doi:10.5455/vetworld.2013.116-117

Fetal dystocia due to dorso-pubic position and postural defects in a Jenny: A case report

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Received: 04-05-2012, Accepted: 08-06-2012, Published online: 01-12-2012

How to cite this article:
Chauhan PM, Sindhi SH and Thakor KB (2013) Fetal dystocia due to dorso-pubic position and postural defects in a Jenny: A case report, *Vet World* 6(2):116-117. doi: 10.5455/vetworld.2013.116-117

Abstract

Dystocia in Jenny is a very rare and occur occasionally, about 1 to 4 % of foaling. A present case of fetal dystocia in seven year old jenny has been reported due to dorso-pubic position and malpostures (includes left shoulder flexion and flexed neck). Fetus was corrected in normal position and posture through application of mutational operation and removeed dead male fetus through vagina after applying the proper traction. Then, she was treated with fluid therapy, antibiotic, analgesic, tetanus toxoid, nutrients etc. and discharged from the veterinary dispensary with advising the owner for post-operative care and management for further few days.

Key words: Dorso-pubic position, Dystocia, Jenny, postural abnormalities

Introduction

Jenny is very similar in many reproductive aspects to the horse mare [1]. The length of pregnancy period is 365 to 376 days but extreme variations range from 340 to 395 days and parturition is rapid and violent feature. Donkey dystocia or obstetric cases have been reported, but their true incidence & nature is still unknown and it was only occurring in 1-4% of all foaling [2]. Dystocia can be caused by either maternal or fetal problems. The majority of cases are reported by fetal problems, mainly malpresentation, abnormal position or posture of the fetus. The present case is a documentary record of abnormal position (dorso-pubic) and posture (shoulder flexion) of fetus in Jenny and it's successful management to relieve dystocia pervaginally.

Case history and observation

A seven years old jenny in her second parity with complete gestation period presented to Veterinary Dispensary, Dhanpur, Dist: Dahod, evincing the signs of parturition since last 24 hrs and water bags which had ruptured before few hours.

Jenny was dull and depressed with severe and frequent straining attempts to deliver the fetus in standing position. The placenta and extremity of one leg was found at vulvar orifice (Fig.1A). Rectal temperature was normal (101.4 ^{o}F). During per-vaginal examination, cervix was fully dilated and relaxed. A dead fetus palpated had anterior longitudinal presentation, dorso-pubic position with flexed left forelimb at shoulder joint lying beneath the body of the fetus. Forehead of fetus was palpable at pelvic brim with flexed neck.

Treatment and Discussion

Jenny was restrained in right lateral recumbency and using epidural anesthesia to minimize the straining. Postural defect of shoulder flexion was corrected by repulsion. For that, repulsion was performed at the shoulder joint and head of fetus to have an access to the hoof of the left forelimb lying beneath the body. The left leg was pulled up and brought into carpal flexion posture. The rope was applied at left fetlock joint to straighten the limb in the vagina. The position of fetus was corrected by rotation (180^{o}) from dorso-pubic to dorso-sacral. The head was flexed between the legs. Blunt eye hook was fixed on right orbit to apply the traction. A dead male fetus wrapped in placenta (Fig. 1B) was delivered by applying traction on head and both limbs after applying rope. In equine family, dystocia is most often caused by an abnormal presentation, position and posture of fetus. However, an increased rate of dystocia is commonly feared when Jennies are bred to stallions. Dystocia risks are increased in miniature donkeys because of the domed large forehead of some foals and following abortion due to malformation. In cattle, males are more frequently associated with dystocias than female fetuses and male carries one day longer than female one [3]. Dystocia due to postural defects but with normal position of the fetus in mare have been reported [4,5] which involved a male and a female dead fetus, respectively and with right forelimb shoulder flexion [6]. Whereas, dystocia in donkey due to malformation like schistosomus reflexus and fetal ankylosis have also been reported [7].

Abnormal position of fetus occurs in latter part of

Figure-1. Dystocia in Jenny with hangin of hoof and placenta at vaginal orifice

Figure-2. Dead male fetus with placenta

first stage or just prior to labor of parturition in mare and fetus is rotating from its dorso – pubic or dorso – lateral position in to dorso – sacral position and pass through the cervix with extension of head and fore limbs into birth canal which lasts about 1 to 4 hours (8). In the present case, restricted fetal rotation due to uterine inertia might have resulted in the dorso – pubic position. In equines, the uterus should be able to regulate fetal growth and reduce the rate of dystocia due to fetal-maternal disproportion. After relieving dystocia, four Furea boluses were placed in uterus and Inj. DNS (5%)-1 lit. was given intravenously. After a few minutes the jenny stood up and was administered intramuscularly with Inj. RC forte-4 g, Inj. Nemovet-10 ml, Inj. Tonophosphan-15 ml and Inj. Tetanus Toxoid-5 ml. Jenny was discharged from the dispensary advising the post-operative care and management for further few days.

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