

Lehigh Valley Health Network
LVHN Scholarly Works

Department of Medicine

A Case of CMV Colitis Seen in DRESS

Anam Malik MD

Lehigh Valley Health Network, Anam.Malik@lvhn.org

Reema M. Vaze MD

Lehigh Valley Health Network, Reema.Vaze@lvhn.org

Ricky Buckshaw DO

Lehigh Valley Health Network, Ricky.Buckshaw@lvhn.org

Eric Nellis MD

Lehigh Valley Health Network, eric.nellis@lvhn.org

Hiral N. Shah MD

Lehigh Valley Health Network, hiral_n.shah@lvhn.org

Follow this and additional works at: <https://scholarlyworks.lvhn.org/medicine>



Part of the [Gastroenterology Commons](#), and the [Internal Medicine Commons](#)

Let us know how access to this document benefits you

Published In/Presented At

Malik, A. Vaze, R. Buckshaw, R. Nellis, E. Shah, H. (2019, October 25). *A Case of CMV Colitis Seen in DRESS*. Poster Presented at: American College of Gastroenterology, San Antonio, Texas.

This Poster is brought to you for free and open access by LVHN Scholarly Works. It has been accepted for inclusion in LVHN Scholarly Works by an authorized administrator. For more information, please contact LibraryServices@lvhn.org.

A Case of CMV Colitis Seen in DRESS

Anam Malik, MD,¹ Reema Vaze, MD,² Ricky Buckshaw, DO,² Eric Nellis, MD,¹ Hiral Shah, MD¹

¹Department of Gastroenterology, ²Department of Internal Medicine, Lehigh Valley Health Network, Allentown, Pa.

Introduction

- Cytomegalovirus (CMV) is a member of the family of herpes virus, which persists for life after a primary infection.
- It is known to cause colitis in both immunocompromised and immunocompetent hosts.
- CMV enters a latency phase after initial infection. Reactivation can occur anywhere along the gastrointestinal tract. The colonic mucosa is the most common site of reactivation.
- Clinical, endoscopic, and histological appearance of CMV colitis can mimic inflammatory bowel disease.

It is important to recognize the risks of long term medical treatment with immunomodulatory drugs such as leflunomide or corticosteroids, including local reactivation of a latent virus.

Case Description

A 59-year-old female with rheumatoid arthritis on chronic steroids and recently prescribed leflunomide presented with a diffuse rash, stomatitis, eosinophilic dominant leukocytosis, and severe diarrhea. A skin biopsy confirmed the diagnosis of drug reaction with eosinophilia and systemic symptoms (DRESS). The patient's diarrhea worsened despite negative comprehensive stool panel, clostridium difficile toxin and stool ova/parasites. A CT abdomen revealed diffuse colitis, and as a result the patient underwent flexible sigmoidoscopy showing circumferential colitis with ulcerations (Figure 1). Biopsies taken from the distal colon confirmed Cytomegalovirus (CMV) by viral inclusion bodies seen on hematoxylin-eosin staining (Figure 2). The patient was initiated on IV ganciclovir, however expired after developing septic shock.

Discussion

- Gastrointestinal (GI) disease caused by CMV is diagnosed on the presence of clinical symptoms, viral inclusion bodies on biopsy, and endoscopically visualized ulcers.
- The most common sites of CMV related GI involvement is the esophagus and colon.
- Biopsy with immunohistochemical testing using monoclonal antibodies against CMV is considered the gold standard (Figure 3). Owl's eye inclusion bodies on staining are highly specific for infection with CMV.
- The gastrointestinal tract is thought to contain latent CMV after a primary infection.
- This case highlights the importance of recognizing the risks of long term medical treatment with immunomodulatory drugs such as leflunomide or corticosteroids, including local reactivation of a latent virus as in our patient.

