

Leiomyoma of the ovary

Case report

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Summary: The leiomyoma of the ovary is a very rare form of ovarian neoplasia, while its uterine localization is very common and diffused. It occurs prevalently in post-menopausal women usually causing abdominal swelling and pain. Such a case occurred in our observation and we report it here.

Key words: Ovarian leiomyoma; Adnexal mass.

CASE REPORT

A 63 year old post-menopausal woman (para 2, gravida 0) came to our observation for lower abdominal pain. The gynecological history of the patient revealed a menarche at 13 years, normal menstrual cycles, 2 pregnancies at term and a menopause at 50.

She referred to no major illnesses, no surgery except for the excision of a mammary fibroadenoma forty years previously and no allergies.

The gynecological examination revealed an antverted small uterus, laterodeviated to the left by the presence, in the right pelvis, of a rubber-tight, large mobile, mass probably originating from the right ovary.

The ultrasound examination confirmed the presence of such a mass. It measured 125×95×98 mm in maximum diameters, prevalently solid, with several anechogenic areas, and re-

gular sharp borders. The uterus had non-uniform morphology and echostructure; it was dislocated towards the bottom by the mass and measured 68 by 28 mm in longitudinal and antero-posterior axis. The presence of liquid in the Douglas pouch also appeared.

The routine examinations were all within the normal limits and the patient could safely undergo a laparotomy.

After the opening of the abdominal wall, 10 cc of clear peritoneal fluid were aspirated and then used for bacteriological and cytological examination. The mass, clearly of right ovarian origin, was free of adhesions and was easily removed. Thereafter hysterectomy and left adnexectomy were performed.

The post surgical period was normal and the patient was discharged after seven days in good general conditions.

The histological response of the mass was unexpectedly a leiomyoma of the ovary. At low magnification, elongated vorticoso cell-bundles with abundant cytoplasm, anastomized to different degrees and closely packed, were visible (Fig. 1). At higher magnification small fusiform cells of monomorphic size and shape with abundant eosinophilic and fibrillar cytoplasm were evident. The nuclei were oval and elongated, containing small nucleoles and finely distributed chromatin.

Occasionally there were slightly atypical hyperchromic nuclei showing mitoses (2 mitoses / 10 fields) (Fig. 2).

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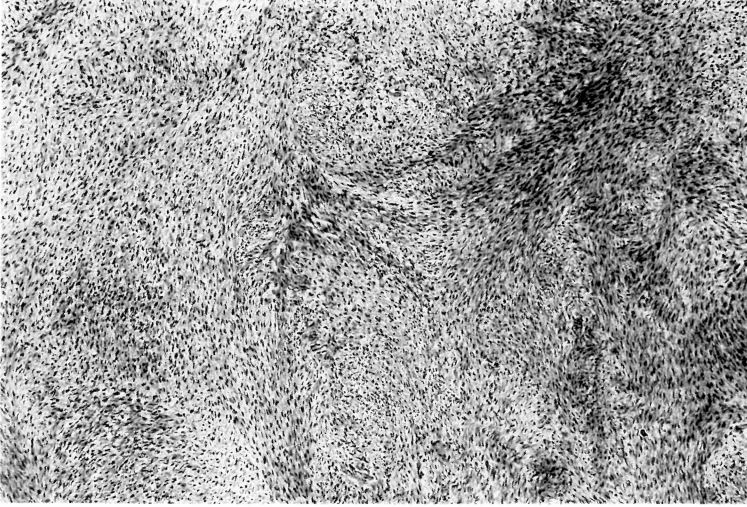


Fig. 1. — Spindle-shaped appearance of the neoplasia. $\times 80$.

COMMENT

The leiomyoma is the most common uterine neoplasm occurring in 20 to 30% of women older than 30 years of age. The ovarian leiomyoma, a very rare form of tumor, is histologically classified among the mesenchymal neoplasms. These in-

clude all primary ovarian tumors of connective tissue origin found in the ovary that are non-specific to it, but considered to originate from ovarian tissue, and not of teratomatous or surface epithelial origin (Mullerian) (¹). It is primary when it originates directly from the ovary. Sometimes it is secondary: in this case it is

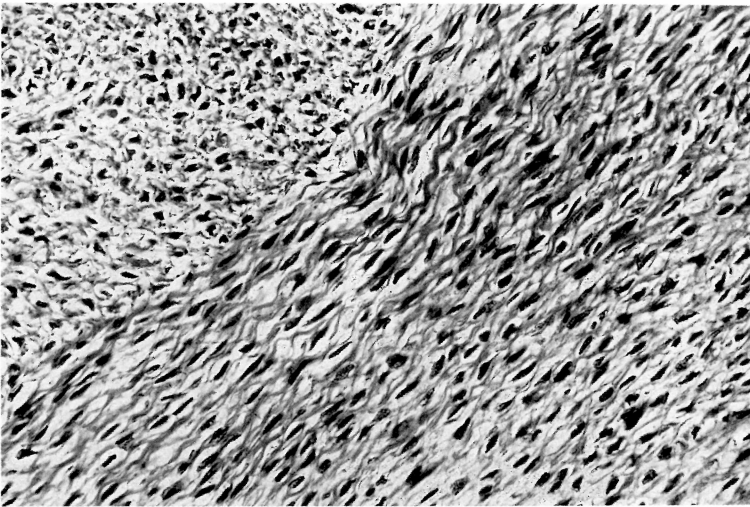


Fig. 2. — Slightly dysmorphic and hyperchromatic nuclei. $\times 320$.

a subserosal peduncolated uterine leiomyoma that loses its attachment to the uterus and takes connections with the ovary.

Certainly it did not occur in our case, since the uterus did not present any sign of leiomyomas. The origin of this kind of tumor is still unknown and debated but it is prevalently thought that it originates from the smooth muscle cells present in the walls of blood vessels in the cortical stroma of in the hylus, in the corpus luteum, or in the ovarian ligaments⁽²⁾.

It is more common in post-menopausal women and usually manifests itself with abdominal swelling and or abdominal pain, as in our case.

Histologically it is similar to the uterine leiomyoma being composed of smooth muscle cells. Mitotic activity is very low and cellular and nuclear pleomorphism is rare.

These are the features that distinguish it from a well differentiated leiomyosarcoma. Sometimes hemorrhage, necrosis, hyalinization and calcification may occur.

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