A 45-Year-Old Woman with Fever and Splenic Infarcts
(See pages 1125–6 for Answer to Photo Quiz)

A previously healthy 45-year-old white woman presented to the hospital with a 5-week history of high-grade fever associated with chills, diaphoresis, malaise, and a 25-lb (∼12-kg) weight loss. She had documented temperatures of 38°C–40°C daily during that time, and she described a 7-day history of nausea, vomiting, abdominal discomfort, rash, and joint pain. She had a past medical history of hypertension, gastroesophageal reflux disease, and osteoarthritis. At a prior evaluation for nausea, 1 year previously, esophagogastroduodenoscopy and CT of the abdomen (figure 1A) revealed normal findings. The only medication she was receiving was omeprazole. The patient was married, was not working outside the home, and did not use tobacco or alcohol. She had various pets, including a turtle, a hamster, a cat, a dog, and freshwater fish. She reported no contact with persons who were ill and no recent travel.

Physical examination revealed a temperature of 40°C and a pulse rate of 130 beats/min. A fine, macular, erythematous rash was present on the extremities. Cardiac examination revealed no murmur, and findings of a lung examination were unremarkable. The patient’s abdomen was obese, with mild, diffuse tenderness, but organomegaly could not be appreciated. Bilateral joint tenderness of the knees was present without swelling, and no lymphadenopathy was detected. Hematologic studies revealed a WBC count of 12,100 cells/mm³ with 71% lymphocytes. Alanine transaminase and aspartate transaminase levels were mildly elevated (56 and 49 IU/L, respectively). Multiple blood cultures showed no growth, and transesophageal echocardiography did not reveal any vegetations. Serologic tests for Epstein-Barr virus and parvovirus had results consistent with previous infections. The result of a serologic test for HIV was negative, and the CD4 count was 1123 cells/mm³. A bone marrow biopsy demonstrated atypical lymphocytes.

CT of the abdomen showed hepatosplenomegaly with multiple splenic infarcts (figure 1B) that were not present on the CT scan done a year previously. Treatment led to rapid resolution of fever and of all systemic complaints.

What is your diagnosis, and how would you confirm this diagnosis?