

# Capsule Endoscopy in Inflammatory Bowel Disease: Differential Utility in Informing Medical Management When Used for Screening vs Follow-Up

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## Background

- Video capsule endoscopy (VCE) allows visual assessment of the small bowel for evidence of inflammatory bowel disease (IBD).
- VCE can be used both in the diagnosis of IBD and follow up disease assessment. Results of VCE can be used to guide medication management.
- The aim of this study is to assess differences in medication management when VCE is used for diagnosis of IBD vs follow up of known disease.

### Methods

- We performed a retrospective review of VCE from a tertiary-care center's PillCam database from 8/3/2018-8/18/2021.
- Patients undergoing VCE for the evaluation and diagnosis of IBD were included.
- We then conducted chart review of these patients to investigate changes in medication management following VCE.

#### Results

- 83 patients were included
  - 4 patients had VCE performed 2 separate times, totaling 87 VCE reviewed
  - 12 VCE excluded due to being incomplete, poor quality, or patient lost to follow up
- 56.6% female with an average age of 41.8 years
- 48 VCE were performed in an attempt to establish an IBD diagnosis, 27 were performed for follow up evaluation in patients with a known IBD diagnosis.
- 19/75 (25.3%) patients had VCE findings of active IBD (9 diagnostic and 10 follow up).
- Positive VCE resulted in changes to medication management in 9/9 diagnostic patients, as opposed to 5/10 follow up patients (p=0.01).
- The most common medication changes to the follow up group included increased frequency of ustekinumab (2), initiation of ustekinumab (1), initiation of adalimumab (1), addition of azathioprine to ustekinumab (1). The most common medication changes to the diagnostic group included initiation of ustekinumab (2), initiation of mesalamine (2), initiation of corticosteroids (2), initiation of mesalamine + corticosteroid (1), initiation of adalimumab (1), increased dosage of corticosteroid (1).

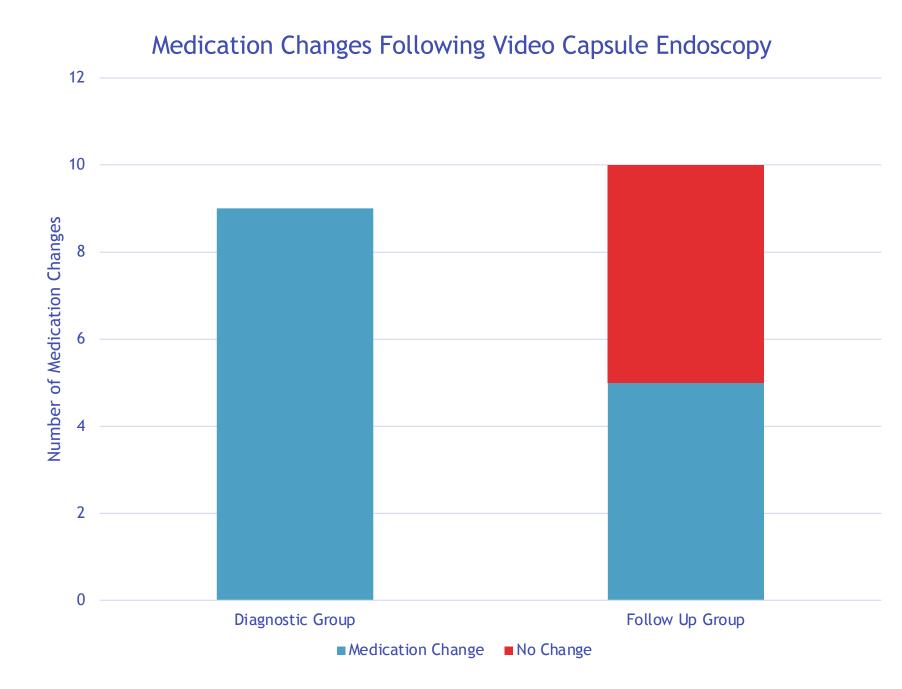


Figure 1: Medication Changes Following VCE in Diagnostic vs. Follow Up Groups

#### Discussion

- VCE is an impactful tool used by clinicians to help guide medical management decisions in patients with IBD.
- Providers are significantly more likely to use VCE results to change medications following a positive capsule for diagnostic purposes, compared to follow up.
- Clinicians should consider the impact of VCE results on guiding medical management when determining which patients with established IBD should undergo VCE