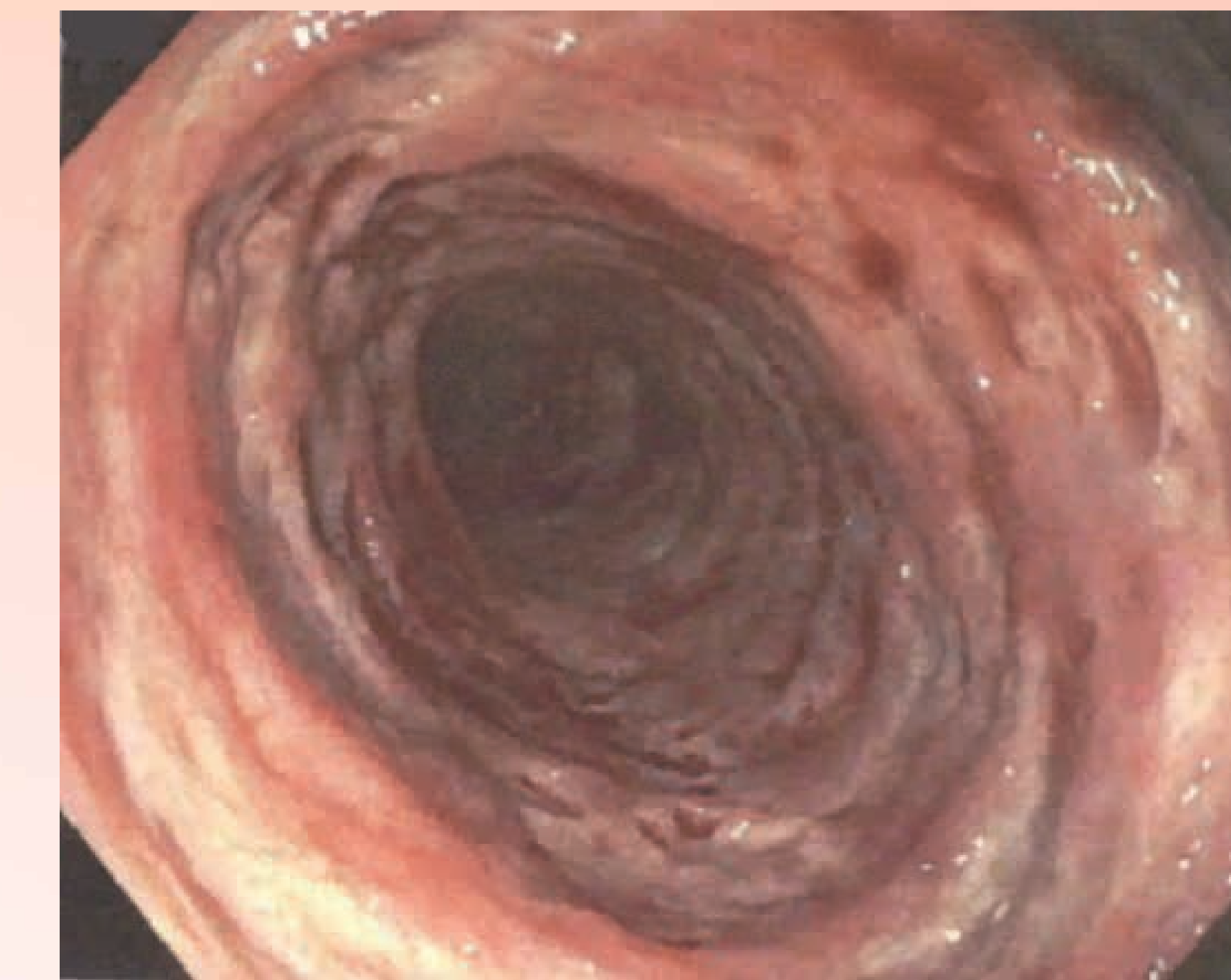


Figure 1: Flexible sigmoidoscopy reveals extensive ulcerations in the descending colon.

