ISSN No: -2456-2165 https://doi.org/10.38124/ijisrt/26jan221

Pseudo-Tumoral Intestinal Tuberculosis: A New Case Report

Fouad Haddad[1]; Oscar Ntiranyibagira[1*]; Aicha Darif[1]; Gaspard Nizigiyimana[2]; Zineb Boukhal[1]; Fatima Zahra El Rhaoussi[1]; Mohammed Tahiri[1]; Wafaa Hliwa[1]; Ahmed Bellabah[1]; Saad Rifki Jai[2]; Wafaa Badre[1]

[1]Department of Hepato-Gastroenterology and Proctology, Ibn Rochd University Hospital Center, Casablanca, Morocco.
[2]Department of Digestive Cancers and Liver Transplantation, General Surgery Department, Ibn Rochd University Hospital Center, Casablanca, Morocco.

Corresponding Author: Oscar Ntiranyibagira[1*]

Publication Date: 2026/01/10

Abstract: Intestinal tuberculosis in its rare pseudotumoral form can mimic cancer or Crohn's disease, creating a diagnostic challenge that delays appropriate management. Histology is often nonspecific, and polymerase chain reaction constitutes an essential diagnostic tool.

The inappropriate initiation of immunosuppressive therapy may worsen the condition. Malabsorption of antituberculosis drugs should be considered in cases of therapeutic failure.

We report the case of a 46-year-old man initially treated for Crohn's disease due to chronic abdominal pain, diarrhea, and ileocecal lesions. Abdominopelvic computed tomography scan showed thickening of the ileal loops, with the first colonoscopy revealing ileocecal ulcerations. Biopsies were suggestive of non-necrotizing granulomatous colitis. The patient received corticosteroids and immunosuppressive therapy without improvement.

The persistence of symptoms led to a second colonoscopy, whose biopsies revealed a positive polymerase chain reaction for Mycobacterium tuberculosis, justifying the initiation of antituberculosis treatment.

After two months of antituberculosis treatment without improvement, a new colonic evaluation revealed an ulcerated, budding, friable, and bleeding cecal mass, with another positive polymerase chain reaction for Mycobacterium tuberculosis, confirmed during subsequent endoscopic examinations. In the absence of resistance to antituberculosis drugs, therapeutic adjustment was undertaken, suspecting impaired drug absorption.

This case highlights the importance of considering intestinal tuberculosis in the differential diagnosis of ileocecal masses. A multidisciplinary approach integrating clinical, histological, radiological, and molecular data is essential to avoid diagnostic and therapeutic errors.

Keywords: *Intestinal Tuberculosis, Pseudo-Tumoral form, Crohn Mimic, PCR, Diagnostic Pitfall.*

How to Cite : Fouad Haddad; Oscar Ntiranyibagira; Aicha Darif; Gaspard Nizigiyimana; Zineb Boukhal; Fatima Zahra El Rhaoussi; Mohammed Tahiri; Wafaa Hliwa; Ahmed Bellabah; Saad Rifki Jai; Wafaa Badre (2026) Pseudo-Tumoral Intestinal Tuberculosis: A New Case Report. *International Journal of Innovative Science and Research Technology*, 11(1), 470-472. https://doi.org/10.38124/ijisrt/26jan221

I. INTRODUCTION

The incidence of intestinal tuberculosis has increased in parallel with the global rise in tuberculosis prevalence and occurs mainly in endemic areas. It may mimic Crohn's disease or even neoplasia, both clinically and endoscopically [1]. This ambiguity can lead to delayed diagnosis and inappropriate treatments, which may result in potentially severe complications. The pseudo-tumoral form, although rare, represents a particularly challenging pitfall [2]. The aim of this study is to describe a case of pseudo-tumoral intestinal tuberculosis, in order to highlight diagnostic pitfalls and

ISSN No: -2456-2165 https://doi.org/10.38124/ijisrt/26jan221

emphasize the importance of a rigorous differential diagnosis in endemic regions.

II. PATIENT AND OBSERVATION

A 46-year-old man, a former chronic smoker who quit in 2014, had been followed as an outpatient since March 2024 for suspected ileocolic Crohn's disease. The clinical picture included abdominal pain and chronic diarrhea. Abdominopelvic computed tomography showed multisegmental thickening of the terminal ileal loops, suggesting chronic inflammatory bowel disease. Colonoscopy revealed multiple ulcerations at the ileocecal junction, and histological examination of the biopsies indicated non-necrotizing granulomatous colitis, compatible with either Crohn's disease or tuberculous ileitis.

The patient received tapering corticosteroid therapy, azathioprine, and mesalazine, with no significant clinical improvement. An appendectomy was performed in July 2024, but no histological analysis was carried out.

The persistence of symptoms led to hospitalization in February 2025. The patient presented with a deterioration of general condition, diffuse abdominal pain, fever at 38°C, and night sweats. Laboratory tests revealed anemia (hemoglobin = 8.4 g/dl), leukopenia (white blood cells = 2,650/mm³), severe lymphopenia (lymphocytes = 650/mm³), and an elevated C-reactive protein (CRP) level of 86.6 mg/l. The QuantiFERON test was positive, but sputum smears for Mycobacterium tuberculosis were negative. Human Immunodeficiency Virus serology was negative.

