

MANAGEMENT OF DYSTOCIA DUE TO  
*Schistosoma reflexus* IN A NON-DESCRIPT BUFFALO

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### ABSTRACT

A pluriparous non-descript buffalo was presented to the Veterinary Clinical Complex with a history of difficulty in parturition for 10 h. After a thorough examination of the animal, it was confirmed that dystocia is due to the *Schistosoma reflexus* fetal monster. The monster fetus was delivered per-vaginally with the help of plenty of lubrication and slightly judicious obstetrical manipulations.

**Keywords:** *Bubalus bubalis*, buffaloes, non-descript, dystocia, *Schistosoma reflexus*, per vaginal delivery

### INTRODUCTION

A marked ventral curvature of the vertebral column along with the exposed thoracic and abdominal viscera are characteristics of the *Schistosoma reflexus* (Roberts, 1971). It is supposed to be a developmental defect leading to monster fetus resulting in dystocia (Laughton *et al.*, 2005). Although the exact cause is unknown, it might be a result of genetic factors, mutations, chromosomal

abnormalities, infectious agents, environmental variables, or a combination of all of these (Noakes, 2002). With the help of some obstetrical interventions, small sized fetal monsters in case of *Schistosoma reflexus* can be successfully delivered (Jana and Jana, 2013). In the present case, a non-descript buffalo underwent a successful vaginal birth of a *Schistosoma reflexus* foetal monster.

### HISTORY AND OBSERVATION

A pluriparous full term non-descript buffalo was presented to the Veterinary Clinical Complex, Acharya Narendra Deva University of Agriculture and Technology, Ayodhya with the history of severe abdominal straining along with the hanging of intestine through the vulva for 8 h with no progress in parturition. Disoriented fetus was palpated through the per rectal examination. On per vaginal examination, it was revealed that the cervix was fully dilated along with the protrusion of fetal organs through the vulva. There was a slight congestion of the protruded fetal viscera. The head and both the hind limbs of the fetus were present in the birth canal due to ventral curvature of vertebral column of the fetus. On the basis of history, per-

rectal and per-vaginal examination, the case was diagnosed as dystocia due to *Schistosoma reflexus*.

## TREATMENT AND DISCUSSION

The proper lubrication of the birth canal was carried out followed by evisceration of the protruding fetal content. The evisceration of the fetal content made sufficient amount of space for further obstetrical manipulations and traction was applied with the help of ropes on the head followed by two limbs. Slight judicious manual manipulations were also done such as retropulsion of one of the limbs of the fetus back into the uterus to ease in relieving the fetal monster. The fetal monster was relieved along with the fetal membranes. Further examination of the birth canal was also carried out to check for any apparent injury to the genital tract of the animal. The animal was treated with optimal fluid therapy, inj. Ceftriaxone and tazobactam 3375 mg IV, inj. Calcium magnesium borogluconate 1 ml/kg body weight IV, inj. Flunixin meglumine 1.1 mg/kg body weight IM. The fluid therapy, antibiotic therapy and NSAID are advised to continue for next 4 days. Herbal uterine cleansing agents are also advised orally for 5 days. The buffalo had started eating grass and drinking water from 2<sup>nd</sup> day onwards. The buffalo had displayed a smooth recovery. Animal owner was suggested breeding rest to avoid congenital anomalies.

### Description of the foetus

The monster was with grossly normal head. No foetal reflexes were present. There was an acute angulation of the vertebral column, causing the ankylosed hindquarters to lie close to the head (Figure 2). The diaphragm was intact and thoracic organs remains inside the thoracic cavity. The

abdominal wall was not fully developed, leading to all the abdominal viscera remaining outside (Figure 1 and Figure 2). The pelvis of the monster was deformed (Figure 2).

*Schistosoma reflexus* is a rare fetal monster commonly seen in cattle (Knight, 1996) as compared to buffaloes (Roberts, 1971). Of the total number of bovine dystocia's that occur worldwide, the prevalence of *Schistosoma reflexus* is about 0.01 (Sloss and Johnston, 1967) to 1.3%. It is supposed to occur during the post-gastrulation embryo with the involvement of the intermediate mesoderm, resulting in improper embryonic development (Laughton, 2005). Balamurugan (2020), previously reported the successful per-vaginal delivery of a foetal monster in a nondescript buffalo. For the diagnosis of the cases of *Schistosoma reflexus* in full term animals, per vaginal examination is needed to confirm the exposed viscera is of fetal origin. In the present case, the per-vaginal delivery is possible due to small size of fetus and availability of sufficient amount of space to make obstetrical manipulations.

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Figure 1. Protrusion of fetal viscera through the vulva.



Figure 2. Schistosoma reflexus fetal monster.

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