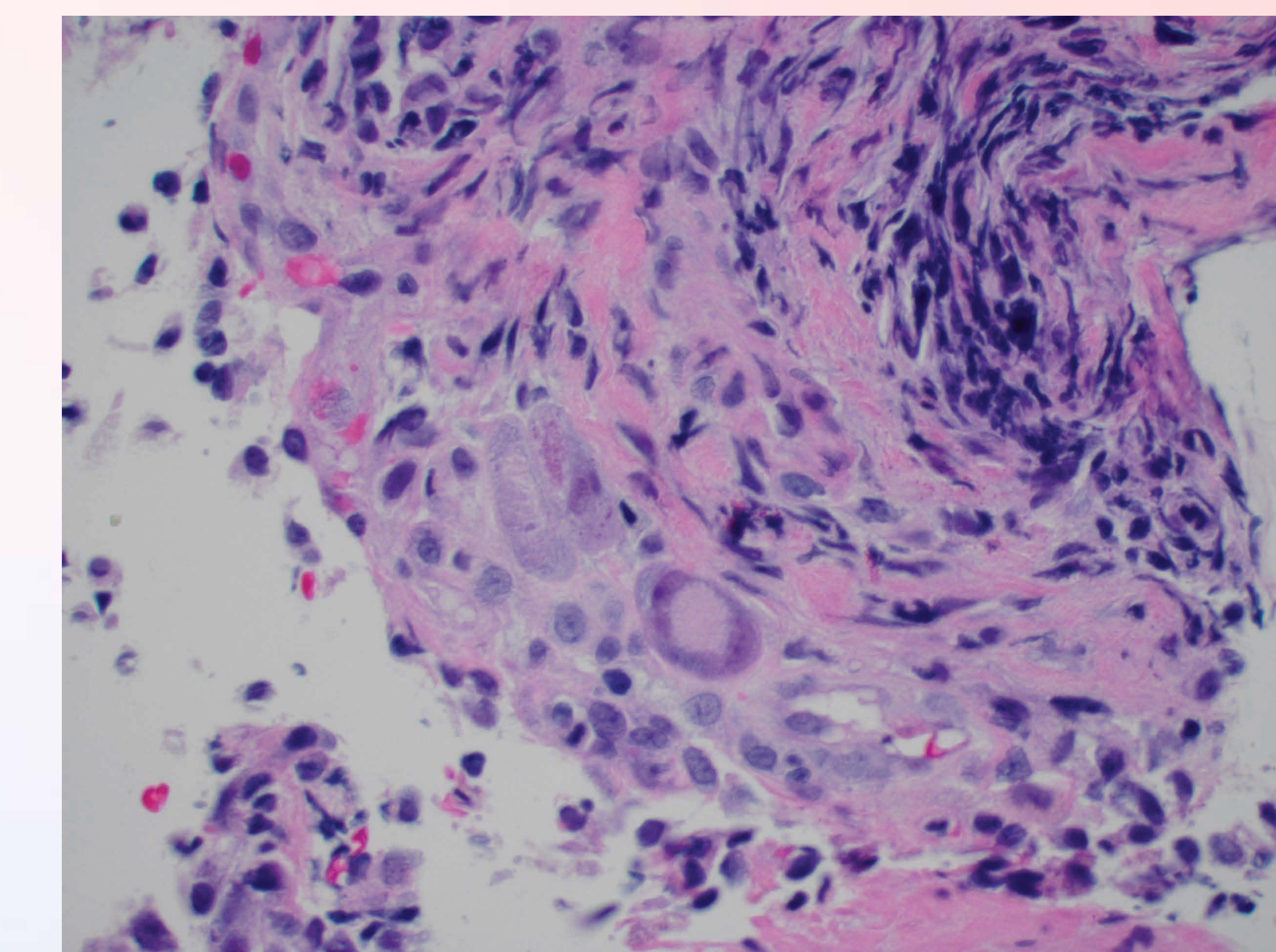


Figure 2: Histologic study of a biopsy specimen shows viral inclusions characteristic of cytomegalovirus (hematoxylin-eosin, $\times 600$).

