



Concise Commentary: RAIR Yet Well Done—Documenting a High Incidence of Anorectal Dysfunction in Patients with Chronic Constipation

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Chronic constipation (CC) is one of the most common gastrointestinal complaints in the general population that represents a significant burden to the healthcare system. CC has an estimated prevalence between 2 and 27%, with an average global prevalence of 14% according to a 2005 meta-analysis [1]. The variability in prevalence is likely due to differing definitions of CC, although infrequent stools, difficult rectal expulsion of stool, or both for at least three months are generally accepted. In 2016, the Rome IV Criteria for functional gastrointestinal disorders divided CC into functional constipation, irritable bowel syndrome with constipation, opioid-induced constipation, and functional defecation disorders, each of which have diminished efficiency of stool transit through the colon as well as the disordered mechanics of stool expulsion from the rectum [2].

Undifferentiated chronic constipation is best evaluated by a thorough clinical history, physical examination, anorectal exam, elicitation of the anocutaneous reflex, and assessment of anal sphincter tone at rest and during voluntary contraction and simulated defecation (push). If there is a high suspicion for a defecatory disorder based on the initial evaluation, high-resolution anorectal manometry (HR-ARM) performed according to the protocol established in the London Classification [3] should be considered to objectively diagnose and evaluate the causes of anorectal dysfunction. If indicated, additional transit testing can be considered.

In this issue of *Digestive Diseases and Sciences*, Triadafilopoulos and colleagues [4] used HR-ARM and wireless

motility capsule (WMC) to further characterize individuals with undifferentiated CC to better inform clinical decision making. The authors enrolled 166 patients referred to a single community-based neurogastroenterology and motility center who completed detailed symptom questionnaires and underwent both HR-ARM and WMC within three months of each other from January 2012 to December 2022. Of the individuals who were enrolled, 84 had normal colonic transit time (CTT) and 82 had slow CTT. Patients were stratified on the basis of CTT (normal versus slow). HR-ARM comparison of these groups showed that regardless of CTT, there was a high prevalence of anorectal dysfunction among these ambulatory patients. Interestingly, both groups had a high percentage of individuals with absent rectoanal inhibitory reflex (RAIR) with 13% in normal transit and 15% in slow transit groups. Though an absent RAIR is a diagnostic feature of Hirschsprung's disease, none of these subjects had biopsy evidence of adult Hirschsprung's disease on follow-up testing. Although there was a significantly higher prevalence of anal hypertonicity in the normal transit group when compared with the slow transit group (44% versus 23%, respectively), there was no significant difference between the groups when comparing rectal sensation and failed balloon expulsion.

The study further supports the need to perform an anorectal exam early in the diagnostic evaluation, given that anorectal dysfunction was present regardless of transit time. In-office anorectal exam can accurately suggest dyssynergic defecation, guiding initial management that usually includes oral medications, suppositories, enemas, and/or dietary and lifestyle modification. If the anorectal exam is inconclusive, HR-ARM can provide detailed information on anorectal structure and function that can help inform the parameters and goals of pelvic floor physical therapy. Since WMC was removed from the US market recently, alternatives such as Sitz markers, scintigraphy, or spirulina breath testing can be used, although these tests will likely be restricted to patients

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whose symptoms are refractory to conventional management who may need surgical referral.

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