

Case Report

Cystic Lymphangioma of Adrenal Gland

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ABSTRACT

An 18 year old female presented with vaginal bleeding at 2 months of gestation. Ultrasonography revealed a large retroperitoneal cyst. Histopathological examination of the excised cyst showed features suggestive of a cystic adrenal lymphangioma. This case is reported because of its rarity and detection during pregnancy.

Key Words: Retroperitoneal cyst, adrenal cystic lymphangioma

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INTRODUCTION

Adrenal lymphangioma is a rare and benign lesion most often found incidentally during abdominal imaging, surgery or autopsy.

CASE REPORT

An 18-year old female presented with vaginal bleeding at 2 months of gestation (i.e. at 8 weeks of pregnancy). Abdominal ultrasonography was done to check for the status of embryo. The uterine cavity was empty suggesting a diagnosis of missed abortion. However a retroperitoneal cyst was found incidentally while doing ultrasonography. Computed tomography confirmed the presence of retroperitoneal cyst, which measured 16 x 10 x 10 cms and was seen displacing the right kidney. Surgical excision of the cyst was done 3 months after initial evaluation of the retroperitoneal mass by USG and CT examination.

On exploratory laparotomy, the cyst was identified in the retroperitoneal location and was found to contain straw colored fluid (Figure 1). The cyst was excised and sent for histopathological examination.

Gross examination showed a grey-white cystic mass weighing 15 grams with yellowish areas admixed with congested areas. The cut surface showed focally thickened areas with nodular yellow tissue. Histologically the cyst was partially lined by endothelial cells overlying fibro-collagenous tissue with areas of hyalinization, large dilated lymphatic channels, with smooth muscle hyperplasia, foci of ceroid laden macrophages and islands of compressed adrenal tissue in the wall (Figure 2). The endothelial cells were immunoreactive for CD34. A diagnosis of adrenal cystic lymphangioma was made.

DISCUSSION

Adrenal cysts are usually asymptomatic and are discovered incidentally at autopsy¹. Currently, due to increased use of imaging, increased numbers of adrenal cysts are reported¹. They occur at all ages, with a peak in the 3rd to 6th decades, a definite female preponderance, and bilaterality in 10% of cases¹.

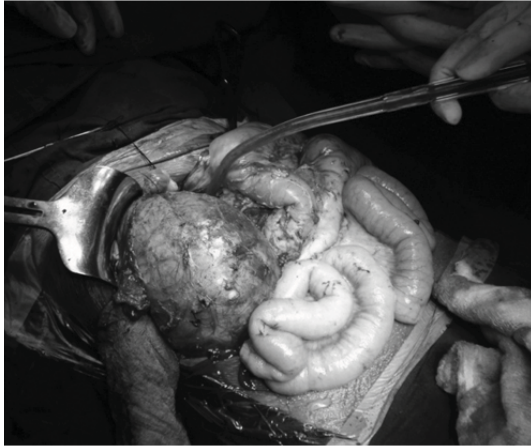


Fig. 1: Intra-operative picture: cystic mass mobilized below the liver.

Small adrenal cysts are clinically silent. Large ones may cause abdominal discomfort, loin pain, gastro-intestinal disturbances or acute abdomen due to intracystic hemorrhage, rupture or infection. Peripheral and curvilinear calcification is present in 15% of adrenal cysts¹.

Adrenal cysts are histologically classified as parasitic, epithelial, endothelial or pseudocysts; with endothelial cysts being the most common¹. They can be lymphangiomatous or angiomatous in origin.

Adrenal lymphangioma is a benign cystic tumor composed of dilated lymphatic vessels with a lymphoid stroma and a smooth endothelial lining². It results from faulty development or ectasia of lymphatic vessels². The cyst may contain serous or chylous fluid.

In our case, the patient presented with vaginal bleeding and the cyst was large. The

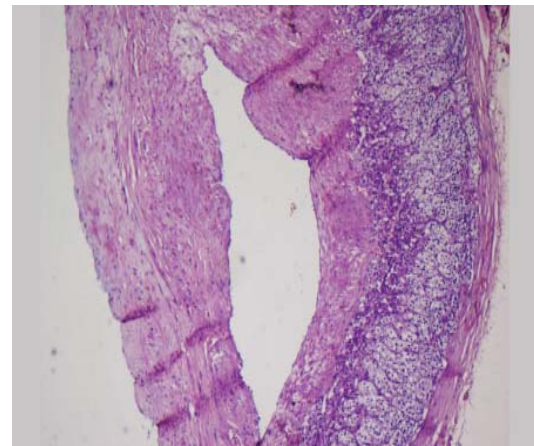


Fig. 2: Photomicrograph of cyst lined by endothelium and wall showing compressed adrenal tissue (H&E stain, 40X magnification).

diagnosis of cystic lymphangioma was made only after histopathological examination of the cyst.

The treatment of adrenal cysts depends on symptoms, size and complications. Malignant transformation is extremely rare³. The prognosis is generally good after removal of the cyst³.

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