

Case	(698) Sonographically diagnosed omental infarction
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## CASE PRESENTATION

A 64-year-old man is brought to our emergency unit with right-sided abdominal pain and mass, mimicking serious surgical pathology, without gastrointestinal symptoms and fever. Blood tests revealed an elevated C-reactive protein.

An initial ultrasound was performed suspecting an acute cholecystitis. No ultrasound findings were compatible with the diagnostic of suspicion. However, a focal area of increased echogenicity in the omental fat at the right lumbar quadrant was seen, that corresponded to the area of pain.

The study was completed with an abdominal CT scan that revealed a hyperdense oval shaped area in the subhepatic fat, a peripheral halo, and stranding of adjacent fat with an approximate size of 7 x 3 cm. It was also seen a central hyperdense image representing the thrombosed vascular pedicle. Diagnosis of omental infarction was made. The patient was treated conservatively, and his symptoms disappeared.

## DISCUSSION

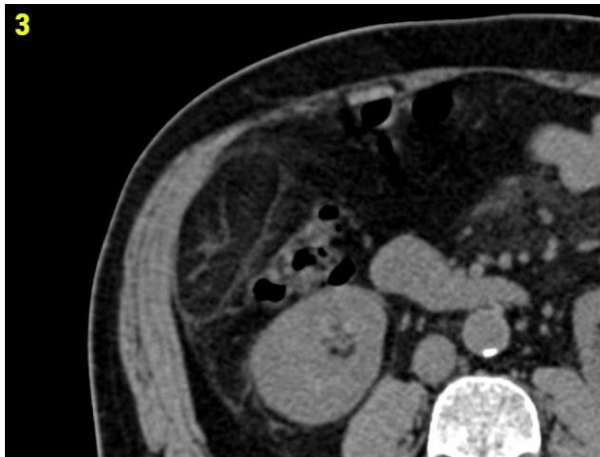
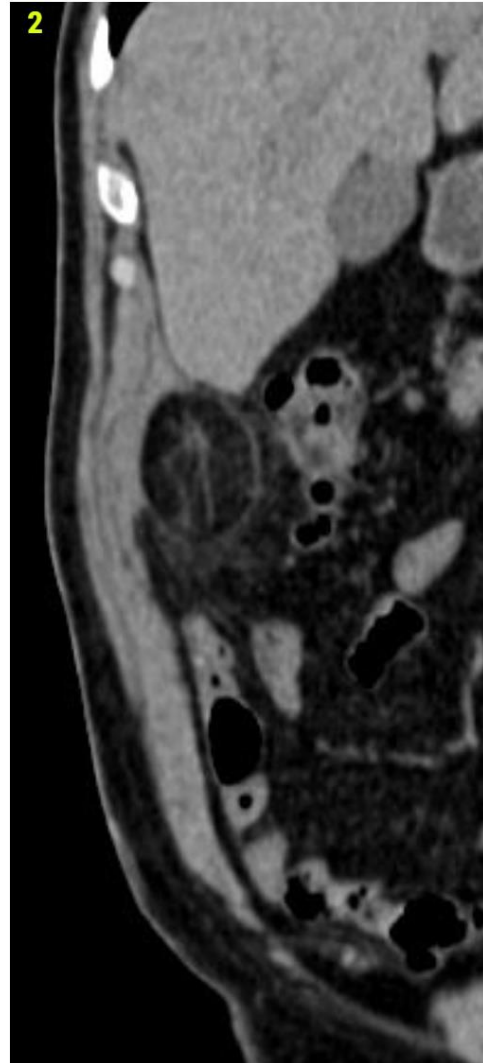
Omental infarction (OI) is a rare cause of acute abdomen that is resulting from vascular compromise of the omentum that can be classed as primary or secondary. Usually, the patients with OI present with subacute onset of pain in the right lower quadrant without other gastrointestinal symptoms. Even with that, most of the time it can be misdiagnosed for cholecystitis, appendicitis or pancreatitis. Accuracy and accessibility of CT imaging diagnosis has allowed preoperative diagnosis to be made much more often.

Even though US findings are usually evaluated as normal, sometimes, as in our case, it can be diagnostic. However, CT has much more sensitivity and specificity for the diagnosis of OI. CT findings include classically a large (>5 cm) encapsulated mass with soft tissue and hyperattenuated infiltration close to the ascending colon.

Swirling of the vessels has also been described in omental torsion and a central hyperdense image can be seen corresponding to the thrombosed vessel. It is crucial to appropriately diagnose this pathology since OI is a self-limiting condition that can be managed conservatively.

## CONCLUSION

Omental infarction is a self-limiting cause of acute abdomen that can be misdiagnosed for other pathologies with much higher morbidity and mortality. Diagnosis of OI is based on CT finding but, since US is often the first imaging study performed, radiologists should be familiar with sonographic features of this disease.



1. Abdominal US shows a subhepatic hyperechogenic oval mass.  
2 and 3. Notice the encapsulated fatty mass and the hyperdense "central dot".

## BIBLIOGRAPHY

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