



## Periportal pattern of primary hepatic lymphoma: a rare entity

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It was very informative to read the original paper titled MRI features of primary hepatic lymphoma by Cola-grande et al. in the September, 2018 issue of your esteemed journal, abdominal radiology [1]. The authors must be lauded for such a comprehensive study on primary hepatic lymphoma. Regarding the morphological features of primary hepatic lymphoma, the authors have described three patterns—focal masses, multiple nodules, and diffuse disease. In the series of 25 cases analyzed by the authors, none of the cases seems to be showing the periportal pattern of distribution. However, we have encountered a case of primary hepatic lymphoma with periportal distribution of lymphomatous deposits. MRI of the patient showed enlarged liver with lobulated soft tissue masses in periportal distribution in both lobes which were hypointense on T1WI (Fig. 1a) and heterogeneously

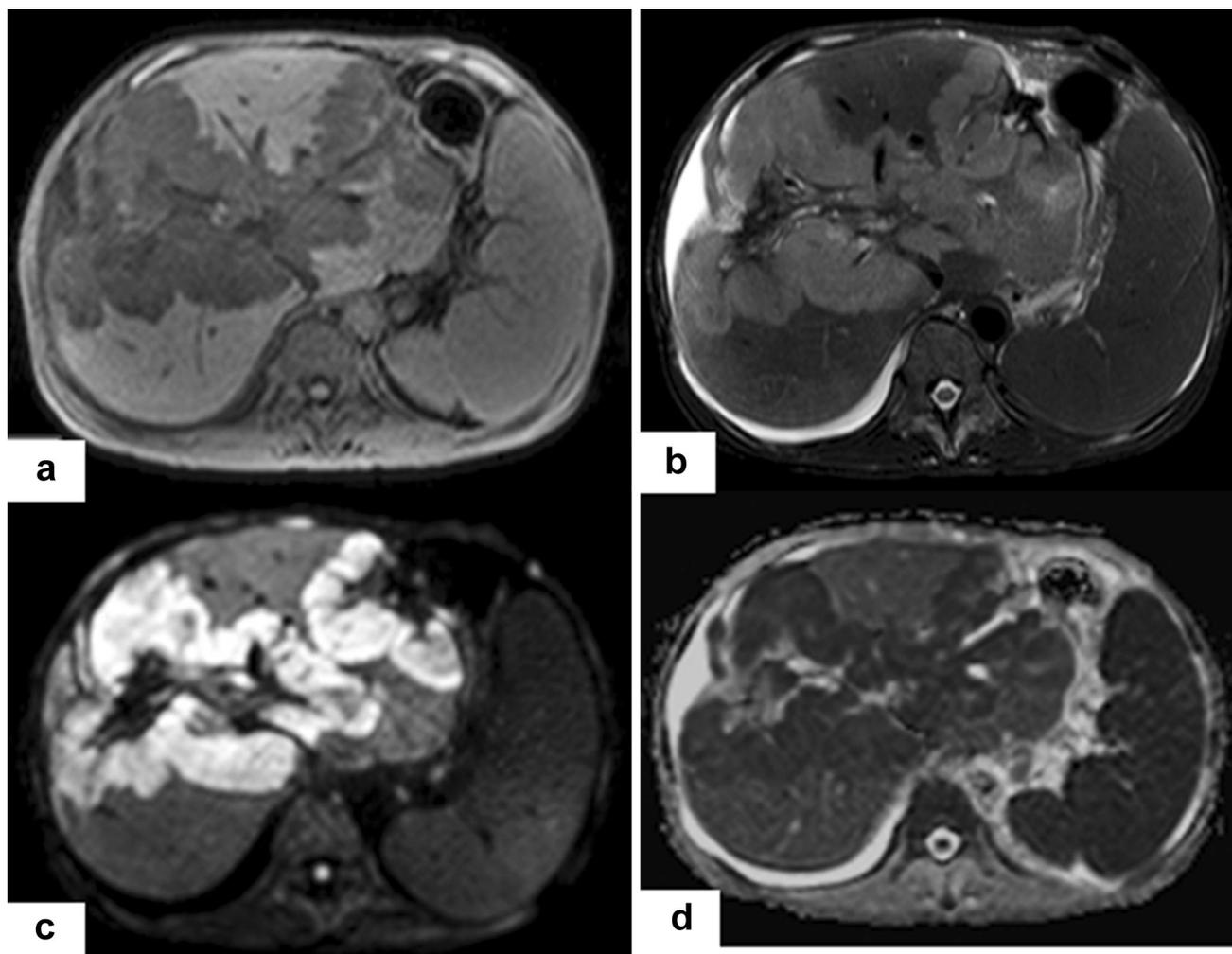
hyperintense on T2WI (Fig. 1b). On DWI images, the mass showed restricted diffusion (Fig. 1c, d) with mild enhancement in the arterial portal venous phase, which became variable iso- to hypointense to background liver parenchyma on delayed phase (Fig. 2a–c). This presentation is extremely rare. A few case reports of such a pattern have been described [2, 3]. Other pathologies having periportal distribution of soft tissue mass include langerhans cell histiocytosis, lymphatic dissemination of hepatocellular carcinoma, cholangiocarcinoma, and plexiform neurofibroma [4]. The periportal lymphoma has more of an insinuating pattern rather than being infiltrative or having mass effect. We want to highlight the fact that primary hepatic lymphoma can have a periportal pattern of distribution which needs to be mentioned in this study.