Abdominal computed tomography revealed diffuse and regular thickening of the small bowel loops, extending to the terminal ileal loop, with celiomesenteric lymphadenopathy and pelvic effusion. An enteroscopy computed tomography confirmed ileal and cecal thickening with fat stranding (Figure A). Colonoscopy showed an ulcerated and stenotic ileocecal valve, along with geographic-shaped ulcerations. Intestinal biopsies with polymerase chain reaction for Mycobacterium tuberculosis were positive, allowing the diagnosis of intestinal tuberculosis to be established. Azathioprine was discontinued and first-line anti-tuberculosis therapy was initiated.

However, due to the absence of therapeutic response after two months, rehospitalization was required in April 2025. The patient presented with severe anemia (hemoglobin = 6.9 g/dL) and hypoalbuminemia (20 g/L) with clinical signs of malnutrition such as lower-limb edema. The endoscopy performed at that time showed an approximately 4cm ulcerated and budding mass in the cecal recess, friable and bleeding, highly suggestive of a tumor (Figure B). The ileocecal valve was stenosed and ulcerated. Polymerase chain reaction testing for Mycobacterium tuberculosis on the new biopsies was again positive, with no resistance mutations to rifampicin or isoniazid. Histological analysis did not show malignancy but acute inflammatory changes.

Given the persistence of symptoms despite appropriate antituberculosis therapy, a new colonoscopy in May 2025 confirmed the persistence of the pseudo-tumoral mass, with a positive PCR for Mycobacterium tuberculosis. The hypothesis of antituberculosis drug malabsorption was considered, and dose adjustments were done. After 6 months of follow-up, the patient is asymptomatic, with resolution of digestive and infectious manifestations and a return to normal body weight.

This case strikingly illustrates the ability of intestinal tuberculosis to mimic a malignant tumor clinically, endoscopically, and radiologically and the diagnostic difficulty presented by atypical or persistent forms despite treatment.

III. DISCUSSION

In endemic countries, intestinal tuberculosis remains underdiagnosed, although it represents a significant cause of digestive pathology [3,4]. Our case illustrates the persistent diagnostic challenges, even in a hospital setting, and the risk of confusion with inflammatory or neoplastic diseases.

The ileocecal region is the most frequent site due to local conditions favoring bacillary implantation: stasis, high lymphoid density, and strong absorptive activity. The clinical presentation is often nonspecific: abdominal pain, chronic diarrhea, fever, weight loss, and general health deterioration. These signs may suggest Crohn's disease or colonic cancer, leading to diagnostic delay [5].

The pseudo-tumoral form is rare but constitutes a true diagnostic trap [3,6]. It presents as an ulcerated, budding mass, sometimes stenosing, mimicking a malignant tumor. In our case, the endoscopic and radiological findings (mass in the cecal recess, parietal thickening, lymphadenopathy) initially suggested a digestive cancer. This confusion has been described in several studies and sometimes leads to unnecessary surgeries before histological confirmation [7].

Our patient initially received immunosuppressive treatment for suspected Crohn's disease. This approach, common in areas with high and worsen the pseudo-tumoral presentation [2,8]. This phenomenon highlights the need for a rigorous differential diagnosis before initiating any immunosuppressive treatment. Histology alone does not always allow a clear distinction between tuberculosis, Crohn's disease, or cancer. In this context, polymerase chain reaction testing for Mycobacterium tuberculosis on digestive biopsies is a major tool [6,9]. Its sensitivity (65%) and specificity (93–100%) are high. In our case, repeated polymerase chain reaction positivity on the biopsies made it possible to avoid an unnecessary colectomy. The World Gastroenterology Organisation Global Guidelines on digestive tuberculosis emphasize the crucial importance of polymerase chain reaction in tuberculosis control strategies, especially in its atypical digestive forms [1].

Antituberculous treatment (Rifampicin, Isoniazid, Pyrazinamide, Ethambutol) remains the cornerstone of

ISSN No: -2456-2165 https://doi.org/10.38124/ijisrt/26jan221

management. However, in some patients particularly those with extensive ulcerative-necrotic forms malabsorption may compromise treatment efficacy [10]. Dose adjustments, nutritional support (albumin, iron), and close clinical monitoring are therefore required.

IV. CONCLUSION

The case presented illustrates a rare but emblematic form of pseudo-tumoral intestinal tuberculosis. It highlights the need to integrate clinical, endoscopic, histological, and molecular data to establish a reliable diagnosis. PCR for *Mycobacterium tuberculosis* (BK) in particular represents a decisive turning point in guiding therapy. In endemic settings, only a rigorous, informed multidisciplinary approach can prevent diagnostic pitfalls and harmful treatments.

REFERENCES

[1]. Digestive_tract_tuberculosis_French_2021.pdf [Internet]. [cité 15 août 2025]. Disponible sur: https://www.worldgastroenterology.org/UserFiles/file/guidelines/digestive_tract_tuberculosis_French_2021.pdf.

