# MATURE CYSTIC TERATOMA AND FIBROTECHOMA IN THE SAME OVARY: A VERY RARE COMBINATION

# **Case Report**

# AYNI OVERDE MATÜR KİSTİK TERATOM VE FİBROTEKOM: ÇOK NADİR GÖRÜLEN BİR KOMBİNASYON

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#### **ABSTRACT**

Mature cystic teratoma, commonly called dermoid cyst, are the most common benign germ cell tumors of the ovary in women of reproductive age. Fibrothecomas are mesenchymal tumours derived from the ovarian stroma, which consists theca-like elements and fibrous tissue. They are usually unilateral and mostly seen in menopausal patients. Here we presented a case with mature cystic teratoma and fibrothecoma together in the same ovary in a young woman.

**Key words:** Fibrothecoma; mature cystic teratoma; ovary.

# ÖZET

Matür kistik teratoma, genelde dermoid kist olarak adlandırılır, reproduktif çağdaki kadınlarda overin en sık görülen benign germ hücreli tümörüdür. Fibrotekomlar teka benzeri elementlerden ve fibröz olusan, stromasından dokudan over kaynaklanan mezenşimal tümörlerdir. Bu tümörler genelde unilateral menopozal hastalarda görülürler. yazıda genç bir kadında matür kistik teratom ve fibrotekomun aynı overde birlikte bulunduğu bir olguyu sunduk.

**Anahtar Kelimeler**: *Fibrotekom*; *matür kistik teratom*; *over*.

### **INTRODUCTION**

Sex-cord stromal tumour are %8 of all ovarian neoplasms. They contain gonadal cell types which are derived from the coelomic epithelium of the mesenchymal

cells of the embryonic gonads (1). These lesions often occur in older menopausal patients (2). Mature cystic teratomas are classified as ovarian teratomas. They can be divided into 2 groups, mature (99% of all ovarian teratomas) and immature (1%), depending on their characteristics (3). They are also named as dermoid cysts. They are cystic tumors composed of well-differentiated derivations from at least two of the three germ cell layers (ectoderm, mesoderm, and endoderm). They are seen in younger ages (the mean age is 30) (4). Although fibrothecomas are seen in the menoposal period and dermoid cysts are seen in younger patients. In this case report we present a young patient with fibrothecoma and mature cystic teratoma in the same ovary.

#### **CASE REPORT**

A 34-year-old patient presented with 6 history of months pelvic Transvaginal ultrasonography revealed a 6 cm solid mass diagnosed as fibroid on the left posterolateral wall of the uterus and a complex adnexial mass with solid and cystic components on the left adnexial area which was diagnosed as dermoid cyst. Biochemical investigations, tumor markers and hormonal values were within normal limits. At exploratory laparotomy, there was a 15 x 12 cm conglomerated, two lobulated adnexial mass on the left side with adhesions to the uterine serosa on the posterior side and ascites was seen in pelvic cavity. No ovarian tissue was seen macroscopically. The mass excised and on gross examination a nodular shaped mass measuring 12x9x8 cm was detected. On the cut surface of this mass, a yellow to tan coloured nodular lesion adjacent to a cystic area full of greasy material and hair shafts was observed. Histopathological examination revealed fibrothecoma adjacent to a mature cystic teratoma. Patient was discharged on the second day of the operation without complications.

# **DISCUSSION**

Thecoma and fibroma are both ovarian tumours. Thecomas stromal histologically composed of lipid-containing cells that resemble theca interna cells. Fibromas are composed entirely or almost entirely of spindle, oval, or round cells forming variable amounts of collagen. The differentiation between thecomas and fibromas is occasionally imprecise because the histological immunohistochemical overlap between Fibrothecomas them (5). mesenchymal tumors deriving from the ovarian stroma and consisting of thecalike elements and fibrous tissue. The term fibrothecoma has been used on neoplasms which are intermediate between theca cell tumor and fibroma (6) The clinical presentation of ovarian fibrothecoma is relatively non specific. Patients complain of pelvic or abdominal pain and distension. Mostly ovarian fibrothecomas unilateral in 90% of all cases. They are usually solid, spherical, slightly lobulated, greyish white masses covered by glisening and intact ovarian tissue (7). These tumors are commonly misdiagnosed as exophytic fibroids or primary ovarian malignancy. Meigs sydrome, defined as ascites and pleural effusion, is seen in only 1% of cases of ovarian fibroma. Ascites alone is present in 10 to 15% of cases of ovarian fibromas over 10 cm in On sonography, fibromas diameter. appear as solid typically hypoecoic masses with attenuation of the acustic beam. They occur generally in older menopausal patient. However some authors report 2 peaks of frequency: the first peak of onset is after menopause and the second is between 20 and 40 years. Before the age of 20 is extremely rare (8).

Mature cystic teratoma is one of the most common germ cell tumors that are generally seen in women of reproductive age. It accounts for 10% to 25% of ovarian tumors. Most patients present with an asemptomatic adnexal mass discovered on a routine pelvic examination or with calcifications in the pelis revealed

on imaging performed for other indications (9). In the ultrasound a cystic teratoma is usually typically punctate with low-level echoic fluid and hyperechoic shadowing central component with a typical lack of vascularization (10). In this case with ultrasonography the teratoma was truely diagnosed but the mass which was mimicking myoma in the ultrasonographic examination, resulted as fibrothecoma by the pathologist. As we mentioned before these tumors are commonly misdiagnosed as exophytic fibroids. Fibroids that are subserosal in location may be confused with adnexal masses. To distiguish ovarian mass from pedinculed myomas ,demonstrating the vascular bridging sign or vascular pedicle between uterus and peri-uterina mass may be helpfull (10).

Although fibrothecomas are mostly seen in older women our case was a 34 years old patient. Also it was adjacent to a benign germ cell tumour in the same ovary, with disposing of all the ovarian tissue. Coexisting of mature teratoma and thecoma are rarely seen (11). Here we presented the coexistence of mature teratoma and thecoma in the same patient.

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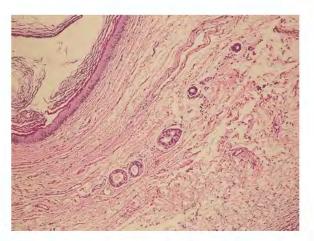
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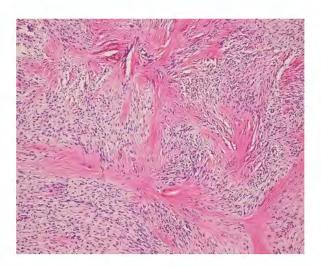
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**Figure-1:** Dermoid cyst of ovary; ectodermal component of mature cystic teratoma composed of keratinizing squamous epithelium and mature skin adnexia could be seen (H&E, x200).



**Figure-2:** Fibrotechoma of the same ovary; closely packed spindle cells in "feather-stitched" storiform pattern; and thecoma cells with clear cytoplasm within the hyaline bands were detected (H&E, x200).