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| Case | (237) Retroperitoneal hematoma due to rupture of angiomyolipoma (wunderlich's syndrome). |
| Authors | D. Riol Sancho, M.c. González Domínguez, E.r. Cevallos Castañeda, N. González Perera, A. Santana Hernández, J.a. López Déniz. |
| Centre | Complejo Hospitalario Universitario Insular-materno Infantil. |

## CASE PRESENTATION

A 47-year-old male presented with sudden onset of low back pain followed by a vasovagal presyncope while he was playing football. Pain persists after administration of the analgesia, and dizziness got worse when getting up from bed. At first renal colic was suspected, so it was ordered an abdominal x-ray.

However, it showed an effacement of the left psoas muscle that suggested a retroperitoneal process. Given the inespecifity of the clinic, the finding of the radiography, and the possibility of a blunt trauma, a three-phase CT study of the abdomen was performed.

Then, an exophytic heterogeneous renal mass was identified. It was composed predominantly of fat and vascular structures. There were also several thick hyperdense tracts and blood collections in the left perirenal retroperitoneum, in relation to acute hematoma. Signs of active bleeding were not found (no extravasation of contrast).

## DISCUSSION

Within the renal masses with macroscopic fat, it is necessary to highlight the angiomyolipoma. Renal angiomyolipoma is a benign renal neoplasm (the most common solid kidney tumor) composed by blood vessels, smooth muscle, and fat. The majority are sporadic (80%) and usually identified in adults with a female predilection (4:1).

The remaining 20% are seen in association with phacomatosis (tuberous sclerosis), appearing earlier, larger and more numerous. Angiomyolipomas are often found incidentally, or as part of screening in patients with tuberous sclerosis. The most characteristic symptomatic presentation is spontaneous retroperitoneal hemorrhage, which can produce hypovolemic shock (Wunderlich's syndrome). The risk of bleeding is proportional to the size of the lesion. Other symptoms and signs are palpable mass, pain in the flank, hematuria, renal failure or hypertension.

Radiological diagnosis will be based on the detection of macroscopic fat through CT or MRI, however, 5% of angiomyolipomas are fat-poor (33% in tuberous sclerosis). Calcification is rare.

The presence of fat is not pathognomonic of angiomyolipoma, since a small percentage of renal cell carcinomas may have macroscopic fat, but this is almost always accompanied by calcification. Retroperitoneal liposarcoma also presents calcifications.

The small angiomyolipomas do not require treatment, although follow-up is recommended to assess for growth. Larger or symptomatic angiomyolipomas may be embolized and/or resected with a partial nephrectomy.

## CONCLUSION

Retroperitoneal hematoma due to spontaneous rupture of angiomyolipoma (Wunderlich's syndrome).

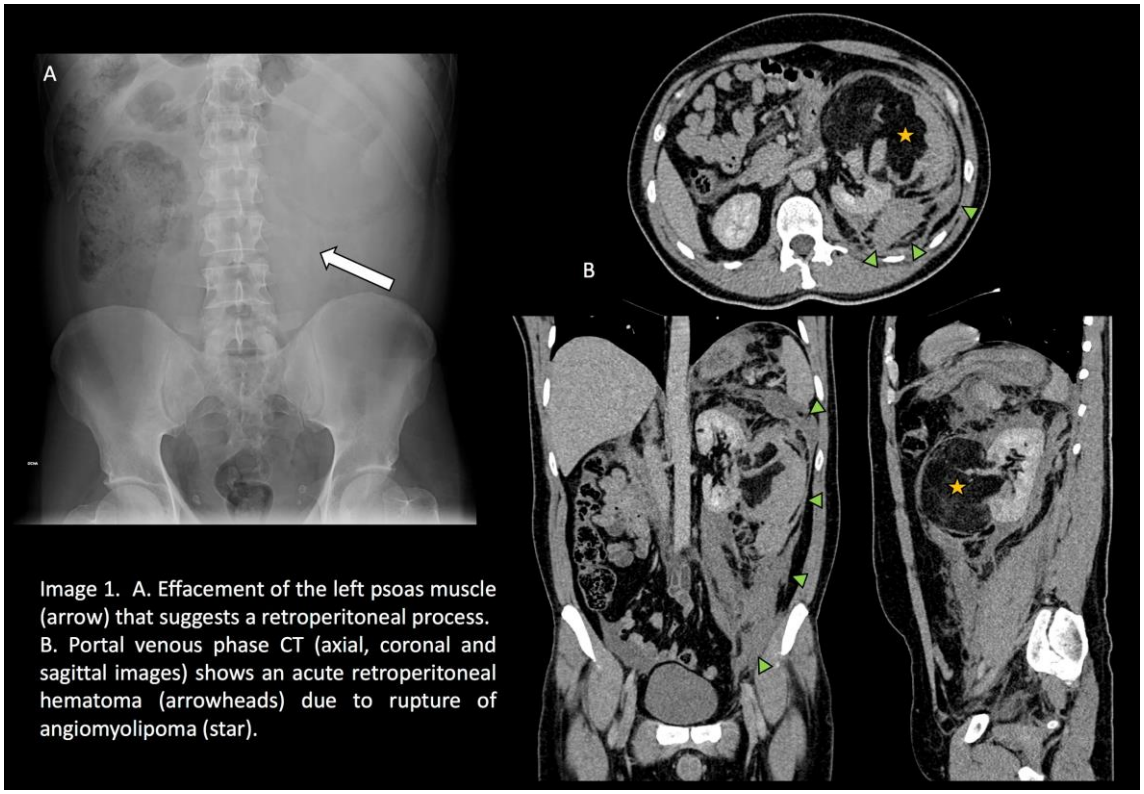


Image 1. A. Effacement of the left psoas muscle (arrow) that suggests a retroperitoneal process. B. Portal venous phase CT (axial, coronal and sagittal images) shows an acute retroperitoneal hematoma (arrowheads) due to rupture of angiomyolipoma (star).

## BIBLIOGRAPHY

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