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<u>Case Report</u>

A rare case of dystocia due to conjoined Sternopagus twin monster of posterior presentation in a buffalo

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Abstract

Dystocia due to conjoined sternopagus twin in posterior presentation was delivered through caesarean section in a non-descript buffalo successfully.

Keywords: Buffalo, conjoined twin, dystocia, Sternopagus

Introduction

Monsters are mostly encountered in cattle with an overall incidence of one in 100,000 bovine births. Conjoined twins sometimes referred to as double monsters are twins arising from a single ovum and are monozygotic. These develop due to abnormal duplication of the germinal area, giving rise to fetuses whose body structures are partly but not completely duplicated which may be free or conjoined twins. In conjoined twins the two fetuses are not free but are joined at one or the other region ^[1]. These conjoined twins develop after the development of embryonic plate ^[2]. Depending upon the site of fusion or non-separation, the types of the twin may differ *viz.* thoracopagus (40%), omphalopagus (33%), pygopagus (18%), cephalopagus (2%) and ischiopagus (2%) ^[3]; (Fernando, 1993). Cause for these monsters involves mainly genetic factors, however it may range from physical, chemical and viral factors ^[3]. The condition is rarely reported in buffalo.

Case History

A four-year-old non-descript buffalo in her first parity having completed full gestation was presented to the OPD of Department of VGO, Veterinary College, Bidar with a ruptured allantois and extended second stage of Labour for more than 24 hours. Further, history revealed that after rupture of allantois, two limbs came into birth passage followed by non-progressive straining by the animal. A local veterinarian unsuccessfully tried to deliver the fetus by forced traction.

Clinical Observation and Treatment

On general examination, the animal was having good body condition, with rectal temperature of 100.1° F, slightly congested conjunctival mucous membrane, mild tachycardia and labored respiration. Observation of vulva revealed two fetal hind limbs protruding from vulva. Vaginal mucus membrane was congested with mild bruises and vulva was edematous. The gynaecoclinical examination revealed the presence of two separate hindquarters, four hind limbs, two in the passage and the other two flexed below one of the fetus. Tentatively diagnosed as monster and a fetotomy cut was given to one of the hind quarters, followed by a re-examination, which revealed two fetuses joined near sternum. Hence, diagnosed as conjoined twin fetus in posterior longitudinal presentation with dorso-sacral position. Due to the lateral recumbency of animal and edema of the vagina, less space was available for fetotome positioning and to avoid further edema of passage, it was decided against full fetotomy.

The caesarean operation was performed with local line infiltration of Lignocaine hydrochloride 2% at lower left flank with oblique incision and a conjoined twin monster was delivered. The surgical wounds were sutured as per the standard operating procedure. The animal was treated with antibiotics, analgesics and fluid therapy for five days and skin sutures were removed after 10 days, animal recovered uneventfully.



Fig 1: Conjoined sternopagus buffalo twin monster

Discussion

On gross examination, the fetus (Fig. 1) was conjoined at the thoracic region at the sternum and both the heads faced each other. The fetus possessed two normal heads with separate nostrils, eyes, ears, four forelimbs, four hind limbs and two tails. Further exploration of the monster revealed both twins were male with incomplete duplication of some of the systems. Thus, the condition of the fetus was confirmed to be dicephalus, distomus, tetraopthalmus, tetraotus, tetrabrachius, tetrapus, and dicaudatus conjoined sternopagus twin monster. Double monsters are most common group of fetal monoesters in cattle with an incidence of 33.1 percent ^[4] but very rare in sheep, pig, dogs, cats and horses. Dystocia is common sequelae of monstrosities in bovines ^[5]. Fetotomy, including evisceration is usually indicated to reduce the size of the monster to the point where fetotomy wire may be placed around the conjoined twins at the point of their attachment and separate them for removal. A caesarean section to relieve dystocia due to excessive size of the fetus requires a larger abdominal incision that may complicate the operation and aftercare¹. However, in the present case the incision on abdomen and uterus was carefully given to minimize the length of incision to avoid any complication, hence no postoperative complications were observed and the animal recovered promptly. Similar monsters were reported and delivered per-vaginally ^[6, 7], by fetotomy ^[8] and by caesarean section ^[9].

Conclusion

Conjoined twins monster with prompt diagnosis followed by timely intervention prevents the complication and delivered by caesarean section without complications in non-descript buffalo. The same is reported in here.

References

- Roberts SJ. Veterinary Obstetrics and Genital diseases. 2nd Edition. CBS Publishers and Distributors. Pvt. Ltd. New Delhi; c1971, p. 284.
- 2. Whitlock BK, Kaiser L, Maxwell HS. Heritable bovine fetal anomalies. Theriogenology. 2008;70(3):535-549.
- Fernando A. Practical Guide to High Risk Pregnancy and Delivery, 2nd ed. Baltimore, Mosby Year Book; c1993, p. 50-68.
- 4. Jackson PGG. Dystocia in cow. In: Handbook of Veterinary Obstetrics. WB Saunders Company Limited, London; c1995, p. 41.
- Sharma A. Caesarean section in animals under field conditions: A retrospective studies of 50 cases. Indian Veterinary Journal. 2006;83(5):544-545.

- Chanrahasan C, Krishnakumar K, Selvargan M, Richard PV, Jagatheesan, Saravanakumar VR. Dystocia due to dicephalus monostomus monster in cross bred cow. Indian Journal of Animal Reproduction. 2003;24(2):175-175.
- Sarma DK, Ahmed K, Baruah PM. Sternopagus conjoined twin monster in crossbred Jersey cow. Indian Journal of Animal Reproduction. 2013;34(1):66-67.
- Sunder Shyam, Sandeep Kumar, Gyan Singh, Ravi Dutt, Pandey AK. Delivery of A Dicephalus-Thoraco-Sternopagus Tetrabrachius Dicaudatus Monster In Buffalo. Indian Journal of Animal Reproduction. 2011;32(1):70-71.
- Singh G, Pandey AK, Dutt R, Sunder S, Sandeep Kumar, Chander S. Delivery of A Dicephalus Sternopagus Tetrabrachius Tetrapus Dicaudatus Monster in A Murrah Buffalo by Caesarean Section. Buffalo Bulletin. 2013;32(4):242-244.