Abstract / Özet

Terminal Ileum Angiolipoma Prolapsing through the Ileocecal Valve into the Colon Causing Symptoms of Intermittent Subileus: A Rare Case Report

İleoçekal Valvden Kolona Prolabe Olan ve İntermitan Subileus Kliniğine Yol açan Terminal İleum Anjiyolipomu: Nadir Bir Olgu Sunumu

Neşe Arzu Yener<sup>1</sup>, Gülbüz Sezgin<sup>2</sup>, Manuk Manukyan<sup>3</sup>, Ahmet Midi<sup>1</sup>, Ahmet Melih Özel<sup>4</sup>, Oya Uygur Bayramiçli<sup>4</sup>

Angiolipoma is a common benign neoplasm of subcutaneous tissues and it is rarely located in the gastrointestinal tract. We report an 86-year-old woman with ileal angiolipoma having the symptoms of intermittent subileus without any significant laboratory findings. We focus on the correct pre- and postoperative diagnosis of this rare entity at this rare localization.

**Key Words:** Terminal ileum angiolipoma, angiolipoma, angiolipoma of the small intestine

Anjiyolipom; ciltaltı yumuşak dokularda sık görülen benign bir neoplazidir, nadiren gastrointestinal sistemde de yerleşebilir. Bu çalışmada; herhangi dikkat çekici bir laboratuvar bulgusu olmaksızın ara sıra subileus klinik tablosu ile başvuran, ileal anjiyolipomu olan 86 yaşında bayan hastayı sunmayı amaçladık. Bu lokalizasyonda nadir olarak bildirilen bu lezyonun ameliyat öncesi ve sonrasında doğru tanı almasının önemini vurguladık.

**Anahtar Kelimeler:** Terminal ileum anjiyolipomu, anjiyolipom, ince barsak anjiyolipom

## Introduction

Angiolipoma is a common benign neoplasm generally originating from subcutaneous soft tissues. Ileal localization of this tumor is so rare that only a few cases ahave been reported to date (1, 2). Here, we report an angiolipoma located in the distal part of the terminal ileum which prolapses through the ileocecal valve and causes severe, intermittent abdominal pain.

# **Case Report**

An eighty-six-year-old woman presented with severe, intermittent right-sided lower abdominal pain. Her past medical history was unremarkable. Laboratory findings, including routine biochemical and hematology tests, were within normal limits and the fecal occult blood test was negative. An abdominal computed tomography (CT) scan revealed a mass of 2.09 cm in diameter located in the terminal ileum (Figure 1). Colonoscopy revealed a pedinculated polyp, about 2 cm in diameter, located in the terminal ileum. The polyp had a thick stalk and a smooth surface covered with normal ileal mucosa. The lesion was observed as intermittently protruding from the ileocecal valve during the procedure (Figure 2). Endoscopic polypectomy was not performed because of the difficult localization and the remarkably thick stalk of the lesion. So, the patient underwent surgery with the presumptive diagnosis of a benign polypoid mass of the terminal ileum. The surgical procedure was a simple, local resection of the mass (Figure 3). No complications were seen in the early follow-up. Grossly, the specimen was a well defined polypoid submucosal lesion with the dimensions of 22x22x20 mm. The cut surface of the lesion was mainly yellowish mixed with gray - white areas (Figure 4a). Histopathologically, the lesion was composed of lobules of mature adipocytes and vessels with varying calibers in a fibrocollagenous stroma (Figure 4b). Small aggregates of lymphoid cells were also seen. There were no areas of necrosis, atypical cells in the stroma or lipoblasts. There was no true muscular component within the fatty tissue. The final pathological diagnosis was angiolipoma.

### Discussion

Angiolipomas are benign tumors which generally arise in subcutaneous tissues and they are rarely located in the gastrointestinal tract (3). Only 23 angiolipomas in the gastrointestinal tract have been reported to date (4). Of these, one was located in the oesophagus, three in the stomach, two in the duodenum, six in the small intestine, three in the ileocecal valve, six in the colon and two in the rectum (3, 4). They usually present as protruding intraluminal submucosal masses which lead to intestinal obstruction or bleeding or they also may be asymptomatic (5). Patients with ileocecal angiolipomas were reported to have occult blood loss that resulted

<sup>1</sup>Department of Pathology, Faculty of Medicine, Maltepe University, Istanbul, Türkiye <sup>2</sup>Department of Internal Medicine Faculty of Medicine Maltepe University, İstanbul, Türkiye <sup>3</sup>Department of General Surgery Faculty of Medicine Maltepe University, İstanbul, Türkiye <sup>4</sup>Department of Internal Medicine Division of Gastroenterology Faculty of Medicine, Maltepe University, Istanbul Türkiye

#### Address for Correspondence Yazışma Adresi:

Nese Arzu Yener, Department of Pathology, Faculty of Medicine, Maltepe University, İstanbul, Türkiye

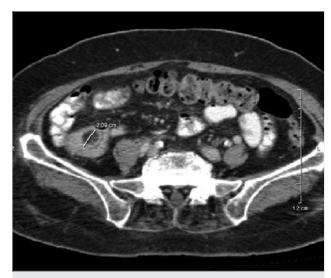
Phone: +90 444 0 620/1112 E-mail: nese.yener@maltepe.edu.tr

Received/Geliş Tarihi: 16.12.2012

Accepted/Kabul Tarihi:

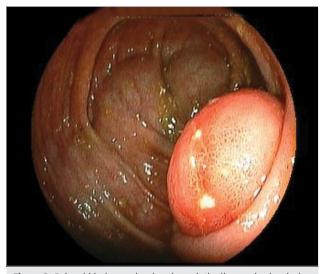
© Copyright 2014 by Available online at www.istanbulmedicaljournal.org

© Telif Hakkı 2014 Makale metnine www.istanbultipdergisi.org web sayfasından ulaşılabilir.



