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Medical Imagery

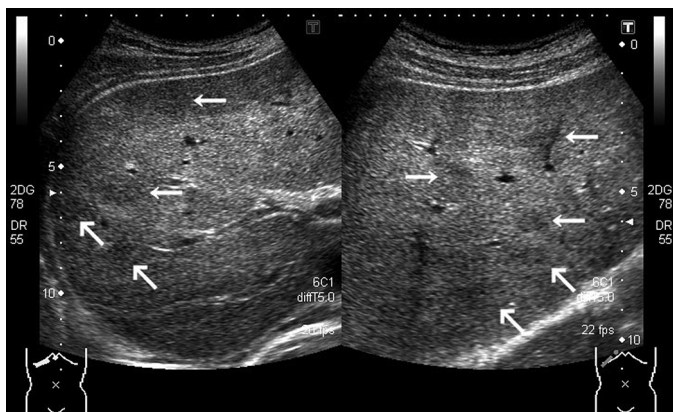
Toxocara canis-associated visceral larva migrans of the liver

Figure 1. Hepatic ultrasonography showed ill-defined hypoechoic nodules of approximately 10 mm in diameter (arrows).

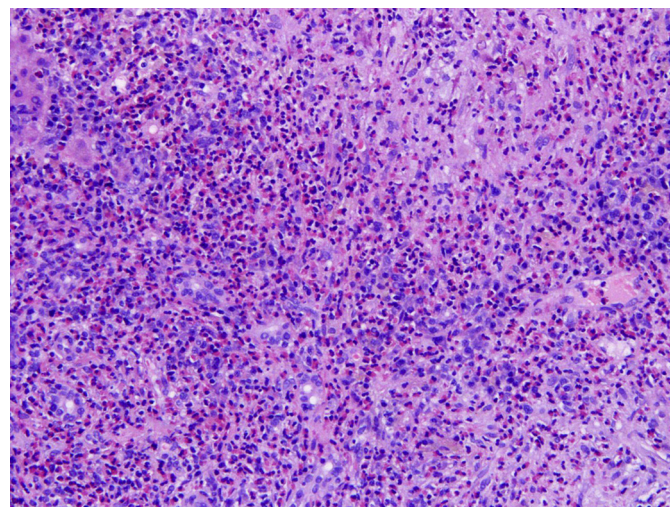


Figure 3. Histological examination of the ultrasound-guided liver biopsy specimen revealed granulomatous inflammation with extensive infiltration of eosinophils. The remnants of *Toxocara canis* larvae were not identified; they can seldom be captured by percutaneous biopsy. Hematoxylin-eosin staining.

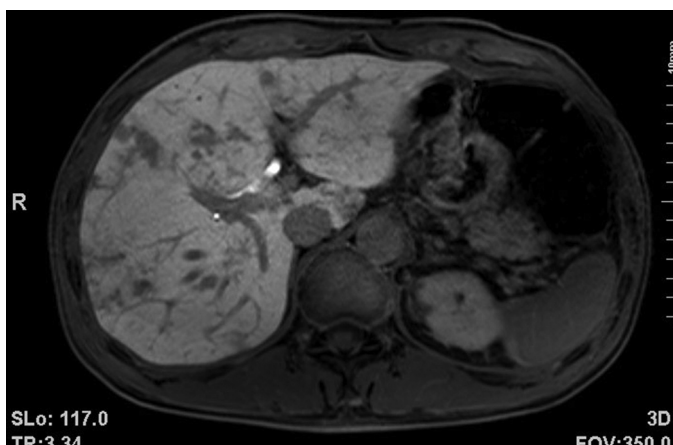


Figure 2. At the initial evaluation, there were multiple oval- or irregular-shaped low-attenuating nodules scattered along the portal veins. They were dominantly located in the subcapsular area. Hepatobiliary phase sequence of the enhanced MRI using hepatocyte-specific agent of Gd-EOB-DTPA.

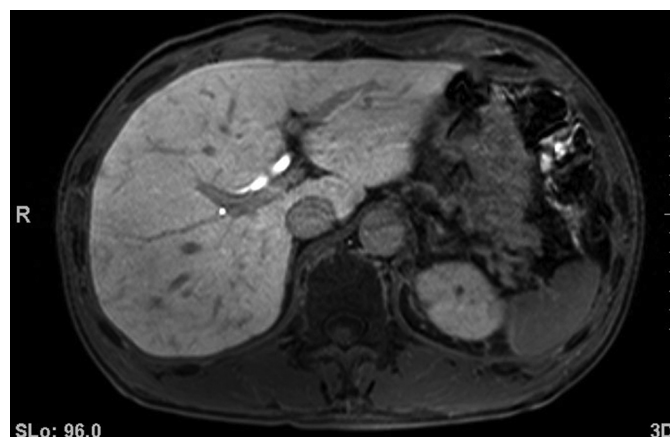


Figure 4. 6 months after the treatment, the lesions had almost disappeared and only a few scars were persistent. Hepatobiliary phase sequence of the enhanced MRI using Gd-EOB-DTPA.

A 68-year-old man was referred to our hospital for evaluation of asymptomatic hyper eosinophilia; the peripheral eosinophil count was 6,365/ μ L. Raw cattle liver was his peculiar tonic. Hepatic ultrasonography showed ill-defined hypoechoic nodules (Fig. 1). The lesions were most clearly depicted on enhanced MRI using a

hepatocyte-specific agent (Fig. 2).¹ Histological examination of the liver biopsy specimen revealed eosinophilic granulomatous inflammation (Fig. 3). An enzyme-linked immunosorbent assay using *Toxocara canis* excretory-secretory antigens had confirmed its infestation.² 6 months after the administration of albendazole,

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the peripheral eosinophil count was reduced to 400/ μ L. Enhanced MRI showed that the hepatic lesions had almost disappeared (Fig. 4). Although humans are not definitive hosts of dog roundworm *Toxocara canis*, exceptional transmissions to humans are possible from raw meat contaminated with the embryonated eggs.³ The larvae hatch in the intestine, travel to the liver via portal vein, and remain in the parenchyma, causing visceral larva migrans.⁴ Resultant hepatic lesions are usually recognized on the portal venous phase of enhanced CT or MRI using extracellular agents³. However, their imaging findings are rather nonspecific and the lesions with subtle attenuation differences are difficult to define.⁵ Enhanced MRI using a hepatocyte-specific agent has a distinct advantage for detecting hepatic visceral larva migrans and judging their resolution over the therapeutic course¹.

The authors declare that they have no conflicts of interest (COI).

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Kazuhiko Morii^{a,*}

Takashi Oda^a

Hitomi Satoh^a

Yuka Kimura^a

Yuhki Aoyama^a

Yuki Fujiwara^b

Yasushi Hiramatsu^b

Hiroaki Okushin^a

Koichi Uesaka^a

Shinichiro Nakamura^c

^aDepartment of Hepatology,

Japanese Red Cross Society Himeji Hospital

^bDepartment of Hematology and Oncology,

Japanese Red Cross Society Himeji Hospital

^cDepartment of Gastroenterology and Hepatology,

Okayama University Hospital

*Corresponding author. Department of Hepatology,
Japanese Red Cross Society Himeji Hospital,
1-12-1 Shimoteno, Himeji, Hyogo 670-8540, Japan.
Tel.: +81 79-294-2251; fax: +81 79-296-4050