

Irritable bowel or irritated by lactose?

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Abstract

This case demonstrates that identification and linking of functional gastrointestinal symptoms helps distinguish lactose intolerance from irritable bowel syndrome. The high prevalence amongst Asian and African populations suggests that lactose intolerance should be considered early on and simple but effective interventions can lead to early diagnosis and better patient outcomes.

Keywords: Lactose intolerance,
Irritable bowel syndrome

Introduction

With 40% of the world population struggling with functional gastrointestinal disorders (1) and the most common cause being irritable bowel syndrome, it is likely this is a differential that will be at the forefront of our minds when assessing those without red flags.

Recent theories are even citing gravity as a potential cause (2) and if proven, it will inevitably remain a condition we will continue to commonly treat. But with current limitations in accurate IBS diagnostic tools and a different condition thought to affect 65% of the world's population (3), should we be considering this diagnosis more often and with a more back-to-basics approach?

Case Report

A 24-year-old male student from India presents with a 6-month history of abdominal bloating, diarrhoea and cramps. These symptoms are worse in the mornings and often after lunch but settle by the evening. He reports no bloody stools, weight loss or relevant family history. There is no correlation between his symptoms and stress. He has been in the UK for over 1 year and has not travelled abroad in that time. He was fit and well until the onset of these symptoms and takes no regular medication.

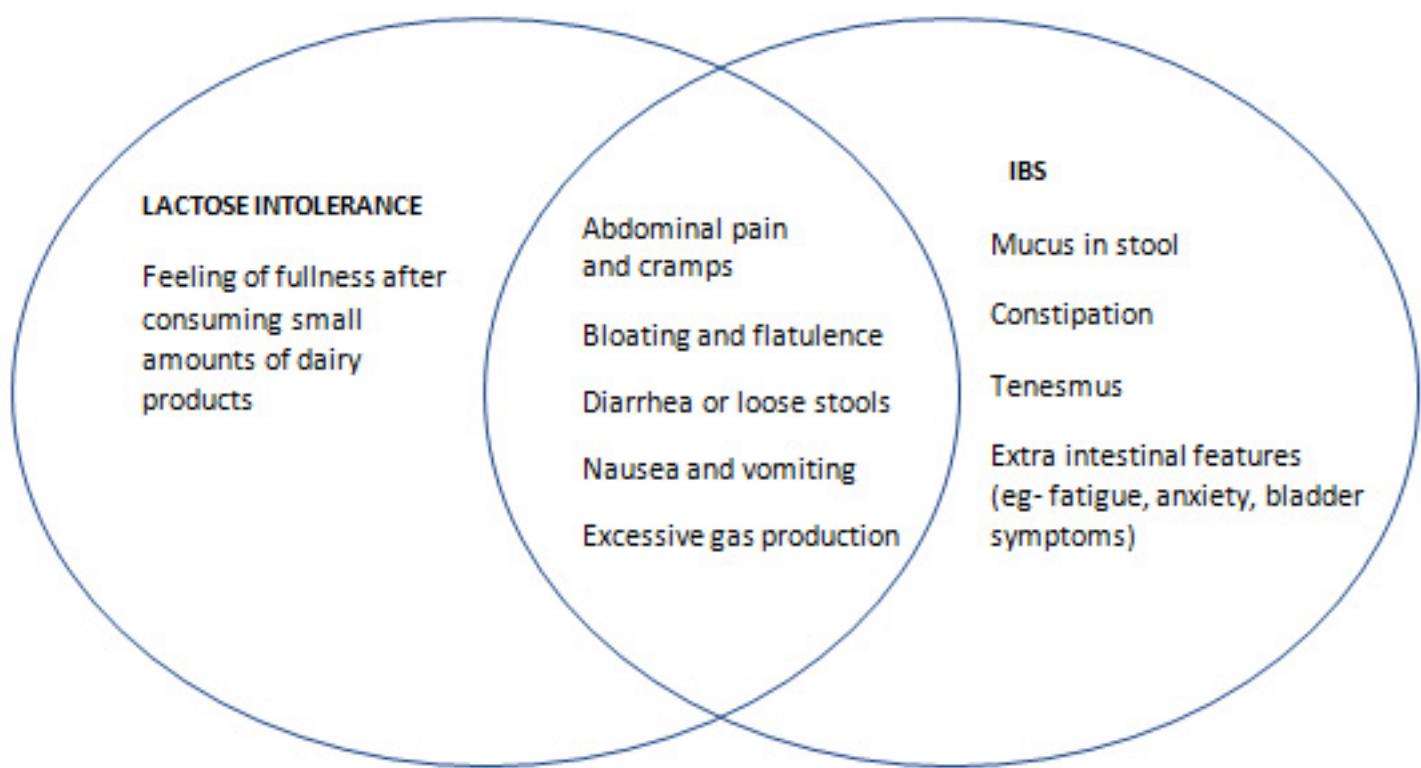
Clinical examination, blood and stool tests are unremarkable. He arranges a private colonoscopy as he is concerned about inflammatory bowel disease. This is normal and he is diagnosed with irritable bowel syndrome and advised on consuming a balanced diet, regular exercise and stress management. He opts against taking Loperamide PRN and instead purchases a probiotic on the advice of a university colleague who had relief with similar symptoms.

