Hepatoid Adenocarcinoma

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Introduction

Hepatoid Adenocarcinoma (HAC) is a rare tumor, first described in 1987¹ and was given its nomenclature due to its similarity with Hepatocellular carcinoma (HCC). HAC is part of the diagnostic differentials for mass in the biliary tree that also include HCC, cholangiocarcinoma and metastatic HCC.³

We present 3 cases of HAC as a differential for gastrointestinal masses:

61-year-old man with cirrhosis presented with obstructive jaundice. CT abdomen revealed intrahepatic biliary dilatation. Biopsy revealed hepatoid carcinoma. He received Y90 treatment and was started on sorafenib. Repeated imaging revealed progressive disease. He was switched to regorafenib and underwent TACE. His disease progressed.

53-year-old Jwoman with cholelithiasis who had a cholecystectomy. Biopsy revealed gallbladder adenocarcinoma. Post-surgical imaging revealed an enlarged portacaval lymph node. She underwent right hepatectomy, and Roux-en-Y hepaticojejunostomy. Operative pathology revealed adenocarcinoma with hepatoid features. She was started on cisplatin and gemcitabine. Repeated imaging revealed disease progression, she was then switched to folinic acid, fluorouracil, and oxaliplatin but her disease further progressed.

50-year-old man presented with painless jaundice. MRCP revealed obstruction beyond the biliary confluence and stent was placed by ERCP at common duct to relieve obstruction from the mass. CT of the abdomen revealed a lobulated mass behind the common bile duct. He underwent laparoscopy and Roux-en-Y hepaticojejunostomy. Operative biopsy revealed hepatoid tumor. Patient was treated with systemic chemotherapy.

Discussion

It is difficult to differentiate HAC tumors located in the biliary tree from HCC or cholangiocarcinoma by imaging. Biopsy is commonly needed. HAC is rare and has a rapidly progressive course; delayed diagnosis can lead to poor prognosis. The estimated 1-year survival based was 55%.³ Due to the high morbidity and mortality with HAC it is important to diagnose early to be able to expediate treatment.

References

- 1)Nallini, Gupta, et al. Hepatoid Carcinoma. PathologyOutlines.com website. http://www.pathologyoutlines.com/topic/ovarytumorhepatoid.html. Accessed May 10th, 2020.
- 2) Abdullah A, et al. Primary hepatoid carcinoma of the biliary tree: a radiologic mimicker of Klatskin-type tumor. *Cancer Imaging*. 2010;10(1):198-201. Published 2010 Oct 8. doi:10.1102/1470-7330.2010.0027
- 3 APA Yang, Kun, et al Primary pulmonary hepatoid adenocarcinoma, Medicine: April 2019 Volume 98 Issue 14 p e15053doi: 10.1097/MD.00000000015053

- 4) Metzgeroth G, Ströbel P, Baumbusch T, et al. Hepatoid adenocarcinoma review of the literature illustrated by a rare case originating in the peritoneal cavity. Onkologie 2010;33:263–9.
- 5) Chen X, Li A, Wang Q, et al. Hepatoid adenocarcinoma in the peritoneal cavity: Two case reports. *Medicine (Baltimore)*. 2019;98(5):e14226. doi:10.1097/MD.000000000014226
- 6) Lee JH et al. Hepatoid adenocarcinoma of the gallbladder with production of alphafetoprotein. *J Korean Surg Soc.* 2011;80(6):440-444. doi:10.4174/jkss.2011.80.6.440
- 7) Xiaoju Shi et al. Alpha-fetoprotein-producing hepatoid adenocarcinoma of the gallbladder: a case report and review of literature. Int J Clin Exp Pathol 2016;9(5):5740-5745