

A Rare Case of Malignant Melanoma of Vagina

Rizwana Habib Kant¹ · Shabir Iqbal² · Mufti Mahmood Ahmad³ ·
Javed Shafi³ · Sabia Rashid¹ · Preeti Sharma¹

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About the Author



Dr. Rizwana Habib Kant, Professor and Head of Unit in the Department of Obstetrics and Gynaecology, Government Medical College, Srinagar. She is life member of Society of Obstetrics and Gynecology, Srinagar. She is master trainer of EMOC programme and has received award for safe motherhood programme. She has numerous publications in national and international journals. Her areas of interest are Urogynaecology and Gynaecological Oncology.

Prof. Rizwana Habib Kant is a Professor and Head of Unit in the Department of Obstetrics and Gynaecology, Government Medical College, Srinagar, India; Prof. Shabir Iqbal is a Professor and Head in the Department of Plastic Surgery, Government Medical College, Srinagar, India; Dr. Mufti Mahmood Ahmad is a Associate Professor in the Department of Surgery, Government Medical College, Srinagar, India; Dr. Javed Shafi is a Lecturer in the Department of Surgery, Government Medical College, Srinagar, India; Dr. Sabia Rashid is a Postgraduate Scholar in the Department of Obstetrics and Gynaecology, Government Medical College, Srinagar, India; Dr. Preeti Sharma is a Postgraduate Scholar in the Department of Obstetrics and Gynaecology, Government Medical College, Srinagar, India.

✉ Rizwana Habib Kant
habibrizwana@gmail.com; sbrtrag@gmail.com

¹ Department of Obstetrics and Gynaecology, Government Medical College, Srinagar, India

Introduction

Primary vaginal malignant melanoma is a rare form of non-cutaneous melanoma [1]. It accounts for less than 1% of all malignant melanomas and less than 3% of all primary malignant tumours of the vagina [2]. The age of the onset of vaginal melanoma has been reported to range from 38 to 90 years, with most patients being diagnosed between the ages of 60 and 80 years [1]. Patients commonly complain of vaginal bleeding, vaginal discharge or a palpable mass. Unfortunately, vaginal melanomas are often only

² Department of Plastic Surgery, Government Medical College, Srinagar, India

³ Department of Surgery, Government Medical College, Srinagar, India



Fig. 1 Malignant melanoma of vagina

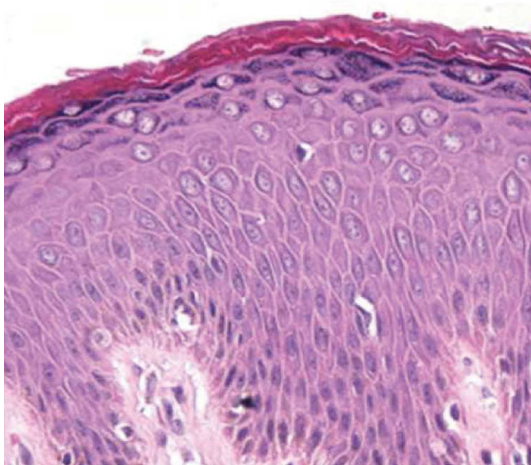


Fig. 2 Vaginal melanoma: histopathological picture

diagnosed at an advanced stage and treatment options include local excision with wide margins, radical surgery, radiotherapy, chemotherapy and immunotherapy. Currently, no standard treatment protocol has been established and the prognosis remains poor [1]. The present study describes a case of malignant melanoma of vagina and its management (Figs. 1, 2).

