

Endoscopic and percutaneous extraction of two biliary stents migrated to distinct abdominal locations

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DESCRIPTION

A 38-year-old woman presented with a history of progressive abdominal pain, fever and chills during the previous week. The pain was persistent and located in the right upper quadrant, had fluctuations in intensity, no precipitating factors and was associated with discrete local swelling.

The patient had a medical history of cholecystectomy performed 1 year earlier, which was complicated by a benign biliary stricture. This was subsequently treated by endoscopic retrograde cholangiopancreatography (ERCP)-guided insertion of two plastic stents (7 Fr 15 cm and 7 Fr 12 cm). The patient missed the follow-up appointments.

On the present physical examination she had fever (38.2°C) and had a soft abdomen with tenderness in the right upper quadrant with local inflammatory signs.

Analytically, there was raised C reactive protein, leucocytosis and derangement of the liver function tests with a cholestatic pattern.

Abdominal ultrasound and CT scan identified a 6 cm collection, suggestive of an abscess, in the right upper anterior abdominal wall, and dilation of the intrahepatic biliary ducts and common bile

duct with gallstones in situ. A tubular image was described in the lumen of the ascending colon (figure 1).

The overall features were suggestive of an obstructive biliopathy, abdominal wall abscess and foreign body inside the caecum. The patient was started on broad-spectrum antibiotics and a percutaneous drainage of the abdominal abscess was performed. During the drainage, a biliary plastic stent was found in the abscess cavity.

Subsequently, serial abdominal X-rays raised suspicion of an impacted stent in the ileocaecal valve. Total colonoscopy was performed and a biliary stent was found embedded in the caecum wall. It was carefully removed under visualisation, using a polypectomy snare (figure 2).

There were no postprocedural complications and an ERCP was performed posteriorly to remove the biliary stones. The patient was well at 1-year follow-up.

Endoscopic placement of biliary stents is a well-established, safe and minimally invasive procedure, commonly used in the treatment of a wide variety of biliary disorders.¹ Biliary stent migration is an unusual event² occurring in up to 10% of patients.³



Figure 1 CT scan showing the migrated biliary stent (A and B) and the abdominal wall abscess (C).

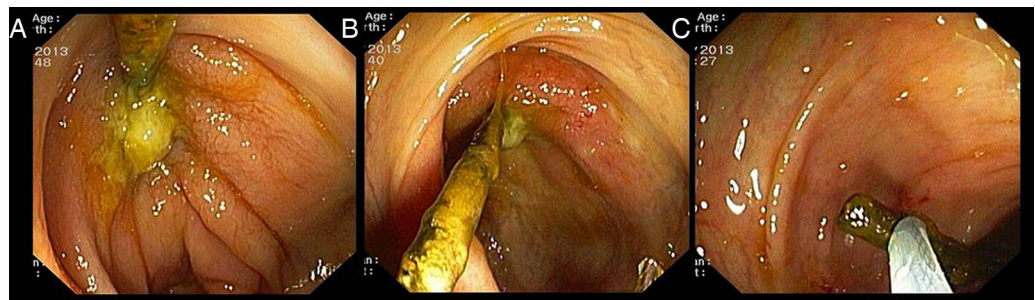


Figure 2 Colonoscopy showing the biliary stent embedded in the caecum wall, which was carefully removed using a polypectomy snare (A–C).



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Displaced biliary stents mostly follow the digestive tract² or can be successfully extracted using endoscopy.²

Closer monitoring of patients with biliary stents is needed to prevent migration and potentially fatal complications such as

stent impaction, penetration-related or perforation-related fistulas or abscesses.

We describe a clinical case where two biliary plastic stents migrated distally following the digestive tract and caused serious complications, namely impaction in the ascending colon and penetration-related abscess, which were both successfully treated by non-surgical therapeutic approaches.

Learning points

- ▶ Biliary stent migration is an uncommon complication.
- ▶ Without adequate management it can lead to severe or life-threatening complications.
- ▶ Decisions regarding management of a migrated biliary stent should take into account the patients' clinical condition, stent location as well as availability of endoscopic techniques and local experience.

Competing interests None.

Patient consent Obtained.

Provenance and peer review Not commissioned; externally peer reviewed.

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