ANSWER TO PHOTO QUIZ (PAGE 274)

A CASE OF BILIOUS PLEURITIS AFTER RADIOFREQUENCY ABLATION

DIAGNOSIS

To differentiate bilious pleuritis (with or without empyema) from carcinomatous pleuritis a transthoracic needle aspiration was performed which yielded a clear brown fluid. Analysis of the pleural fluid showed a low leukocyte count, a high bilirubin level of 137 μmol/l (normal value 0-20 μmol/l) without malignant cells or bacterial growth. This strongly suggests a disruption of the hepatobiliary system and the presence of a thoraco-biliary fistula.

Radiofrequency ablation of liver tumours has been widely practised around the world in the treatment of early and late stages of cancer. It is generally performed for unresectable primary or metastatic liver, lung and kidney tumours and can be conducted in a minimally invasive manner through a percutaneous route or using a laparoscopic or thoracoscopic approach. It is less invasive than surgical resection and preserves maximal normal parenchyma.[1] Mulier et al. described the most common complications of radiofrequency ablation which were re-bleeding, intra-abdominal infection and damage to the biliary tract resulting in the formation of a biloma. Pulmonary complications were found in 0.6% of patients. Symptomatic pleural effusions were described in seven (0.14%) of 3670 patients.[1] Diaphragmatic injury was described in five (0.1%) patients. Since bile is a very good nesting ground for a bacterial superinfection, bilious pleuritis poses a therapeutic challenge for clinicians.[2] A fibrotic thorax has also been described, as bile is a fibrogenic agent; hence a delay in drainage of the pleural fluid can rapidly progress to a permanent state of compromised lung function.[3] In our case the patient was transferred to an academic centre with the thorax drain in situ. He underwent endoscopic retrograde cholangio-pancreatography where bile leakage was seen for which two endoprostheses were placed. Bile was adequately drained and the chest drain stopped producing bilious fluid. In conclusion, it is important for clinicians to recognise bilious pleuritis as a potential complication of radiofrequency ablation. The symptoms may occur days to weeks after the treatment. It is a rare complication that should be considered, as it is treatable if recognised.

DISCLOSURES

The authors report no conflicts of interest. No funding or financial support was received.

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