[2]. Inappropriate prescription of corticosteroid therapy during inflammatory ileo-colitis revealing disseminated tuberculosis with digestive involvement: Two case reports - Razafindrazoto - 2021 - Clinical Case Reports - Wiley Online Library [Internet]. [cité 19 août 2025]. Disponible sur: https://onlinelibrary.wiley.com/doi/full/10.1002/ccr3.4215?msockid=038f9e23f086694204748fe2f1416853.

[3]. Loumi P. Tuberculose intestinale. Facmed-univ-oran.dz, 2024; 22-46

[4]. Chahboune M, Barkaoui M, Iderdar Y, Alwachami N, Mourajid Y, Ifleh M, Boumendil K, Bachar K, El Madani S. [Epidemiological profile and diagnostic and evolutionary features of TB patients at the Diagnostic Centre for Tuberculosis and Respiratory Diseases in Settat, Morocco]. Pan Afr Med J. 2022;42:185.

[5]. Lakhe P, Khalife A, Pandya J. Ileocaecal and transverse colonic tuberculosis mimicking colonic malignancy - A case report. Int J Surg Case Rep. 2017;36:4-7.

[6]. Kpossou AR, Adjadohoun S, Diallo K, Badarou S, Ngamo G, Sokpon CNM, Vignon RK, Takin R, Yekpè P, Sehonou J, Biaou O. [Multifocal tuberculosis simulating multimetastatic colon cancer in an immunocompetent black African patient: a case report]. Pan Afr Med J. 2021;39:167.

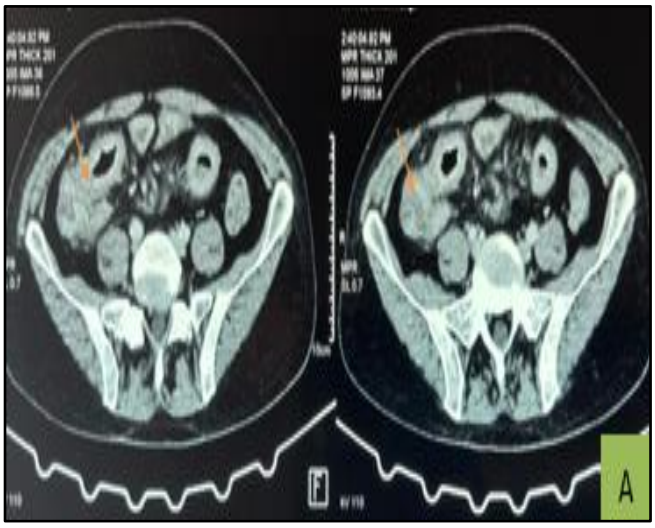
[7]. Sghaier M, Ben Ismail I, Rebii S, Zoghlami A. Tuberculose iléocæcale et hépatique mimant une tumeur caecale métastatique. J Chir Viscérale. 1 sept 2022;159(4, Supplement):S109.

[8]. Choudhury A, Dhillon J, Sekar A, Gupta P, Singh H, Sharma V. Differentiating gastrointestinal tuberculosis and Crohn's disease- a comprehensive review. BMC Gastroenterol. 19 juill 2023;23(1):246.

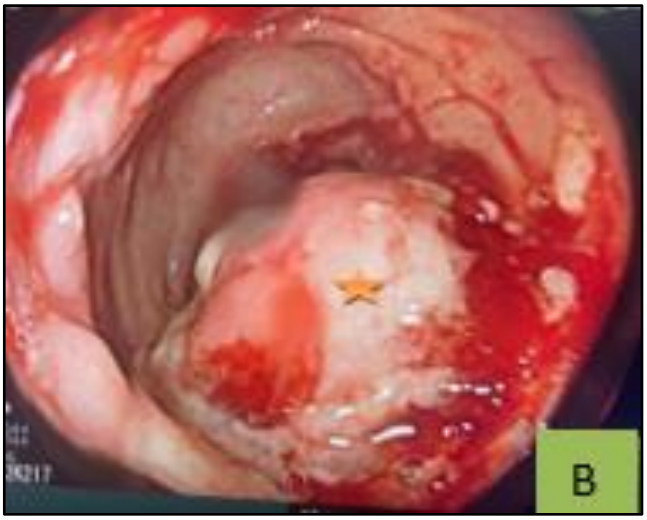
[9]. Une suspicion de maladie de Crohn peut se révéler être une tuberculose intestinale - Medizinonline [Internet]. 2024 [cité 15 août 2025]. Disponible sur: https://medizinonline.com/fr/une-suspicion-de-maladie-de-crohn-peut-se-reveler-etre-une-tuberculose-intestinale/.

[10]. Nozières C, Pariset C, Assaad S, Bachet P. La tuberculose intestinale : une forme méconnue d'une infection trop connue. Médecine Mal Infect. 1 juill 2008;38(7):400-2.

FIGURES: Lesion Imaging



A: CT Scan Image Showing Thickening of the Terminal Ileum (Arrow)



B: Endoscopic Image Revealing a Pseudo-Mass in the Cecal Base (Star)