

Volvulus of a wandering pelvic spleen: CT diagnosis with 3D reformatted illustration

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DESCRIPTION

A 55-year-old woman was admitted at the hospital for acute abdominal pain, nausea, vomiting and loss of appetite. The unique relevant information of her previous clinical story was an aberrant location of the spleen in the pelvis. This was detected with sonography (US), 24 years before, in relation to the same clinical presentation followed by a rapid spontaneous resolution. Present blood tests were normal. An abdominal US of the abdomen was then performed, confirming the pelvic location of the spleen. The ectopic spleen was homogeneous, and any other relevant findings were noted. A multislice CT of the abdomen was required to exclude splenic infarct and to detect another cause of the abdominal pain missed with US.

The CT showed a whirlpool configuration of the splenic vascular pedicle, with absence of ischaemic changes of the splenic parenchyma (figure 1). Volvulus of a wandering pelvic spleen (WS) was concluded. WS is an uncommon congenital or

Learning points

- ▶ Volvulus of a wandering pelvic spleen is an uncommon and difficult clinical condition to suspect and has to be added to the list of the acute abdominal non-traumatic disorders.
- ▶ Imaging (CT or sonography) contributes to the diagnosis of such splenic emergencies and helps to detect severity signs including vessel whirlpool configuration.

acquired condition related to the absence or laxity of the splenic ligaments; it is detected fortuitously or in the diagnostic workup of an acute abdominal pain related to its pedicle torsion.¹ WS has also been described in association with gastric volvulus.² It is reported in less than 2% of splenectomy and concerns children under 10 years and women between 20 and 40 years (childbearing age). Delay for the diagnosis leads to splenic infarct. CT is contributive for the diagnosis, showing the vascular whirlpool of the vascular pedicle and the optimal enhancement of the splenic parenchyma. The twisted vessels are better illustrated on three-dimensional reformations, but these are not reported based on our literature review. Surgery is required, splenopexy being preferred to splenectomy.³ In our case, splenectomy was done due to local technical constraints, with a favourable outcome on a 3-year delay.

Competing interests None declared.

Patient consent Obtained.

Ethics approval All procedures performed in our case involving the human participant were in accordance with the ethical standards of the institutional and national research committee and with the 1964 Helsinki Declaration and its later amendments or comparable ethical standards. Informed consent was obtained from the participant included in the study, which is retrospective.

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Figure 1 Three-dimensional reformation of the abdominal CT showing the whirlpool disposition of the splenic vasculature and the pelvic location of the spleen.



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