

Absence of the Falciform and Triangular Ligaments of the Liver

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Citation

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Abstract

An 18-year-old woman underwent a laparoscopic cholecystectomy for gallstones and acute biliary colic. At operation, the patient was found to have absence of several of the normal attachments of the liver including the falciform as well as the left and right triangular ligaments.

CASE PRESENTATION

An 18-year old woman began to experience episodic abdominal pain about eight months previously. At that time, she was about three weeks post-partum. At the time of admission, she had an attack of more severe right upper quadrant pain and pressure radiating to her back. There was nausea and vomiting. No other bowel symptoms were mentioned. There were no chills or fever. A liver function panel was normal. Abdominal ultrasound showed gallstones and a common bile duct diameter of 8 mm. On exam, she was afebrile and did not appear jaundiced. She had right upper quadrant tenderness.

At operation, she was noted to have no ligamentous attachments to the upper surface of the liver. (Figure 1) The falciform ligament and both left and right triangular ligaments were absent. The round ligament of the liver separated from the anterior midline several centimeters above the umbilicus. It entered the inferior surface of the liver in the usual location as a thick cord-like structure encased in fat. (Figures 2,3)

The laparoscopic cholecystectomy was uneventful and she went home the same day.

Figure 1

The cephalad and anterior surface of the liver shows no falciform or triangular ligaments.

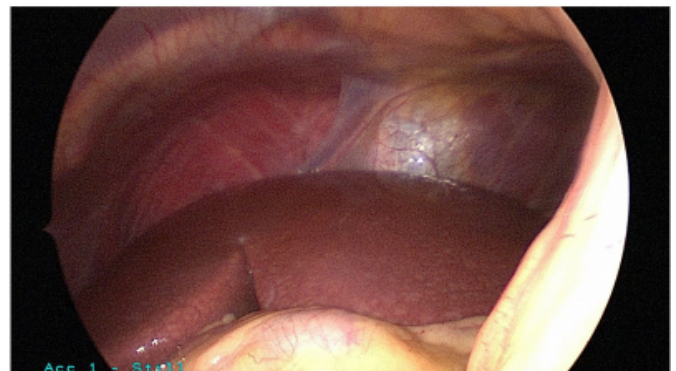


Figure 2

The round ligament of the liver entered the inferior surface of the liver. Inferiorly it connected beneath the umbilicus

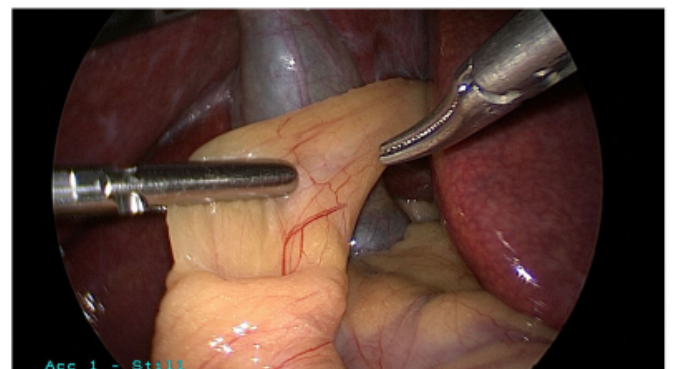
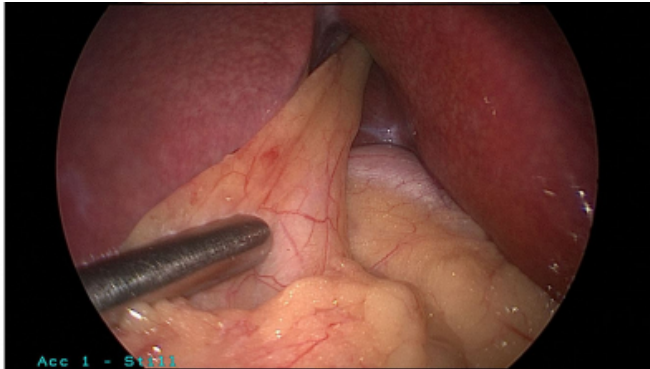


Figure 3

The round ligament of the liver entered the inferior surface of the liver. Inferiorly it connected beneath the umbilicus



DISCUSSION

Surgical conditions involving the falciform ligament are very rare. Primary inflammation of the falciform

ligament has been seen.¹ Internal hernia through a defect in the ligament has been reported. These defects may be spontaneous or the result of surgical trauma.²

A search of Pubmed under the heading of “agenesis” or “absence” of the falciform ligament did not produce any references. While this is an interesting abnormality, there probably is no surgical significance to the absence of these attachments of the liver.

References

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