Well Differentiated Villoglandular Papillary Adenocarcinoma of The Cervix: A rare case report

ABSTRACT

The Villoglandular papillary adenocarcinoma (VGA) is a variant of adenocarcinoma of the cervix. It occurs in young women having a favorable prognosis. Pathologically, VGA poses a diagnostic challenge. Here we present a rare case of a middle-aged female patient complaining of bleeding per vagina since1year. Histopathological examination reported it as a well-differentiated villoglandular adenocarcinoma of the cervix. This tumor as a separate entity should be recognised, distinguished from other variants of adenocarcinomas.Because of its good behaviour and favourable prognosis usually itsallow conservative treatment.

Keywords: Well-differentiated, Villoglandular, Papillary, Adenocarcinoma, Cervix.

Introduction:

Adenocarcinoma is the second most frequent carcinoma of the cervix[1].The villoglandular papillary adenocarcinoma (VGA) is a variant of adenocarcinoma of cervix. First it was described by Young and Scully in 1989[2,3]. In the review of literature, 56 cases have been reported. This tumor was included with other varieties of adenocarcinomas of the cervix and not as a separate entity in the past. Villoglandularpapillary adenocarcinoma of the cervix has favourable prognosis.When the tumor is superficial without vascular or lymphatic invasion, it can be treated by a radical hysterectomy.

CASE REPORT

A 46-year-old para 2 presented with a history of bleeding per vagina for three months.On per speculum examination, exophytic growth protruding from the cervix was noted for which a punch biopsy was done. The histopathological examination showed well villoglandular differentiated papillary adenocarcinoma. Later she underwent total radical hysterectomy and infracolic omentum. External surface of cervix shows grey, white to brown exophytic polypoid growth with papillary excresences measuring 6.5x5x4cm(fig 1). Cut section show growth involving cervix(fig2). Cut section of uterus show endometrial thickness is 0.2cm and myometrial thickness is 2cm.Cut section of both ovaries and fallopian tubes were normal. Microscopy examinationfrom growth of cervix show tumor cells arranged in the form of villoglandular and papillary structures with fibrovascular core infiltrated by inflammatory cells (fig 3, fig 4). These tumor cells are lined by columnar cells having stratified hyperchromatic nuclei with moderate cytoplasm and numerous mitotic figures. Adjacent area shows haemorrhage and necrosis. Endometrium, isthmus, vagina, and omentum is free from invasion. The right and left parametrium shows tumor infiltration. Both, ovary and fallopian

tubes were free from tumor deposits.4 isolated left and right external iliac lymph nodes show reactive changes and free from tumor deposits. Finally reported as well-differentiated villoglandular papillary adenocarcinoma cervix (FIGO stage IIb) (TNM stage- TIIbN0M0).

Fig 1: External surface of cervix shows grey, white to brown exophytic polypoid growth with papillary excrescences along with omentum and pelvic lymph nodes.

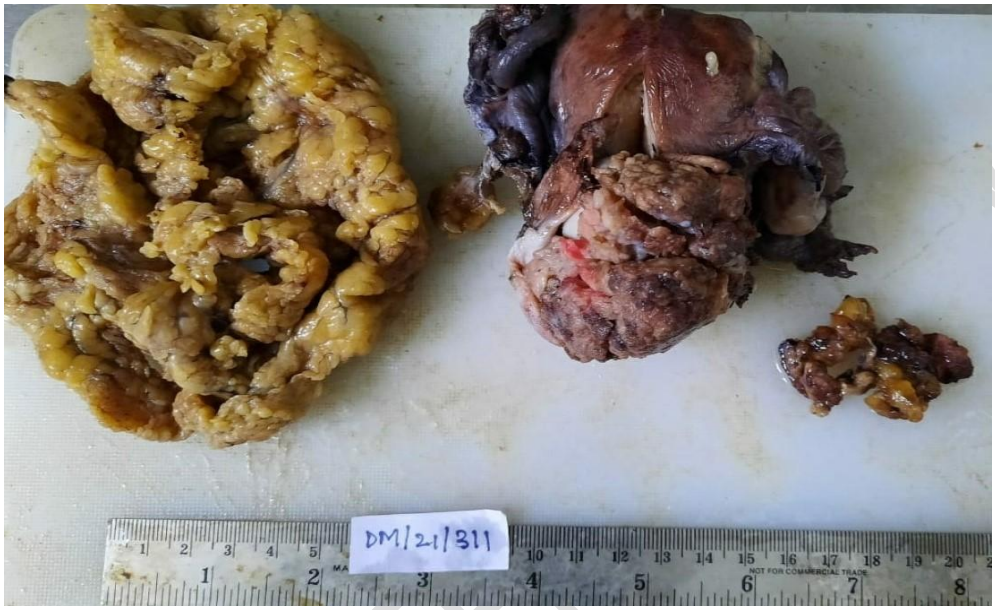


Fig. 2: Cut section show growth involving cervix.

Fig 3: Microscopic examination from the growth of the cervix shows tumor cells arranged in villoglandular and papillary structures with fibrovascular core infiltrated by inflammatory cells.

