

CARCINOMA OF VAGINA IN UTERO-VAGINAL PROLAPSE: A RARE PRESENTATION & LITERATURE REVIEW

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Summary

Primary vaginal carcinoma is a rare entity in gynaecological oncology. Genital prolapse associated with primary carcinoma of vagina is even more rare. We here report two cases of early stage of vaginal carcinoma associated with utero-vaginal prolapse treated by surgery & radiotherapy and the review of literature of same entity. A 65 yrs old post menopausal lady presented with irreducible utero-vaginal prolapse & foul smelling per vaginal discharge. A fungating growth was present on the middle part of rt. antero-lateral wall of vagina. Biopsy was taken from the growth & histopathology showed squamous cell Ca. A 75 yrs old multiparous lady presented with long standing ulcer in association with second degree uterovaginal prolapse. Biopsy of the ulcer revealed squamous cell Ca of vagina. As one of the most complicated therapeutic problems in gynaecological oncology, this disease had been deemed to be untreatable until the end of 1930s. Presently as a result of technological improvements in radiotherapy & radical surgery, more favourable prognosis are to be achieved. A patient with a long history of uterine prolapse must be treated with care due to the risk potential for malignant change. Any lesion associated with utero-vaginal prolapse need careful evaluation & should be subjected to biopsy to rule out the underlying carcinoma.

Key words

Squamous cell carcinoma; Vaginal carcinoma; Utero-vaginal prolapse.

Introduction

Primary vaginal carcinoma is a rare condition, accounts for 1-2% of all female genital tract malignancies [1]. The incidence peaks during the sixth decade [2]. It is commonly located in the posterior upper third of the vagina & its common histological type is squamous cell carcinoma. The most frequent clinical symptom is vaginal bleeding, but dysuria & pelvic pain are also common [3]. Unfortunately the treatment of vaginal cancer is not yet completely defined, though a wide variety of treatment options is available depending on the degree of tumour infiltration & prognostic factors. Conservative treatment is effective for precancerous lesions, surgical therapy for early stage of infiltrating cancer & radiotherapy for progressive lesions [3]. Although there have been a handful of international reports on uterine prolapse combined with vaginal cancer, there has been none so far domestically. With a review of related literature, we report two cases presented to our hospital with early stage of vaginal cancer developed in the long standing utero- vaginal prolapse.

Case Report 1

A sixty yrs old post menopausal lady presented with complaints of something coming out per vagina for the last 10 yrs along with foul smelling per vaginal discharge and pelvic pain for the last one & half months. Physical examination revealed irreducible utero-vaginal prolapse & a fungating growth about 3 cm.4cm occupying the middle part of anterior & rt. Lateral wall of vagina. There was no involvement of parametrium, urinary bladder or rectum. The cervix & vulva were normal. Inguinal lymph nodes were not palpable. Biopsy was taken from the fungating growth. Histopathology showed squamous cell carcinoma of the vagina. She was diagnosed as FIGO stage I primary vaginal cancer with third degree utero-vaginal prolapse & . radical vaginal hysterectomy was done & She was referred to Radiotherapy department.

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Fig 1 : Irreducible utero-vaginal prolapse with fungating growth on rt. lateral vaginal wall

Case Report 2

A 75 yrs old multiparous lady presented with complaints of something coming out per vagina for 10 yrs. She had noticed ulcer in the prolapsed part which was associated with watery discharge. She gave H/O constipation but no tenesmus & blood stained stool. She denied any history of bleeding per vagina or other local or systemic illness. Pelvic examination revealed second degree utero vaginal prolapse & ulcerated lesion of 5cm.6cm with indurated base was present on the antero lateral vaginal wall with marked oedema of surrounding tissue. Ulcer was 3cm. away from the cervix & mobile over the underlying cystocele. Thus excluding the possibility of bladder involvement. The cervix & vulva were normal. Biopsy of the ulcer at vaginal wall revealed squamous cell carcinoma of vagina. The treatment performed was radical vaginal hysterectomy & excision of the whole vagina. Histopathology confirmed the well differentiated squamous cell carcinoma of vagina. The postoperative period of the patient were uneventful. After the operation the patient was referred to radiotherapy department for further management.



