

## A Giant Dermoid Cyst of the Ovary

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### ABSTRACT :

**Objective:** Teratomas are the most common ovarian neoplasms that occur especially during the reproductive age. We report a benign cystic teratoma with an unusual size. In a 17 years old patient, ultrasound examination revealed a mass of 37x37x37 cm. The mass had originated from the right ovary, filled the full abdomen and pushed the diaphragm to the superior. The patient underwent right salpingo-oophorectomy. The weight of the mass was 11.5 kg, which accounted for approximately 16% of the preoperative total body weight. Pathologic examination revealed benign cystic teratoma.

**Keywords:** Giant dermoid cyst, benign cystic teratoma

### İletişim Bilgileri

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### ÖZET:

#### Overin Dev Dermoid Kisti

**Amaç:** Overin Dev Dermoid Kisti Teratomlar genellikle üreme çağındaki kadınlarda ortaya çıkan, overin en sık görülen tümörlerindedir. Bu yazıda alışlagelmişin dışında büyüklüğe sahip dev bir benign kistik teratom olgusu sunuldu. 17 yaşındaki hastada ultrasonografide tüm batını dolduran, diaframı superiora iten 37x37x37 cm çaplarında, sağ over kaynaklı bir kitle saptanması üzerine opere edilen hastaya sağ salpingo-oopher-ektomi yapıldı. Kitlenin ağırlığı preoperatif tüm vücut ağırlığının %16'sını oluşturacak şekilde 11.5 kg olarak ölçüldü. Patoloji sonucu benign kistik teratom olarak rapor edilmiştir.

**Anahtar kelimeler:** Dev dermoid kist, benign kistik teratom

### INTRODUCTION:

Teratomas are the most common tumors of the ovary, which may be benign or malign. Benign cystic teratomas are designated dermoid cysts, which account for 5-44% of all ovarian tumors and 58% of all benign ovarian tumors (1,2). Surgery is the treatment of choice in dermoid cysts that usually occur in the fourth decade (mean age 35 years) (2,6,7). While the mean diameter of the tumors is between 7-11 cm (2,6,7), diameters up to 28 cm were reported (8). We present a case with an unusually large dermoid cyst.

### CASE:

A 17-year-old virgin patient presented to our clinic with abdominal swelling. She reported that the severity of her complaint had increased within the last three months. Physical examination revealed a hard mass filling

the abdomen completely and extending to the lower margin of the sternum. The patient had no other physical finding and her medical history did not reveal any pathology. An expansive cystic mass of 263x371 mm with vejetan components was detected in the ultrasound examination, which seemed to fill the abdomen completely and to push the abdominal organs to the periphery. Abdominal tomography examination revealed that the mass had a lobulized contour, a regular margin and a thin wall as well as septations and a significantly contrasting solid component, which originated from the posterior wall of the cyst in two localizations. The cyst seemed to have originated from the right ovary, filling all the quadrants of the abdomen and displacing the adjacent structures. The level of tumor marker CA125 was high (52 U/mL), whereas CA-19, CEA, CA15-3 and AFP were within normal limits. The patient underwent laparotomy, which revealed a cystic mass of 35-40

cm originating from the right ovary, filling the abdomen completely and displacing the diaphragm to the superior (Figure 1).

**Figure 1:** Intraoperative image of the mass.



Uterus and the other ovary seemed normal. The mass was extracted by right salpyngo-oophorectomy. The size of the mass was 37x37x37 cm and it weighed 11.5 kg (Figure 2).

**Figure 2:** The mass weighed 11500 g in a 10 g sensitive scale



The preoperative body weight of the patient, which was 72 kg decreased to 60 kg after the intervention. Pathological examination revealed benign cystic teratoma. The patient was re-operated due to intraabdominal hemorrhage at postoperative 6 hours and hemostasis was achieved. She was discharged on postoperative day four.

## DISCUSSION:

Teratomas are common tumors that occur at any age with a low likelihood of complication and malignant transformation (2). They originate from the primordial germ cells that migrate to the ovary in the yolk sac (3) and are characterized by the presence of endodermal, mesodermal and ectodermal tissues (3,4). Teratomas have a viscous adipose

content and they contain mature tissues such as hair, bone and glial tissue.

Although teratomas occur at any age, they most commonly occur at a mean age of 35 years (2,6,7). They are usually unilateral with a bilateral appearance of 10-15% (3,6). The patients are usually asymptomatic. The most common complications are symptoms due to compression, pelvic pain or a sensation of mass. Teratomas may cause acute abdomen in case of torsion or rupture. The treatment of dermoid cysts is based on laparoscopic or laparotomic surgery (7). The surgical method is selected according to age, desire for fertility and other pelvic pathologies (6).

The mean diameter of dermoid cysts is reported between 7-14 cm (2,6,7,8). The size of the mass in our case was 37x37x37 cm, which accounted for 16% of the preoperative total body weight (11.5 kg). A prepubertal case with a cyst of 33x41 cm (5) and a giant dermoid cyst of 42 kg, which was masked due to obesity (9) were reported.

Malignant transformation may develop in 1-2% of teratomas (3,6). Although this rate seems low, malignancy should be considered for rapidly growing unilateral tumors in patients over 40 years of age (1). Histopathological examination revealed benign pathology in our case although it seemed to grow very rapidly.

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