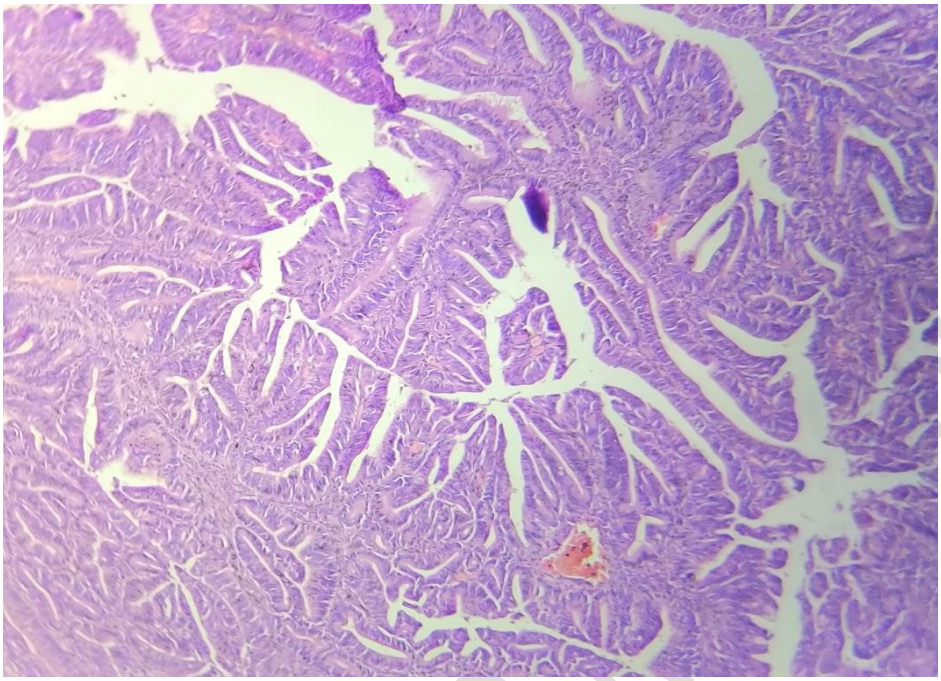
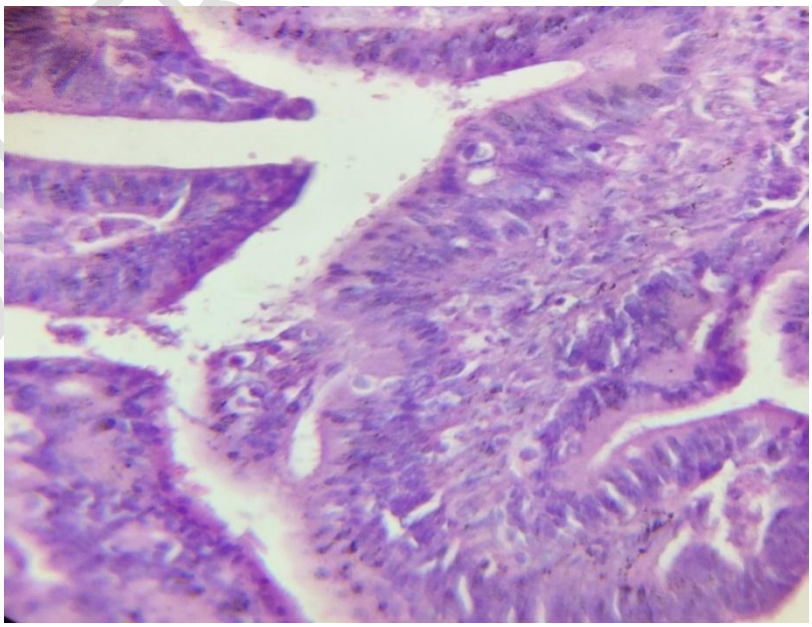


Fig4: Tumor cells are lined by columnar cells having stratified hyperchromatic nuclei with moderate cytoplasm and numerous mitotic figures



Discussion :

The cervical adenocarcinoma incidence is increasing. It accounts for one-fourth of all cervical carcinomas. Among these VGA accounts for approximately 4% of all cervical adenocarcinomas[6]. Adenocarcinoma usually affects women in their second to fourth decade. Aetiology of VGA is ambiguous. Many studies have found that underlying HPV infection might have been the causative agent of VGA. The first reported positive HPV-18 in VGA was published in year 2000.[7]Usually, patients present with vaginal bleeding or pelvic pain. Grossly VGA presents exophytic polypoid friable growth protruding from the cervix. Histologically it is characterized by tall and thin papillae lined by endocervical, endometrial or intestinal-type epithelium with mild atypia.[8] The characteristic histological features of various epithelia have been reported, and 1 or more layers of cells line papillae with endocervical, endometrioid, or intestinal differentiation. VGA are diagnosed and managed successfully with conservative measures. Radical hysterectomy is an adequate treatment for this variant of adenocarcinoma. The prognostic factors are tumour size,tumour grade and clinical stage. Wang et. al. concluded that stage is the most important prognostic factor with 5-year overall survival rates varying on stage: FIGO stage I - 79%, II - 37%, III / IV - less than 9%.[9] Studies reflecting on different types of cervical cancer[10-12], ovarian tumours [13-16] were reviewed.

Conclusion:

Clinician and pathologist needs to be aware this rare malignancy from uterine cervix. This tumor as a separate entity should be recognized, distinguished from other variants of adenocarcinomas. Because of its good behaviour and favourable prognosis usually it allows conservative treatment. This case is a confirmed well-differentiated VGA of the cervix characterized by an exophytic polypoid growth pattern with villoglandular and papillary structures with a fibrovascular core. These tumor cells are lined by columnar cells having stratified hyperchromatic nuclei with moderate cytoplasm and numerous mitotic figures. Recurrence rate of VGA's compared to other variants of adenocarcinoma of cervix is less.

Consent Disclaimer:

We have added the Consent Disclaimer in the revised paper. The revised paper is attached herewith this mail for your kind perusal. Kindly check the revised paper

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