Gastroduodenal artery aneurysm

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DESCRIPTION

An 88-year-old female smoker presented with a 5-week history of constant epigastric pain. On examination, she was haemodynamically stable, tender in the epigastrium and had a palpable pulsation in the right upper quadrant. Her full blood count, liver function tests and amylase were normal. Abdominal ultrasound scan showed a normal gallbladder, biliary tree and abdominal aorta. However, an aneurysm adjacent to the left lobe of the liver was visualised. Contrast CT scan confirmed this to be a non-ruptured gastroduodenal artery aneurysm (figure 1), measuring 30 mm in diameter (figure 2).

Like all aneurysms, those of the visceral artery can be true or false; the latter arise secondary to inflammation as seen in acute pancreatitis and following procedures such as cholecystectomy. Aneurysms of the visceral arteries are uncommon, and of these, gastroduodenal artery (GDA) aneurysms account for only 1.5%. The vast majority of reported GDA aneurysms are false; true aneurysms are a rare finding.^{1 2}

Non-ruptured GDA aneurysms are usually asymptomatic; ruptured GDA aneurysms present with shock. Complications vary from gastric outlet obstruction to haemobilia. Gold standard investigation is visceral angiography, which also allows radiological embolisation. CT scan helps to

Figure 2 Coronal section of CT showing aneurysmal gastroduodenal artery (A).

delineate vascular anatomy in relation to surrounding structures when planning surgical repair, as this is the mainstay of treatment. Embolisation and stenting are possible endovascular options in uncomplicated stable aneurysms.¹ Our patient is listed for an elective radiological embolisation.

Learning points

- ▶ Visceral artery aneurysms of the gastroduodenal artery are very rare.
- ▶ Presentation is vague but rupture of such aneurysms is life threatening.
- ▶ Once identified, an early vascular input and intervention are important.

Contributors All the authors contributed equally to review of the images and critique of the text as well as follow-up of the patient information after her initial presentation and reviewing the revised version of the report.

Competing interests None.

Patient consent Obtained.

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Figure 1 Sagittal section of CT angiogram showing coeliac trunk (A), common hepatic artery (B) and an aneurysmal gastroduodenal artery (C).

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