

# SURGICAL PATHOLOGY REPORT [SYNTHETIC]

**ACCESSION #:** UC-2025-60502

**DATE OF PROCEDURE:** 05/05/2025

**DATE OF REPORT:** 05/07/2025

**REQUESTING PHYSICIAN:** Dr. Jamie Stevenson, Gastroenterology

**PATHOLOGIST:** Dr. Kathleen Wong, Anatomic Pathology

## CLINICAL HISTORY:

62 year old female with 1 month history of bloody diarrhea, abdominal pain, and urgency. Colonoscopy showed severe friability, superficial ulcerations, and pseudopolyps throughout the colon. Clinical suspicion for ulcerative colitis.

## SPECIMEN RECEIVED:

- A. Rectum, biopsy
- B. Sigmoid colon, biopsy
- C. Descending colon, biopsy
- D. Transverse colon, biopsy
- E. Ascending colon, biopsy
- F. Terminal ileum, biopsy

## GROSS DESCRIPTION:

- A. Received in formalin labeled "rectum" are 2 tan-pink tissue fragments measuring 7 mm in aggregate.
- B. Received in formalin labeled "sigmoid colon" are 5 tan-pink tissue fragments measuring 7 mm in aggregate.
- C. Received in formalin labeled "descending colon" are 6 tan-pink tissue fragments measuring 7 mm in aggregate.
- D. Received in formalin labeled "transverse colon" are 4 tan-pink tissue fragments measuring 5 mm in aggregate.
- E. Received in formalin labeled "ascending colon" are 6 tan-pink tissue fragments measuring 5 mm in aggregate.

F. Received in formalin labeled "terminal ileum" are 3 tan-pink tissue fragments measuring 6 mm in aggregate.

All specimens are entirely submitted in 3 cassette(s).

## **MICROSCOPIC DESCRIPTION:**

A. Rectal mucosa shows fulminant active chronic inflammation with crypt architectural distortion, lamina propria plasma cells, and basal plasmacytosis. The inflammatory process is limited to the mucosa without evidence of granulomas. Occasional apoptotic bodies are present in crypts. Rare cells with intranuclear and cytoplasmic inclusions suspicious for cytomegalovirus (CMV) infection are identified. In addition to the chronic inflammatory changes, there are numerous neutrophils and pseudomembranes suspicious for superimposed *Clostridioides difficile* infection.

B. Sigmoid colonic mucosa shows mild to moderate active chronic inflammation with crypt branching, crypt atrophy, and focal crypt abscesses. The inflammatory process is limited to the mucosa without evidence of granulomas. Lamina propria shows increased plasma cells and lymphocytes.

C. Descending colonic mucosa shows moderate active chronic inflammation with diffuse neutrophilic cryptitis, crypt abscesses, and epithelial injury. The inflammatory process is limited to the mucosa without evidence of granulomas. Basal plasmacytosis is prominent.

D. Transverse colonic mucosa shows mild to moderate active chronic inflammation with crypt architectural distortion and crypt abscesses. Reactive epithelial changes are seen adjacent to areas of active inflammation.

E. Ascending colonic mucosa shows mild active chronic inflammation with crypt architectural distortion and crypt abscesses. Occasional apoptotic bodies are present in crypts.

F. Terminal ileal mucosa shows no significant pathologic abnormality. No evidence of chronic inflammatory bowel disease identified in this section.

## **DIAGNOSIS:**

### ***A. Rectum, biopsy:***

- fulminant active chronic colitis with crypt architectural distortion and goblet cell depletion
- fulminant consistent with ulcerative colitis
- No dysplasia identified

- No evidence of cytomegalovirus (CMV) infection

### ***B. Sigmoid colon, biopsy:***

- mild to moderate active chronic colitis with crypt architectural distortion and goblet cell depletion
- Viral cytopathic changes suspicious for cytomegalovirus (CMV) infection
- mild to moderate consistent with ulcerative colitis
- No dysplasia identified

### ***C-E. Descending, transverse, and ascending colon, biopsies:***

- moderate active chronic colitis with crypt architectural distortion
- Features consistent with ulcerative colitis
- No dysplasia identified

### ***F. Terminal ileum, biopsy:***

- Mild non-specific inflammation
- Features suggestive of superimposed *Clostridioides difficile* infection
- No evidence of inflammatory bowel disease

## **COMMENT:**

The histologic findings show a pattern of continuous chronic active colitis with greatest severity in the distal colon and rectum, with relative sparing of the proximal colon. The absence of granulomas, transmural inflammation, and terminal ileal involvement are features favoring ulcerative colitis over Crohn's disease. Correlation with clinical, endoscopic, and radiologic findings is recommended for definitive classification. The overall histologic features are characteristic of ulcerative colitis in the active phase. Immunohistochemical staining for CMV is positive, confirming the presence of CMV infection. This may contribute to the severity of colitis and should be considered in treatment planning. The histologic features suggestive of superimposed *Clostridioides difficile* infection should be correlated with clinical presentation and stool testing.

## **SPECIAL STUDIES:**

Immunohistochemical stain for p53 shows no evidence of dysplasia-associated molecular alterations. Cytomegalovirus (CMV) immunohistochemistry reveals scattered positive cells confirming viral infection. Gram stain highlights numerous gram-positive bacilli morphologically consistent with *Clostridioides difficile*.

\_This is a synthetic educational pathology report created for AI training purposes. It does not represent a real patient case.\_