He returns 8 weeks later and is started on an antispasmodic (Mebeverine). There appears to be little relief after a few months and the patient declines a Tricyclic antidepressant in favour of a dietitian referral. He contacts the practice just 2 weeks later asking for the referral to be cancelled as having done some light research and eliminating lactose from his diet with the help of a food diary, his symptoms have totally resolved.

Discussion

This seemingly straight forward case is a good example of how simple interventions early on could substantially improve patient outcomes and engage time and resources more efficiently. It appears in primary care at least we seldom have the discussion of dietary factors in the contribution of gastrointestinal symptoms except when prompting about fiber and fluid intake.

Let's consider the non-specific symptoms occurring in both lactose intolerance and IBS (4,5):



The overlap in symptoms for both conditions is well known yet it is striking how little consideration is given to the possibility of lactose intolerance as a cause when we see such patients. In this case, the gentleman is of Asian descent in which the prevalence of lactose intolerance alongside certain populations of African descent is estimated to be somewhere between 50-100% (6,7).

There are of course specific considerations before a lactose intolerance diagnosis is reached which also help shape its management. A short history may only be transitory and can be caused by gastroenteritis. In such cases, the patient can reintroduce lactose into their diet, and most are able to do so successfully after 6 weeks.

Primary lactose intolerance which is genetically linked and prevalent amongst Asian and African populations is due to the gradual reduction in the production of lactase. Many can still tolerate certain quantities of lactose meaning a lifelong total 'lactose free' approach is not always appropriate.

Whilst a clear history can often suffice, a lactose tolerance test or hydrogen breath test can be confirmatory. Extreme symptoms would warrant early referral and dietitian input as the patient is navigated through dealing with hidden lactose in common foods such as processed meat, cake, bread and even soft drinks (8).

However, in the absence of GI red flags, we have the flexibility to use time to our advantage. A food diary early on would have established dietary factors contributing to symptoms. We most certainly underuse this simple but effective tool to aid our process of elimination. Irrespective of the diagnosis reached, such simple exercises also open a healthy discussion about dietary habits and the potential health implications. In the case of identifying lactose intolerance, it can certainly be life changing.

Additionally, it empowers patients and allows them to appropriately share responsibility and management of their health whilst giving them insight into how their own body is responding to certain elements. This allows patients to themselves potentially identify which dairy products they can or cannot tolerate or even potential IBS triggers where this is co-existing.

Such exercises can be useful beyond gastrointestinal symptoms. In migraines for example, 70% of people report stress as a trigger and one third dehydration (9). A headache diary would help give clarity in terms of the presence of such triggers and the development of early strategies to manage these.

Perhaps such techniques are not adopted as much in primary care due to our fixation on guidelines or maybe even our assumptions. These range from assuming patients have already completed such basic exercises, patient expectations are different (further investigations or referral) or that such an exercise would be futile as the patient is seeking instant relief.

Each case has its own merit, but this was a reminder that challenging or balancing our assumptions and utilising tools that actively engage and empower patients can yield better patient outcomes early on.

References

1. Ami D. Sperber, Worldwide Prevalence and Burden of Functional Gastrointestinal Disorders, Results of Rome Foundation Global Study Volume 160, ISSUE 1 P99-114.E3, JANUARY 2021
2. Brennan Spiegel. Gravity and the Gut: A Hypothesis of Irritable Bowel Syndrome. American Journal of Gastroenterology, 2022
3. <https://worldpopulationreview.com/country-rankings/lactose-intolerance-by-country>
4. National Institute for Health and Care Excellence. Irritable bowel syndrome in adults: diagnosis and management. NICE guideline [CG61]. 2008. Accessed March 6, 2023. <https://www.nice.org.uk/guidance/cg61/chapter/1-Guidance#diagnosis>
5. National Institute of Diabetes and Digestive and Kidney Diseases. Lactose Intolerance. Accessed March 6, 2023. <https://www.niddk.nih.gov/health-information/digestive-diseases/lactose-intolerance>
6. Szilagyi A, Ishayek N. Lactose intolerance, dairy avoidance, and treatment options. Nutrients. 2018;10(12):1994.
7. Deng Y, Misselwitz B, Dai N, Fox M. Lactose intolerance in adults: biological mechanism and dietary management. Nutrients. 2015;7(9):8020-8035.
8. Systemic lactose intolerance: a new perspective on an old problem. S B Matthews, J P Waud, AG Roberts, A K Campbell. Postgraduate Medical Journal, Volume 81, Issue 953, March 2005, Pages 167–173
9. <https://americanmigrainefoundation.org/resource-library/top-10-migraine-triggers/>