Fig 2 : Second Degree utero-vaginal prolapse with malignant ulcer on the antero-lateral vaginal wall

Discussion

Eighty four percent of vaginal cancers are secondary to the cancer arising from the adjacent organs, cervix(32%) endometrium(18%) colon & rectum(9%) ovary(6%) or vulva(6%) [4]. Primary vaginal cancers commonly develops in the upper third of the vagina. The appropriate diagnosis of vaginal cancer begins with the exclusion of other coexistent gynaecologic cancers. If vaginal lesions are connected to the cervix or vulva, it is primarily diagnosed as either cervical cancer or vulval cancer. Risk factors for developing vaginal cancer are bacterial infection, trauma especially after pessary or prolapse & HPV exposure. Daling et al reported that the invasive vaginal cancer has a strong correlation to HPV infection & HPV DNA was detected in 60% of such patients in a population based study [5].

Primary vaginal carcinoma associated with uterovaginal prolapse is rare pathology. Few cases of vaginal carcinoma associated with uterine prolapse are reported [6-9]. In presence of genital prolapse, vaginal carcinoma usually presents as an ulcerative lesion & it is assumed that continued irritation as well as chronic inflammation of the exposed vagina contributes to these ulcerative lesions [10]. In our case the patient had a history of prolapse for more than ten yrs. It is suggested that the patients with prolapse of long duration are more likely to develop malignant transformation.

The primary therapeutic consideration encompasses surgery, radiotherapy & chemotherapy [2,3]. The management of vaginal cancer depends upon its prognostic factors i.e patients age, location, size, degree of infiltration, clinical staging & histological classification. The incidence of lymph node metastasis is directly related to the size of tumours. Tumours from the lower third of vagina metastasize to inguinal lymph node & from upper vagina to common iliac & presacral lymph node.

Fonseca et al. examined cytologic, colposcopic & histologic findings in patients with uterine prolapse. The report showed chronic cervicitis in 97.9%, decubital ulcer in 13.6% & carcinoma in situ in 1% [11]. It suggests the importance of preoperative evaluation of cervix on uterine prolapse in order to exclude the possibility of cervical carcinoma. analysed a total of 154 patients with uterine prolapse who underwent hysterectomy & two patients were found to have cervical carcinoma [12]. As with concerns of possibility of vaginal cancer, if any changes in the epithelium or ulcer are suspected, preoperative biopsies are highly required.

Primary radiotherapy is the most common therapeutic modality, although surgical approach may be curative in stage I [2,3]. Advanced stage vaginal carcinoma with or without associated genital prolapse is treated with radiotherapy alone [9]. Stage I lesions involving the middle & lower third of the vagina are generally best treated by radiotherapy using a combination of intracavitary & external beam therapy. Lesions at the same stage involving upper vagina are often treated similar to primary cervical tumours utilizing comparable doses & treatment fields.

A patient with a long history of uterine prolapse must be treated with care due to the risk potential for malignant change. Early diagnosis with adequate treatment can minimize the morbidity & mortality associated with vaginal carcinoma. As few published cases of combined uterine prolapse & vaginal carcinoma, there have been no published reports that assess the management of primary invasive carcinoma of vagina associated with vaginal prolapse. Five year survival is 80% if diagnosed in first stage as compared to 35-50%, 35% & 20% in stage II, III, & IV respectively [13].

Conclusion

Any fungating or ulcerative lesion in vagina associated with long standing genital prolapse need careful evaluation & should be subjected to biopsy to rule out the underlying carcinoma. Treatment due to the rarity of this entity was controversial previously & current review of literature suggests surgical treatment with or without radiotherapy is the optimum treatment for early stage vaginal squamous cell carcinoma & radiotherapy for advanced stage vaginal carcinoma associated with genital prolapse. Early diagnosis with adequate treatment can minimize the morbidity & mortality associated with vaginal carcinoma. In conclusion, biopsy should be taken from a long standing ulcer in an uterovaginal prolapse as there is always a potential chance of malignancy.

Disclosure

All the authors declared no competing interest.

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