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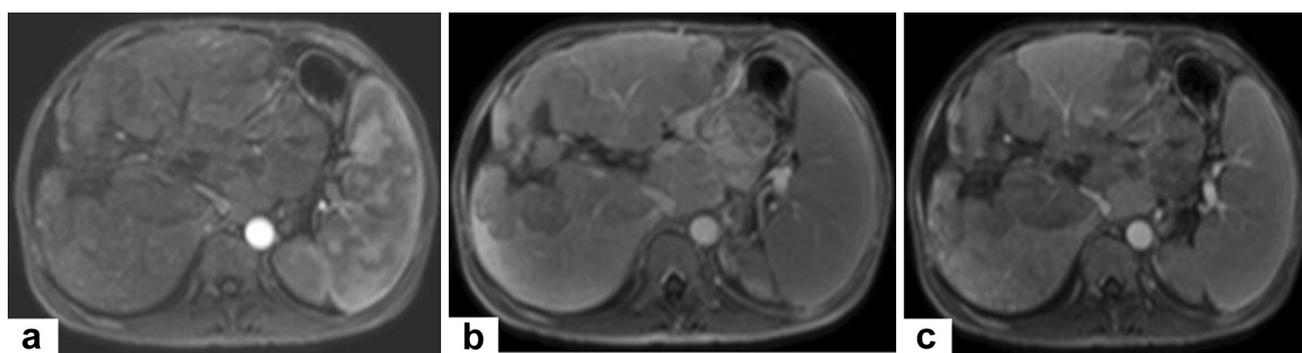
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**Fig. 1** MRI in PHL. MRI shows periportal masses which are hypointense on T1W image (a) and hyperintense on T2W image (b). Diffusion weighted-b-800 (c) and corresponding ADC (d) images show diffusion restriction in the masses with low ADC values



**Fig. 2** Dynamic contrast MRI in PHL. Dynamic contrast-enhanced MRI shows periportal masses with no contrast enhancement in arterial phase (a), mild heterogeneous enhancement in portal venous phase, (b) and become iso- to hypointense signal to liver parenchyma on delayed scans (c)

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### Compliance with ethical standards

**Conflict of interest** The authors declare that they have no conflict of interest.

**Ethical approval** All procedures performed in studies involving human participants were in accordance with the ethical standards of the institutional ethics committee and with the 1964 Helsinki declaration and its later amendments or comparable ethical standards.

**Informed consent** Informed consent was obtained from the individual participant.

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