Polyp-confined Endometrial Serous Carcinoma Simultaneity with Cervical Adenocarcinoma: A Case Report

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SUMMARY
The most common gynecologic cancer is endometrial adenocarcinoma, which presents mostly in postmenopausal women. There are two subtypes of endometrial cancer: type 1 with an endometrioid morphology and type 2, which represents only 10% of the cases but accounts for 39% of the mortalities.[1,2]

Uterine serous carcinoma (USC) as a rare and aggressive type, unlike the endometrioid type, is not associated with hyperestrogenism and atypical endometrial hyperplasia. However, the endometrial intraepithelial carcinoma is found to be a precursor of it and its associated with high BMI and hypertension.[3,4]

The presentation of patients with USC is often with extraterine disease despite minimally invasive involvement and has a poor prognosis in comparison with endometrioid type. Polyp-confined USC is a very rare form of uterine serous carcinoma.[3] The simultaneity of cervical cancer and endometrial cancer...
is unusual.[5] In this case, we present a polyp limited USC in a patient with concomitant cervical cancer and discuss its features.

**Case Report**

A 64-year-old G6P6L6 female who referred to our hospital in Tehran with a pap test of an atypical glandular cells; favor neoplastic (AGC-FN) interpretation. Her first chief complaint was postmenopausal bleeding. She had no significant past medical history except for hypertension since 10 years ago. Her family history of cancer is negative and she is in a normal range of BMI (=20). The patient denies history of any STDs and use of alcohol and smoke and never received hormonal or tamoxifen treatment.

Due to an abnormal pap test, colposcopy was carried out and it was in favor of cervical adenocarcinoma. As the sonography showed an increase in endometrial thickness, we brought her to the operation room for hysteroscopy.

Macroscopically, there was a 3*2*2cm solid, cream-brown with tip hemorrhage polyp in the uterine cavity and in microscopic view the uterine cavity mass (Fig. 1); nearly total infiltrated by neoplastic tissue composed solid sheets (more than 50%) and atypical villoglandular architectures and also atypical polymorphic giant nucleus cells. The patient underwent surgical management, including abdominal hysterectomy, bilateral adnexectomy, pelvic lymphadenectomy, omentectomy, appendectomy and pelvic washing.

Histologically, serous adenocarcinoma on polyp was seen, adenomyosis was not involved by carcinoma, and there were no signs of myoinvasion, lymphovascular and omentum involvement.

Immunohistochemically, endometrial mass sample for P16, P53, vimetin and PAX8 was positive with a high ki67 index (>75%), while ER and WT1 were negative (Fig. 2).

According to findings and FIGO staging system (2015) and also pTNM staging (AJCC-2017), the tumor was considered as stage 1A and chemotherapy was started for her with convenient results.

**Discussion**

Atypical glandular cell (AGC) in Papanicolaou (Pap) test interpretation for the detection of glandular neoplasia in the female genital tract is a challenging issue in gynecology. Although benign lesions are the most outcomes in the patients, high grade glandular neoplastic lesions of endometrium or cervix were seen in a significant subset of AGC cases. Importance of subcategory of AGC and age of patients in prognosticating the likely site of origin of the cervical lesion were discussed and noted in several studies. AGC-FN is more associated with glandular neoplasia and women of 50 or older ages are more identified to have endometrial carcinoma.[6,7]

In this case, we report a cervical adenocarcinoma and simultaneous detection of endometrial serous carcinoma within the confines of polyp without the involvement of myometrium and other parts of the endometrium, which is unusual and rare.

As the age of a woman advances above its fourth and fifth decades, endometrial polyps would be a common finding, and its likelihood with the presence of hypertension, tamoxifen therapy and obesity rises even more. Approximately 5.42% of endometrial polyps contain premalignant or malignant disease, but commonly, they are considered to be benign lesions.[2,4]

Endometrioid adenocarcinoma is the most common and uterine serous carcinoma (USC) is less com-
mon malignant lesions in endometrial polyps. USC, as an aggressive cancer, has an increasing risk of recurrence and metastasis. Although estrogen and progesterone receptor positivity have been reported in the USC cases in few studies, they are negative in almost all USC cases. Thus, they are not responsive to hormone therapy. In contrast, USC cases almost always have strong reactivity for P53, as our present case has. In a study, the value of immunohistology and its factors for treatment ends and distinguishing different types of involvement in order of time and place were discussed, but it remains debatable in the majority of conditions.

Concomitant endometrial cancers with cervical cancer in gynecologic oncology, are very rare conditions, and to date, few cases have been reported. It even becomes rarer when we have a condition in which endometrial cancer is limited in polyp like our present case.

Cervical and endometrial cancers showed up usually with early symptoms, such as vaginal bleeding. Thus, they were often diagnosed in stage 1. Cervix and endometrium should be closely inspected when abnormal vaginal bleeding occurs. To be more accurate, the postoperative pathological examination should be carried out and staging before and after the operation is necessary for determining the type of treatment.

Treatment strategies in these cases are remaining controversy. Adjuvant therapy, radiation therapy and surgery have been debated and everyone reported to be efficient in specific conditions.

In our case, as we had a specific condition besides similarities to a few studies, in tumor board, some recommended starting radiotherapy because of cervical involvement. However, we decided to start adjuvant chemotherapy after surgical management, and fortunately, now, she is in good condition with well follow up results.

**Conclusion**

Gynecologists should be aware of the condition in which the endometrial polyps might have cancerous lesions without involvement of myometrium and other parts of the endometrium, besides simultaneous cervi-
cal adenocarcinoma should be considered. Strategy for treatment is controversial but adjuvant therapy after surgical management showed good results.

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