ANDROBLASTOMA OF OVARY

(A Case Report)

by

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Introduction

Androblastoma of ovary is a rare neoplasm of sex cordstromal origin which causes defeminization and virilization of the previously normal female. In the past, this tumour was called 'arrhenoblastoma', implying that the tumour was invariably virilizing. Cases have been reported where the tumour was inert (Novak and Long, 1965) or even had paradoxical oestrogenic effect. Kempson (1968) suggested that the term Sertoli-Leydig tumour be reserved solely for those neoplasm with definite tubules and prominent groups of eosinoplihilic cells, Reinke crystals being an inconstant feature.

Histologically, androblastomas present marked variation from a highly differentiated to a marked undifferentiated form. On this basis, Robert Meyer (1931) classified the tumour into three types, Type I being most differentiated, whereas Type III, undifferentiated, and Type II having an intermediate degree of differentiation. Functionally, most of the hormonal activity of the Sertoli-Leydig cell tumour is dictated by leydig cell component.

The case presented here is one amongst 234 ovarian tumours studied at this institution over a period of 11 years (1967-77), forming an incidence of 0.43 percent.

CASE REPORT

Mrs. H. K., 25 years old, was admitted in the Govt. Medical College Hospital, Aurangabad for amenorrhoea of 3 years, lump in abdomen for 1 year and change in voice, 1 year. She was married 4 years back and was nulliparous. Menarchal age was 20 years. She had regular menses for first 6 months. General examination revealed pallor. Temperature was normal. Blood pressure was 120/80 mm. of mercury. The secondary sex characters were well developed. Abdomen was sott. A lump was palpated in lower abdomen about size of 22 weeks' uterus. Surface was smooth and it was firm in consistence. Rest of the systemic examination was normal.

Vaginal examination revealed hypertrophy of clitoris and infantile, pinpoint cervical os. The mass was felt in left fornix. It was firm. Uterus could be felt separate from the mass. The clinical diagnosis was virilizing ovarian tumour, left side.

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Investigation: Haemoglobin-8.8 g per cent fasting blood sugar 83 mg per cent, post meal blood sugar-115 mg per cent, blood urea-24.8 per cent. Blood group-O, Rh Positive.

Operative Findings: A cystic mass arising from the left way about 12 x 10 cm. with haemorrhagic area at one end was observed. The pedicle was twisted. There were no adhesions. The pedicle was clamped and tumour removed. Contralateral ovary was normal.

Pathology: Gross features (Figure 1). Oval swelling, 12 x 10 cm. capsulated with smooth surface and congestion, cystic in part. On cut surface, variegated appearance was noted. There were areas of haemorrhage and necrosis. The tumour was loculated. Locules contained straw coloured and haemorrhagic fluid. Some firm areas were seen.

Microscopically, (Figure 2), the Sertoli-cells were seen in groups of solid cords and the Leydig cells scattered in groups with plentiful of eosinophilic cytoplasm. Reinke crystals could not be found. Varying amount of congestion and necrotic areas were seen. The mesenchymal element was seen as spindle shaped cells separated by collagen.

Pathologic diagnosis: Sertoli-Leydig cell tumour of intermediate degree of differentiation.

Follow up of the case: The patient started getting regular menses after discharge from hospital within 2 months and conceived thereafter. Recently, she had a full term normal delivery. There were no congenital anomalies. Other findings in the follow up are as follows. The hoarseness of voice has not changed much. The clitoromegaly has reduced to some extent.

Disiussion

The present case gives an incidence of 0.43 per cent over a period of 11 years. Ramchandran *et al* (1972) reported an incidence of 0.1 per cent.

Histologically, this was a case of partially differentiated Sertoli-Lydig cell tumour. These as a single group are by far the commonest form of androblastomas.

Summary

A case report of androblastoma of ovary is presented because of its rarity. Clinically, the patient had amenorrhoea, lump in abdomen, hoarseness of voice and clitoromegaly. Post operatively the woman had regular periods and conceived later on. She gave birth to a normal male child. Histologically, it was a Sertoli-Leydig cell tumour of intermediate degree of differentiation.

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See Figs. on Art Paper V