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CASE STUDY

SUCCESSFUL MANAGEMENT OF DYSTOCIA DUE TO EMPHYSEMATOUS FETUS IN A JERSEY CROSSBRED COW

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ARTICLE INFO	ABSTRACT
<i>Article History:</i> Received 07 th August, 2017 Received in revised form 20 th September, 2017 Accepted 14 th October, 2017 Published online 10 th November, 2017	A jersey crossbred cow suffering with dystocia due to emphysematous fetus and its successful management with per-vaginal delivery and ruptured uterus treated with uterine eversion technique has been discussed.

Key words:

Cow- jersey crossbred, Dystocia, Emphysematous fetus, Monster.

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INTRODUCTION

Dystocia is defined as delayed or difficult calving, sometimes requiring significant human assistance (Lombard et al., 2007; Zaborskiet al., 2009; Uzamyet al., 2010). In cattle and buffalo the incidence of dystocia is maximum compared to other farm animals (Purohitet al., 2011). Fetal emphysema is a frequent complication of parturition and a primary cause of dystocia in farm animals (Arthur et al., 2001). There is putrefaction characterized by formation of gases in the subcutaneous tissue within 24-72 h subsequent to the death of the foetus and the foetus becomes soft, decomposed and distended with gases (Sane et al., 1994). Srinivaset al. (2007) reported that 40.84 percent of dystocia in graded Murrah buffalo are due to fetal cause, among which head deviations were 42.22 percent. Amongst different reasons, the deviation of head and neck of fetus in anterior presentation are most common (Roberts, 1971) and may be in any direction (Das et al., 2009). The lateral deviation of head especially in a dead fetus becomes life threatening for the dam due to uterine contractions in inappropriately treated cases (Sane et al., 1994). The present communication describes a case of dystocia due to posterior presentation complicated by fetal emphysema in a crossbred cow.

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Case history

A jersey crossbred cow in its 2^{nd} lactation was presented with a history of a prolonged second stage of labor with forceful abdominal contractions and two hind limbs protruding from the vulva. This case already attended by the field veterinarian but could not succeed and referred it to Teaching Veterinary Clinical Complex, Namakkal. Animal was dull and depressed temperature- 39.5°C, anorexia and Per-vaginal examination revealed protruding the both hind legs of the dead foul smelling with emphysematous fetus (crepitation sound). P1 – posterior longitudinal, P2 – Doso – Sacrum, P3- both hind legs extended towards the birth canal. Foul smelling vaginal discharge. Further detailed examination confirmed the presence of an abnormal emphysematous fetus (Fig. 1).

TREATMENT AND DISCUSSION

The animal restrained by using 2 % lignocaine hydrochloride solution epidural (4 ml) and animal placed hydraulic table in TVCC, on lateral recumbence, gas from emphysematous fetus was removed by incision on the right lateral caudal aspect of the fetus by William's long obstetrical hook, after that excessive lubrication was applied on the fetus and also reproductive organ of the dam. Snare applied on both hind leg and four men traction was applied to deliver the anomaly dead emphysematous male fetus (38.5 kg body weight). Tear noticed on left lateral aspect of uterus after delivered the fetus.

Uterus was everted (Fig. 2) by uterine eversion technique by Selvarajuet al. (2009). The uterine ruptured (Fig. 3) was treated with suturing the tear (Fig. 4) line with no.2 catgut by cushing followed lumbert suturing pattern. The cow was treated with an inj. Ceftriaxone and Tazobactum - 10 mg/kg body weight I/M, inj. dextrose normal saline - 4 lit I/V, inj. Ringer's lactate - 2 lit I/V, inj. Meloxicam - (0.5 mg/ kg b.wt), inj. Oxytocin- 40 IU I/M, inj. Calcium -450 ml I/V, Bol. Nurea - 4no I/UT and inj. Chlorphenaramine maleate -10 ml I/M, oral uterine ecbolic- 450 ml Bid/day, Inj. Metronidazole was given 20 mg/kg body weight in divided doses for 5 days. the same treatment was given for 5 days continuously. The cow showed an uneventful recovery. Fetal emphysema is also a frequent complication of parturition and a primary cause of dystocia in farm animals (Arthur et al., 2001). There is putrefaction characterized by formation of gases in the subcutaneous tissue within 24-72 hours subsequent to the death of the foetus and the foetus becomes soft, decomposed and distended with gases (Sane et al., 1994).



Fig. 1.







Fig. 4.



Fig. 5. After treatment

REFERENCES

- Arthur, G. H., D. E. Noakes, T. J. Parkinson and G. C. W. England, 2001.Veterinary Reproduction and Obstetrics, 8th ed. WB Saunders Company Ltd., London, England. 868p.
- Das, G. K., Ravi Dutt, S. Ravinder Kumar, Deori and Uma Shanker, 2009.Dystocia due to fetal maldisposition in a buffalo.*Buffalo Bull.*,28(2): 59-60.
- Lombard, J. E., F. B. Garry, S. M. Tomlinson and L. P. Garber. 2007. Impacts of dystocia on health and survival of dairy calves. J. Dairy Sci., 90: 1751-60.



Fig. 3.

- Purohit, G. N., Y. Barolia, C. Shekher and P. Kumar, 2011. Maternal Dystocia in cows and buffaloes: A review. Open J. Anim. Sci., 1: 41-53.
- Robert, S. J. 1971. Veterinary Obstetrics and Genital Diseases (Theriogenology), 2ndEdn.C.B.S.Publishers and Distributors, New Delhi, India.p 61.
- Sane, C. R., B. R. Deshpande, A. S. Kaikini, D. P. Velhankar, S. B. Kodagali, S. N. Luktuke, V. B. Hukeri and V. L. Deopurkar, 1994. Reproduction in Farm Animals, 2nd ed. Varghese Publishing House, Bombay, India, p. 97.
- Selvaraju, M., M. Palanisamy, R. EzakialNepolean, K. Ravikumar, V. Prabakaran, R.Ravi and C. Chandrahasa, 2009. Eversion of uterus for successful repair of vaginal and uterine ruptures in buffaloes. XXV annual convention

of the Indian society for study of animal reproduction and international symposium on "Expanding the horizons of reproductive technologies for augmenting fertility in farm and pet animals in the global scenario". December 10 - 12.

- Srinivas, M., M. Sreenu, N. L. Rani, K. S. Naidu and V. D. Prasad, 2007. Studies on dystocia in graded Murrah buffaloes: A retrospective study. *Buffalo Bull.*, 26(2): 40-45.
- Uzamy, C., I. Kaya and T. Ayyilmaz 2010. Analysis of risk factors for dystocia in a Turkish Holstein herd.*J. Anim. Vet. Advanc.*, 9: 2571-2577.
- Zaborski, D., W. Grzesiak and I. Szatkowska 2009.Factors affecting dystocia in cattle.*Reprod. Dom. Anim.*, 44: 540-51.
