LETTER TO THE EDITOR

The pathologist’s perspective in the differential diagnosis between Crohn’s disease and intestinal tuberculosis

La visión del patólogo en el diagnóstico diferencial entre la enfermedad de Crohn y la tuberculosis intestinal

To the Editors:

I read the article “Tuberculosis and Crohn’s disease – a challenging endoscopic diagnosis. A case report” analytically and with interest. According to the different epidemiologic data, tuberculosis (TB) continues to be a prevalent disease in developing countries and the number of cases has risen in developed countries due to the increase in immunocompromised patients and to immigration. The differential diagnosis between Crohn’s disease (CD) and intestinal tuberculosis (ITB) is a challenge for specialists that study them from the clinical, endoscopic, imaging, and anatomopathologic perspectives.1

Both diseases share characteristics, among which symptomatology and a preference for distal ileum involvement stand out, affecting 90% of the patients with ITB and 80% of the patients with CD. Another shared characteristic from the pathologist’s perspective is that both are included in the granulomatous enteritis group.2

The final diagnosis of the two entities mainly depends on the pathologic-anatomic study, which also presents with certain challenges for distinguishing them, given that they share a considerable number of histologic characteristics. Among them are the architectonic findings (crypt distortion, nonparallel crypts, varying diameters or cystically dilated crypts, crypt branching into more than 2 branched crypts, crypt shortening, reduced crypt density, and irregular mucosal surface) and inflammatory ones (focal/patchy inflammation, basal plasmacytosis, increase in intraepithelial lymphocytes, transmucosal inflammation, focal cryptitis, aphthous ulcers, disproportionate sub-mucosal inflammation, nerve fiber hyperplasia, proximal location of ulceration and architectural distortion, metaplasia [pseudopyloric in the ileum and Paneth cell in the colon], and granulomas).3

Nevertheless, despite the difficulties, there are histologic criteria that enable adequate distinction that are essentially based on the granulomas found. In ITB, granulomas tend to be larger and have central caseation, a submucosal location, granulomatous involvement of the surrounding lymph nodes with no mucosal compromise, disproportionate inflammation of the submucosa, and ulcers with a band-like histiocytic infiltrate. With respect to CD, the findings include architectural distortion distant from the granulomatous inflammation, improved focal colitis, and muscular obliteration of the mucosa.4

In some cases, despite the pathologist’s knowledge, accurate diagnosis cannot be made through conventional staining techniques, and so there must be adequate correlation between the clinical history of the patient and the histologic findings. The treating physician should make that correlation, with emphasis on the endoscopic and imaging findings, the results of serologic and sputum tests, and the clinical symptoms of the patient. Cultures for the Mycobacterium species, polymerase chain reaction for mycobacteria, and histochemical staining for acid-alcoholfast bacilli (Ziehl-Neelsen) are further aids for making the diagnosis.5

Complementing the authors’ experience, carrying out a communicative multidisciplinary approach to patients with suspected ITB or CD is pertinent for their comprehensive management. It should involve all the specialists providing patient care so that the accurate diagnosis is made, positively impacting the recovery of those patients.

Ethical considerations

Informed consent was not required of the patients. This letter is a response to a published article and requires no approval by an ethics committee. The author declares that the present article contains no personal information that could identify patients.

Financial disclosure

No financial support was received in relation to this article.

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1 Please cite this article as: Montes-Arcón PS. La visión del patólogo en el diagnóstico diferencial entre la enfermedad de Crohn y la tuberculosis intestinal. Rev Gastroenterol Méx. 2022. https://doi.org/10.1016/j.rgmx.2022.03.009

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Conflict of interest

The author declares that there is no conflict of interest.

References


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