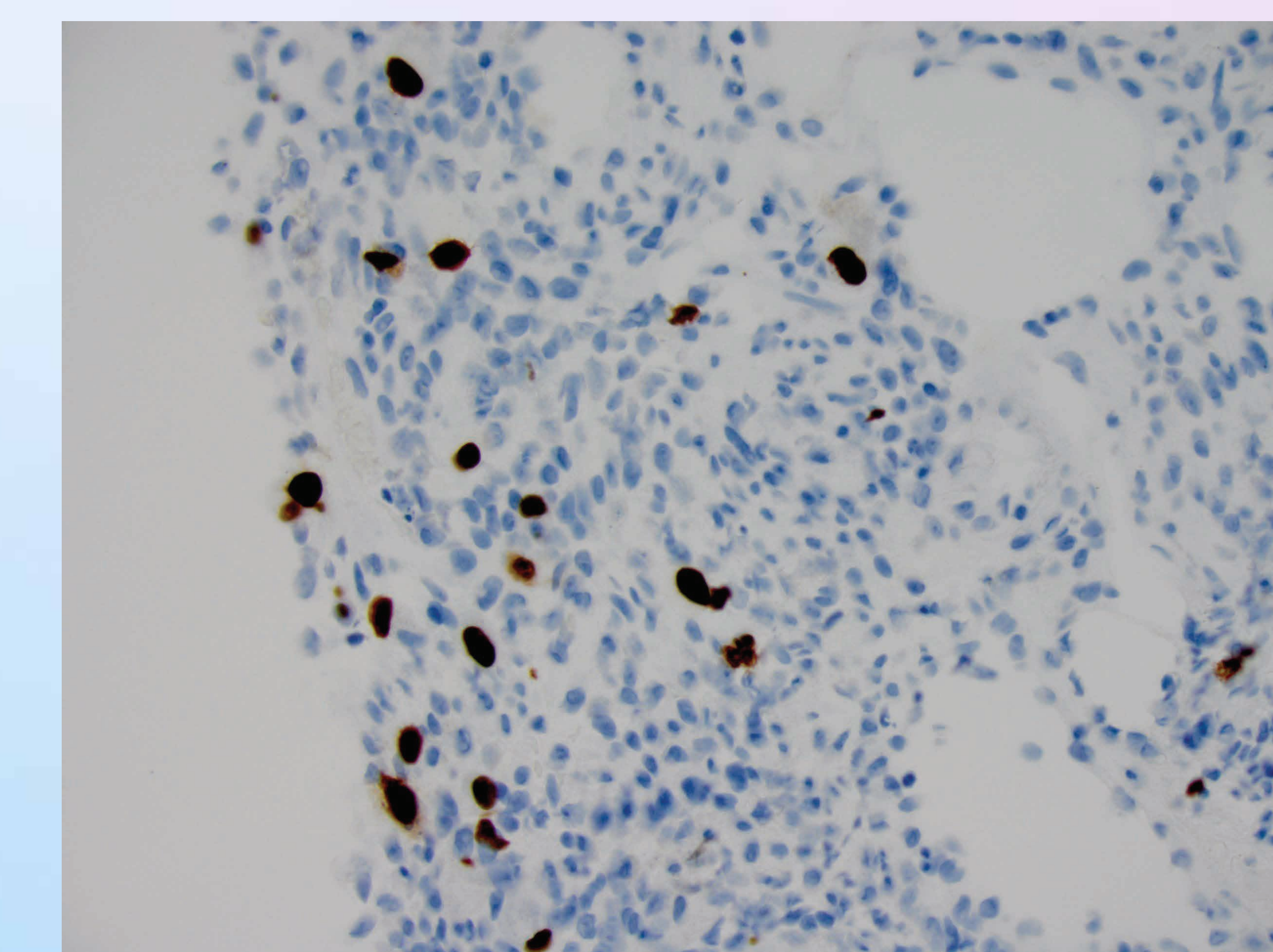


Figure 3: Immunohistochemical staining of the biopsy specimen