



## A Rare Case of Primary Hepatic Mixed Neuroendocrine - Non-Neuroendocrine Tumor

Hai-Zhen Lu<sup>1</sup> and Ye-Fan Zhang<sup>2\*</sup>

<sup>1</sup>Department of Pathology, National Cancer Center/National Clinical Research Center for Cancer/Cancer Hospital, Chinese Academy of Medical Sciences and Peking Union Medical College, China

<sup>2</sup>Department of Hepatobiliary Surgery, National Cancer Center/National Clinical Research Center for Cancer/Cancer Hospital, Chinese Academy of Medical Sciences and Peking Union Medical College, China

### Clinical Image

A 34-year-old male came to our hospital due to a ultrasound scan that found a liver lesion. The patient had a history of hepatitis B for 8 years and had not been treated regularly. An enhanced MRI was performed in our hospital which showed a 3.4 cm × 2.3 cm tumor in the right posterior lobe of the liver, lobulated with unclear borders, with slightly low signal on T1WI, high signal on T2WI and DWI, and dynamic images revealed obvious uneven enhancement in the arterial phase and rapid washout in the portal venous phase (Figure 1). AFP (12.46 ng/ml) and CA199 (41.18 U/ml) were slightly increased. The patient underwent irregular hepatectomy in our hospital and postoperative pathology suggested Mixed Neuroendocrine-non-Neuroendocrine tumor (MiNEN) of the liver, which was composed of large cell neuroendocrine carcinoma (NEC, about 50%) and hepatocellular carcinoma (HCC, about 50%). Primary hepatic neuroendocrine tumors are extremely rare [1-3], and this is the first report of primary hepatic MiNEN composed of large cell NEC and HCC (Figure 2).

### OPEN ACCESS

#### \*Correspondence:

Ye-Fan Zhang, Department of Hepatobiliary Surgery, National Cancer Center/National Clinical Research Center for Cancer/Cancer Hospital, Chinese Academy of Medical Sciences and Peking Union Medical College, Beijing, 100021, China, Tel: +86-15101019843;

E-mail: yefanzhang@126.com

Received Date: 31 Dec 2021

Accepted Date: 20 Jan 2022

Published Date: 25 Jan 2022

#### Citation:

Lu H-Z, Zhang Y-F. A Rare Case of Primary Hepatic Mixed Neuroendocrine - Non-Neuroendocrine Tumor. *Ann Clin Case Rep.* 2022; 7: 2109.

ISSN: 2474-1655

Copyright © 2022 Ye-Fan Zhang. This is an open access article distributed under the Creative Commons Attribution License, which permits unrestricted use, distribution, and reproduction in any medium, provided the original work is properly cited.

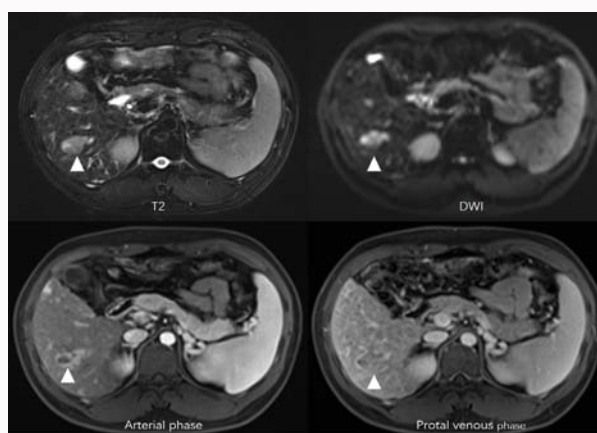


Figure 1: Enhanced MRI revealed a mass in right posterior lobe of liver.

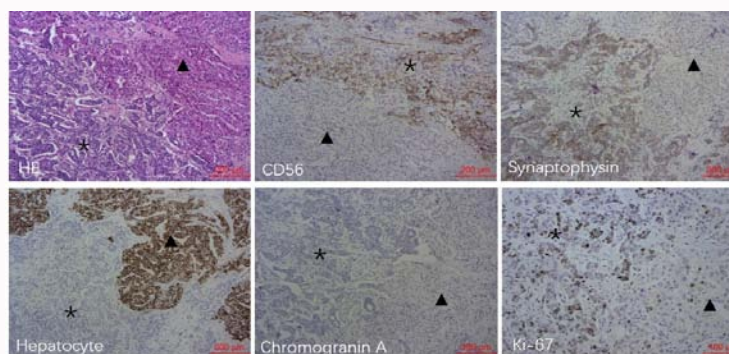


Figure 2: Pathological findings of the primary hepatic MiNEN, \*: neuroendocrine carcinoma; ▲: hepatocellular carcinoma.

**Keywords:** Primary hepatic MiNEN; Hepatocellular carcinoma; Neuroendocrine carcinoma.

## References

1. Shi C, Zhao Q, Dai B. Primary hepatic neuroendocrine neoplasm: Long-time surgical outcome and prognosis. *Medicine (Baltimore)*. 2018;97:e11764.
2. Zhao ZM, Wang J, Ugwuowo UC. Primary hepatic neuroendocrine carcinoma: Report of two cases and literature review. *BMC Clin Pathol*. 2018;18:3.
3. Chen QC, Chen X, Lu HZ. Primary hepatic neuroendocrine tumors: Retrospective analysis of seven cases and literature review. *Transl Cancer Res*. 2018;7(2):428-40.