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Case Report

Perineal groove-a rare congenital defect of perineum

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ABSTRACT

Perineal groove is rare a congenital malformation usually affects female newborn. This is characterized by a red and wet groove lined with nonepithelized mucous membrane in the perineum between the posterior fourchette and the anterior margin of anal orifice. it is usually misdiagnosed as dermatitis, perineal trauma, or infection. Less than twenty-five cases have been reported in medical literature. We are reporting a case of congenital perineal groove and literature has been reviewed to improve the recognition and management of this rare anomaly.

Keywords: Perineal groove, Anorectal anomalies, Dermatitis

INTRODUCTION

Congenital perineal groove is wet sulcus with non-epithelized mucous membrane extends between posterior vaginal fourchette and anterior anal margin.[5] It resembles failure of epithelization of mid-perineal skin or failure of fusion of midperineum. This exposed mucous membrane is prone for local irritation, infection or urinary tract infection. Usually, this condition resolves spontaneously around two years of age.

CASE REPORT

A 5-month-old female baby was presented with a red perineal wound since birth. She was delivered normal. There was no history of any maternal illness during pregnancy. She was on breast feed. There was no faecal or urinary incontinence. Baby was examined on lithotomy position. There was wet groove like erythematous non epithelized mucous membrane extending from posterior vaginal fourchette to anterior margin of anal orifice in midline. Anterior half of the anal verge was formed by the posterior end of the cleft. There was neither bleeding nor maceration of the groove. The urethral canal, vagina and anal canal were at normal position. There was no spinal deformity. Ultasonography of abdomen showed no abnormalities in kidney, ureter or other organs. Echocardiography was normal. As self-epithelization occurs around two years of age so patient was kept on follow up and no active surgical treatment was done.

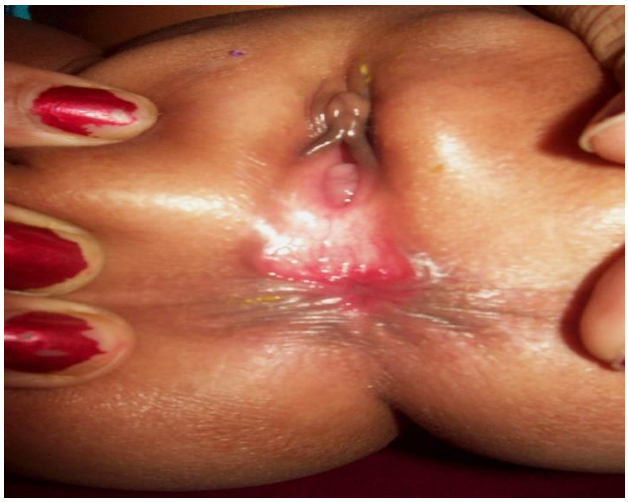

Figure 1: Wet sulcus with anterior defect in anus.

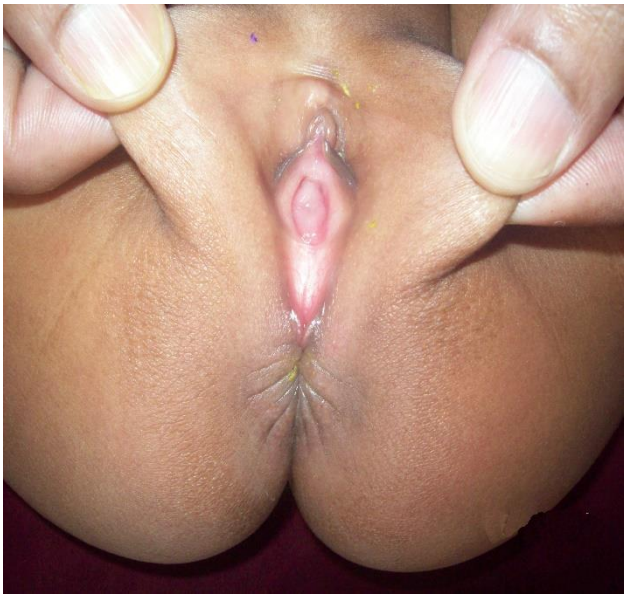

Figure 2: Perineal groove.

DISCUSSION

A perineal groove is a congenital wet sulcus lined with nonepithelized mucous membrane, extending from the fourchette to the anus. Clinically, the anomaly has three common features: 1) normal urethra and vagina; 2) hypertrophy of the minoral tails which course posteriorly to converge at anus. 3) A wet sulcus between fourchette and anus. The groove is variable in length and depth. The pathogenesis is still unclear. There are many hypotheses regarding development of perineal groove. This rare anomaly probably results from a fusion failure of genital folds during the embryonic development of the perineum. One hypothesis is it is due to remnence of open cloacal duct or it may be due to defect in uroanal septum.[3] Perineal groove is more common in female than male. In male this is associated with penoscrotal hypospadias with bifid scrotum.[2] The diagnosis of this rare anomaly is purely clinical. Perineal groove may be complete or incomplete. In complete the sulcus is present from vagina to anus but in incomplete it extends halfway either from vagina to mid perineum or from anus to mid perineum. The lesion is usually asymptomatic. Spontaneous epithelization occurs in about two years of age.[4] Surgical intervention is done only when spontaneous epithelization does not occur after two years of age or there is recurrent infection or mucous discharge. Although it may be associated with urinary tract anomalies so sonography should be done. With awareness of the lesion, surgery can be avoided.

CONCLUSION

Perineal groove is a rare anomaly of perineum commonly present in female baby and self-epithelization occurs usually in 2 years of age. Surgical intervention should not be done unnecessarily until there is associated infection or failure of epithelization.

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