Liver Showstoppers

Case 1.

Submitted by Dr A Cratchley
36 year old female, previously fit & well.

Presenting complaint: Back pain 8 months, abdominal pain 6 months, heavy menses+++

GP requested US abdomen.

Blood showed iron deficiency anaemia, but remaining tests including LFTs & NILS within normal limits.
62mm liver cyst with irregular contours and containing debris and solid nodules, features concerning for malignant lesion.

Large cystic solid tumour segment 7/6, 7.7cm in maximum dimension, solid enhancing projections in wall. Abuts diaphragm at superior aspect of lesion. Appearances of a malignant liver lesion? cystadenocarcinoma.
MDT Discussion

• Features concerning for malignancy on imaging
  – ?Cystadenoma ?Cystadenocarcinoma
  – ?Haemorrhage into simple cyst

• Plan: Resection.
Operation

• Findings: 8cm liver cyst segment 6/7.
• Intraoperative ultrasound showed cyst invading diaphragm.
• Radical excision & partial resection of diaphragm.
Macroscopy

Attached diaphragm (RM = green)

Liver RM = black
Macroscopy

• Liver wedge with attached diaphragm
• Unilocular cyst containing haemorrhage, and altered blood with soft haemorrhagic polypoid lesion extending into cyst from near the diaphragm.
• Haemorrhagic changes extending into overlying diaphragm.
• Background liver did not appear cirrhotic.
Microscopy:

Low power view of solid area & ‘invasion’ into diaphragm.
Solid area within cyst

High power view of glandular epithelium
Cyst wall & background adjacent liver

Entrapped bile duct showing ductular proliferation.
Background liver
Differential

• Hepatic endometriosis
  – Morphologically this would fit
  – Very rare
  – No history of endometriosis in clinical details provided

• Mucinous cystic neoplasm
  – More common
  – Risk of malignancy (especially given invading diaphragm)
  – Radiological concern for malignancy
Immunohistochemistry

ER

PR

CD10

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Diagnosis:
Hepatic Endometriotic Cyst
Hepatic Endometriosis

- Rare (approximately 26 cases reported in literature).
- Preoperative diagnosis on imaging is difficult – often cannot be distinguished from other hepatic lesions.
- Most case reports indicate a history of endometriosis.
- Gold standard for diagnosis is histology.

- Potential for endometrial hyperplasia and malignancies to arise within an area of endometriosis.
- Important to distinguish from MCN due to different treatment & ongoing management options.
References

