching Veterinary Clinical Complex, LUVAS Hisar. The case was handled by a veterinarian at field level with a failure to deliver the fetus. The animal was referred for further treatment. The animal was presented with history of severe straining and difficulty in foaling since last 16 hours after rupture of chorioallantoic bag. Owner had resorted to veterinary assistance where traction to both the forelimbs was advocated but could not be manipulated to achieve desired effect. Upon proper lubrication with liquid paraffin and epidural anaesthesia, per-vaginal examination was carried out. Per-vaginal examination revealed anteriorly presented dead fetus in dorso-iliac position with extended both forelimbs outside the passage and lateral deviation of head towards left side of fetus. Further examination, indicated presence of both the hind limbs in the birth canal beneath the fetal body. The case was confirmed to be dog sitting posture of fetus with lateral deviation of head.

TREATMENT AND DISCUSSION

Prior to any vaginal examination the mare's tail was wrapped with bandage and the perineal area was thoroughly cleansed. Animal was sedated prior to obstetrical procedure by using combination of xylazine (1.1 mg/kg) and ketamine (2.2 mg/kg) as bolus dose then maintenance dose with 0.35 mg/kg of xylazine and 0.7 mg/kg IV of ketamine starting 15-20 minutes after the initial dose. The perineal region was thoroughly washed and cleaned with antiseptic solution before obstetrical operation. Proper lubrication of birth canal was done with ample amount of liquid paraffin. Firstly, a loop of wire saw was made around the neck base by passing the fetotomy wire through the groove between deviated fetal neck and body with the help of wire guide. Subsequently, head with the neck was amputated by making fetotomy cut through the base of neck. Head and neck was removed. Secondly, detruncation was performed by making fetotomy cut at lumber region. Amputated fetal thoracic part was removed by Krey schottler hook and stump was repelled into the uterus. Obstetrical chains were applied to both the hind limbs and caudal part was removed easily by applying gentle traction. Placenta was removed manually. The mare was administered with fluid therapy (4 litres of normal saline and 3 litres of dextrose normal saline IV), antibiotic (4g of ceftriaxone IV) anti-inflammatory (50 mg of meloxicam IM), 70 mg chlorpheniramine maleate IM, tetanus toxoid 5ml and 10 ml vitamin B complex injection (Tribivet[®], Intas Pharmaceuticals Ltd) were administered. Four Cleanex[®] (Dosch Pharmaceuticals Pvt Ltd) boluses were placed intra-uterine. Each Cleanex bolus contains nitrofurazone 60 mg, metronidazole 100 mg, urea 6 g, and povidone iodine 60 mg. The complete treatment was advised further for five days.

The dystocia in equids is urgency and should be treated as early as possible. Many of the mal-disposed fetuses can be safely resolved for vaginal delivery by fetotomy if the fetus

is determined to be dead and if fetotomy is performed by skilled persons, otherwise, fetotomy is potentially hazardous for the mare (Higgins and Wright, 1999). One to two well placed fetotomy cuts can dramatically shorten the intervention time and permit atraumatic delivery of a nonviable fetus (Nimmo *et al.*, 2007). Transverse division of the fetal trunk posterior to the last rib using a fetotome is suggested as a means of fetal delivery (Youngquist, 1986) if the fetus is dead. It is suggested that due to the lack of proper space for mutation, fetotomy becomes a cumbersome event therefore, early election of caesarean may be the best option (Dugdale, 2007). In the present case, fetotomy was a wise decision as fetus was dead and animal was active and could afford the stress of fetotomy.

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