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UNUSUAL PRESENTATION OF INFECTION BY *HELICOBACTER PYLORI*: GASTRITIS ASSOCIATED WITH RUSSELL BODIES, INFREQUENT AND POORLY UNDERSTOOD PATHOLOGY

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Dear Editor,

Russell body gastritis (RBG) is a rare benign disease that can be confused with immunocytic neoplasms (1). It is characterized by the accumulation of plasma cells in the gastric mucosa that contain Russell bodies (RB) (1,2).

Case report

The case is a 36-year-old woman who presented as an outpatient complaining of epigastric pain with an evolution of six months.

Esophagogastroduodenoscopy (EGD) showed nodular antral gastritis. Antrum biopsies showed non-diffuse severe atrophy, chronic active gastritis with plasma cells and Russell bodies inside associated with *Helicobacter pylori* (HP) +++/+++. Immunological staining of the infiltrating cells was positive for CD138 as well as both K and λ light chains, verifying the non-neoplastic origin of these cells, and thus confirming the diagnosis of GCR.

The patient underwent HP eradication treatment and her symptoms were resolved.

Endoscopic and histopathological controls were performed at nine months, showing a marked improvement compared to the previous study.

Discussion

RBG was described in 1998 (3), and is a rare entity characterized by intramucosal accumulation of plasma cells containing RB. These cells, also called Mott cells, are the result of overstimulation of plasma cells by an antigen, possibly associated with HP infection. This results in the intracytoplasmic accumulation of undegraded immunoglobulins condensed in the endoplasmic reticulum (1,4). These characteristics can be confused with neoplasia type lymphoplasmacytic lymphoma, MALT lymphoma with plasma cell differentiation, plasmacytoma or even signet ring cell adenocarcinoma, among other pathologies. Therefore, a diagnosis should be made with immunohistochemistry techniques (2).

References

1. Karabagli P, Gokturk HS. Russell body gastritis: Case report and review of the literature. J Gastrointestin Liver Dis 2012;21(1):97-100.
2. Pizzolitto S, Camilot D, DeMaglio G, et al. Russell body gastritis: Expanding the spectrum of Helicobacter pylori - Related diseases? Pathol Res Pract 2007;203(6):457-60. DOI: 10.1016/j.prp.2007.01.009
3. Tazawa K, Tsutsumi Y. Localized accumulation of Russell body-containing plasma cells in gastric mucosa with Helicobacter pylori infection: "Russell body gastritis". Pathol Int 1998;48(3):242-4. DOI: 10.1111/j.1440-1827.1998.tb03901.x
4. Romero-Lagarza AP. Gastritis crónica asociada con cuerpos de Russell: ¿una nueva entidad patológica o poco reconocida? Endoscopia 2010;22(04):152-4.

Fig. 1. Infiltrating cells showing diffuse cytoplasmic positivity with an anti-CD138 antibody.

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