**Figure 1.** Abdominal CT scan in an axial view showing the submucosal polypoid lesion of the terminal ileum

CT: computed tomography



**Figure 2.** Polypoid lesion prolapsing through the ileocecal valve during the colonoscopy

in chronic anemia (1, 3) Preoperative diagnosis of a lipomatous origin of the lesion may be suggested if the features of fat density are seen in CT scanning (5). Histologically, it is comprised of mature adipocyte tissue with blood vessels (1-5). Surgical or endoscopic resection is the treatment of choice. Our patient had severe intermittent right-sided lower abdominal pain without any significant laboratory findings such as anemia or fecal occult blood. A possible benign and lipomatous nature of the lesion was suggested both radiologically and endoscopically.

#### Conclusion

This is an interesting case of angiolipoma of the terminal ileum which intermittently protrudes through the ileocecal valve causing symptoms of intermittent subileus. We believe that, in patients with the clinical findings of intermittent subileus who otherwise do not have any sigificant abnormalities in routine laboratory investigations, benign lesions of the small intestine or colon should be kept in mind in the differential diagnosis. Endoscopic intervention is the treatment of choice in these cases, but when it is impossible to perform endoscopic polypectomy safely, surgical resection should be performed.

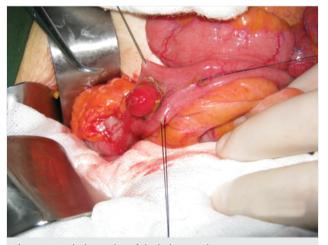


Figure 3. Surgical resection of the lesion was done



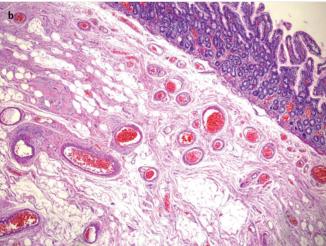


Figure 4. a.b. Grossly, well defined submucosal lesion (a), Microscopically, the adipocytes and the blood vessel components are seen (H&E,x200 original magnification) (b)

**Informed Consent:** Written informed consent was obtained from the patient who participated in this study.

Peer-review: Externally peer-reviewed.

Author Contributions: Concept - NAY., AM.; Design - O.U.B, N.A.Y., Supervision - A.M.Ö, M.M, O.U.B; Funding - G.S., A.M.Ö., O.U.B., Materials - M.M., O.U.B., G.S.; Data Collection and/or Processing - N.A.Y., A.M., O.U.B.; Analysis and/or Interpretation - N.A.Y., A.M., G.S.; Literature Review- A.M., N.A.Y.; Writing - N.A.Y., A.M.Ö.; Critical Review - M.M., N.A.Y., A.M.

**Conflict of Interest:** No conflict of interest was declared by the authors.

**Financial Disclosure:** The authors declared that this study has received no financial support.

**Hasta Onamı:** Yazılı hasta onamı bu çalışmaya katılan hastalardan alınmıştır.

Hakem değerlendirmesi: Dış bağımsız.

Yazar Katkıları: Fikir - NAY., AM.; Tasarım - O.U.B, N.A.Y., A.M.Ö; Denetleme - A.M.Ö, M.M, O.U.B; Kaynaklar - G.S., A.M.Ö., O.U.B., Malzemeler - M.M., O.U.B., G.S.; Veri toplanması ve/veya işlemesi -

N.A.Y., A.M., O.U.B.; Analiz ve/veya Yorum - N.A.Y., A.M., G.S.; Literatür taraması - A.M., N.A.Y.; Yazıyı yazanlar - N.A.Y., A.M.Ö.; Eleştirel inceleme - M.M., N.A.Y., A.M.

Çıkar Çatışması: Yazarlar çıkar çatışması bildirmemişlerdir.

**Finansal Destek:** Yazarlar bu çalışma için finansal destek almadıklarını beyan etmişlerdir.

#### References

- 1. Manner M, Scholz E, Wehrmann M, Stickel W. Invagination caused by angiolipoma of the small intestine: A rare cause of occult gastrointestinal hemorrhage. Chirurg 2001; 72: 305-7. [CrossRef]
- 2. Kwak HS, Kim CS, Lee JM. Small intestinal angiolipoma: MR imaging appearance. Abdom Imaging 2003; 28: 515-7. [CrossRef]
- Della Volpe N, Bianco L, Bonuso C, Annecchiarico M, Silverio Di P, Caiazza A. Rare ileal localisation of angiolipoma presenting as chronic haemorrhage and severe anaemia: a case report. J Med Case Reports 2008; 2: 129. [CrossRef]
- Wang L, Chen P, Zong L, Wang GY, Wang H. Colon angiolipoma with intussusception: a case report and literature review. World J Surg Oncol 2013; 11: 69. [CrossRef]
- Aminian A, Noaparast M, Mirsharifi R, Bodahabadi M, Mardany O, Ali FAH, et al. Ileal intussusception secondary to both lipoma and angiolipoma: A case report. Cases J 2009; 30: 7099. [CrossRef]