

SUCCESSFUL MEDICAL MANAGEMENT OF VAGINAL HYPERPLASIA IN DOGS – A CASE REPORT

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INTRODUCTION

Vaginal hyperplasia is a common reproductive disorder in bitches, characterized by an exaggerated estrogen-induced response of the vaginal mucosa during proestrus and estrus, sometimes resulting in protrusion through the vulva. Rising estradiol levels stimulate epithelial proliferation, keratinization, and marked tissue edema, which may cause eversion of the vaginal mucosa (Jayakumar et al., 2018). Based on the extent of protrusion, it is classified into three types. Type I involves slight to moderate eversion without extending beyond the vulvar margin. Type II presents as protrusion of the vaginal floor or walls through the vulva, forming a tongue-like mass. Type III involves complete circumferential prolapse, producing a doughnut-shaped mass (Lokananda *et al.*, 2025, Bucci *et al.*, 2022). Prolapsed tissue may interfere with mating and is susceptible to trauma, laceration, ulceration, and urethral involvement. It is particularly common in young bitches during early estrous cycles. (Abhay *et al.*, 2025)

1. History & Clinical Presentation

A 3-year-old intact female Pit Bull was presented to veterinary clinical complex, Nagpur Veterinary College, Nagpur, with a history of a protruding vaginal mass associated with vaginal bleeding. According to the owner, vaginal bleeding had been observed approximately 10 days prior to presentation, and the bitch was reported to be in oestrus. The animal also had a history of reduced feed intake and depression. Vomiting was reported on the day preceding presentation.

On clinical examination, the rectal temperature was recorded as 103.2°F. The vulval region was markedly swollen. The exposed vaginal mucosa appeared pink to reddish, edematous and moist. Per-vaginal examination revealed an edematous vulva with a pear-shaped protruding vaginal mass, which was consistent with Type II vaginal prolapse.

2. Treatment

The prolapsed vaginal tissue was thoroughly cleaned using sterile normal saline to remove debris and minimize contamination. Sterile lubricant was then applied to maintain moisture of the exposed mucosa and reduce the possibility of further tissue trauma. Following preparation of the prolapsed tissue, gentle manual digital reduction was performed under aseptic conditions. The prolapsed vaginal tissue was carefully repositioned until it was completely returned to its normal anatomical position. Following successful reduction, the bitch was closely monitored for recurrence.

Medical treatment include the administration inj.Ringer's lactate – 100 mL, inj.DNS – 100 mL, inj.Ceftriaxone (Monocef) – 15–25 mg/kg, Inj.Pantoprazole (Pan-40) – 1 mg/kg Intravenously and inj.Belamyl 1ml and inj Hcg ((Folyson) 600IU intramuscularly. Following treatment, the patient recovered uneventfully, with no further recurrence of vaginal prolapse observed during the follow-up period.

3. Discussion

Vaginal hyperplasia is most commonly seen in young bitches during the follicular phase of their first to third estrous cycles and typically regresses spontaneously in the luteal phase (Devarajan et al., 2024). It represents an estrogen-induced response of the vaginal mucosa during proestrus and estrus, wherein rising estradiol levels stimulate epithelial proliferation, keratinization, and marked tissue edema, potentially resulting in eversion of the vaginal mucosa. Hormonal therapy with human chorionic gonadotropin (hCG) has been described as a therapeutic option for canine vaginal hyperplasia, primarily by inducing ovulation and thereby shortening the estrogen-dominant phase of the estrous cycle (Sengupta *et al.*, 2025). In the present case, the animal was in estrus, and the prolapsed tissue showed no evidence of injury or trauma; therefore, a conservative medical approach was considered appropriate and was found to be effective.

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