Case Report

A 40-year-old female para 4 live 4 (previous 3 LSCS) was admitted in our ward with chief complaints of foul smelling vaginal discharge and irregular bleeding per vaginum since 2 months with history of EUA and vaginal biopsy done in other unit. The histopathology of vaginal biopsy showed malignant melanoma (anterior vaginal wall with ectocervical growth), and endocervix revealed melanophages/

melanocytes in stroma. On examination, patient was afebrile with mild anaemia. Her vitals were within normal limits. Abdomen was soft, non-tender and non-distended. Per-speculum examination revealed blackish-coloured nodular growth in anterior and right lateral vaginal wall, nodule was felt in posterior wall, cervix was fixed, and indurating growth was felt. On per-vaginum examination, uterus was parous in size and right fornix fullness was felt.

Investigations

Her haemoglobin was 9.2 gm/dl. Other laboratory parameters (kidney function test, liver function test, serum electrolyte, blood sugars) were within normal limits, CA-125: 3.6, CEA: 1.54. Ultrasonography revealed hypoechoic nodular mass (3 × 6 cm) in the vaginal wall on posterior aspect, extending upwards up to the posterior fornix. Both lips of cervix were involved. (R) ovarian cyst was (8 × 4 cm), and (L) ovarian cyst was 3 × 2.7 cm in size. USG Doppler showed mitotic lesion involving the vagina, loss of interface with surrounding tissue, right adnexal cystic lesion. MRI was done which revealed diffuse homogeneous mass involving anterior and posterior cervical wall and anterior vaginal wall with intraluminal extension, focal indentation of rectal wall on axial images, bilateral ovarian cyst. The patient had normal cystoscopy, colonoscopy, sigmoidoscopy, CT head, CT chest and intravenous pyelography.

Patient underwent radical excision—hysterectomy with complete vaginectomy and lymph node dissection. This was followed by the reconstruction of vagina using skin from her inner thigh done in the same sitting by plastic surgeon. Histopathological report showed malignant melanoma of vagina with metastasis in one right obturator lymph node and cervix. The patient received radiotherapy in post-operative period. She received radiotherapy using cobalt 60 in dose of 45 gy/25 fractions to pelvis and 30 gy/10 fractions to bones. The patient remained admitted in the hospital for 3 weeks. She was followed up twice monthly for 3 months and thereafter monthly for 6 months. The patient is alive after 1 year and doing well.

Discussion

Malignant melanoma of vagina is a rare entity but extremely lethal. There is also high risk of recurrence, distant metastasis and short survival time [3]. It occurs mostly in postmenopausal women [1]. The most common location of the tumour is lower one-third of vagina [4]. Melanomas have a wide variety of size, colour and growth patterns [4].

The most common symptoms are vaginal bleeding, vaginal discharge and feeling of mass in the vagina. Mostly the growth is blue–black or blackish with plaques or ulceration, so any discoloured growth in vagina with complaints of vaginal bleeding should be suspected to be melanoma [3]. Pre-operative biopsy of growth should be done to confirm the diagnosis and provide definitive treatment.

Current therapeutic options for primary vaginal melanoma are local excision or radical surgery, radiotherapy, chemotherapy and immunotherapy, which can be used individually or in combination [3]. Radical excision (hysterectomy, vaginectomy and pelvic lymphadenectomy) has been the main stay of treatment [4]. The primary treatment should aim to completely resect the tumour from tumour-free surgical margins and evaluation of related lymph nodes for tumour involvement. Radiotherapy may be of value as an alternative to surgery or an adjunct treatment option in patients with vaginal melanoma [3]. Multiple traditional cytotoxic agents, including dacarbazine, temozolomide and platinum compounds both as single agents and in combination, have been evaluated in the treatment of melanoma, with limited or no success [2]. Despite these treatment options, the survival rate is approximately 10% at 5 years [4].

In conclusion, the most accepted treatment of vaginal malignant melanoma is surgery and post-operative

radiotherapy. The prognosis of vaginal melanoma remains poor with high risk of local recurrence and distant metastasis. In the present case study, patient underwent radical surgery followed by radiotherapy. The patient is alive after 1 year and doing well.

Compliance with Ethical Standards

Conflict of interest The authors declare that they have no conflict of interest.

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