Co-occurrence of two rare diseases: CMV Colitis in patient with Clozapine included ischemic colitis



Dewan Giri, MBBS¹; Gres Karim, MD¹; Caileen Sennett, MD¹, Wan Lam, MD¹

1.Department of Medicine, Mount Sinai beth Israel Hospital, NY, NY

INTRODUCTION

- CMV (Cytomegalovirus) colitis is a well-recognized disease in immunocompromised patients.
- However, there are case reports and series describing the disease in immunocompetent hosts.
- Given its rarity, its characteristics are yet to be well defined.
- We present a case of CMV colitis in an immunocompetent patient who likely had concomitant ischemic colitis from clozapine.

CASE DESCRIPTION

 A 68-year-old female with PMH of Schizophrenia on Clozapine, chronic constipation presented to the emergency department with 1 day of bloody diarrhea and NBNB vomiting.

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- On arrival, she was noted to be tachycardic and tachypneic with a physical exam revealing diffuse abdominal tenderness and hypoactive bowel sounds.
- Initial labs were notable with leukocytosis of 19 K/ul with bands and Clozapine level was elevated at 1143 ng/dl.Serum lactate, renal function, and liver function tests were normal.
- Computed Tomography Angiography of the abdomen showed severe colitis of the entire descending colon. She completed 5 days of antibiotics despite negative Gastrointestinal panel PCR with some relief of symptoms
- Colonoscopy planned on day 6 was postponed due to acute delirium, which required the initiation of a new anti-psychotic. Colonoscopy on day 28 showed a 10 cm area of non-bleeding ulcerated mucosa at the splenic flexure.
- Histopathology reports which became available 1 week later showed colonic mucosa with ulceration, granulation tissue, acute inflammation, and rare CMV-positive cells.
- She was subsequently started on Valgancyclovir and discharged without any acute events with a plan for a follow-up colonoscopic examination.

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DISCUSSION

- CMV is a common virus with positive serology in upwards of two-thirds of the general population. However, it rarely manifests in immunocompetent hosts.
- CMV colitis in immunocompetent hosts has been described mostly as a superinfection in patients with primary gastrointestinal disorders.
- Destruction of colonic mucosa from the ischemic colitis caused by clozapine likely allowed for CMV to establish the infection in our patient.
- It is thought that the anticholinergic manifestation in the gastrointestinal tracts which causes constipation and luminal dilation leading to decreased capillary circulation.
- Treatment usually involves discontinuation of the drug and supportive care.