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Case report

Successful Endoscopic Resection of a Large Colonic Lipoma Presenting with Lower Gastro-Intestinal hemorrhage: a case report

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SUMMARY

Colonic lipomas are rare benign tumors that are usually asymptomatic. Herein we present a case of a large (max diameter 42 mm) pedunculated lipoma in the ascending colon causing massive lower gastrointestinal bleeding. Previous reports indicate that surgical intervention is preferable in cases presenting with severe symptoms such as obstruction or hemorrhage. In our case, endoscopic snare resection was performed after endoclipping the pedicle without immediate or delayed complications. A further evaluation of endoscopic therapy for colonic lipomas is warranted to assess both efficacy and complications.

Key words: Colonic lipoma, giant hemorrhage, colonoscopy, endoscopic treatment.

INTRODUCTION

Colonic lipomas are rare, benign tumors of the gastrointestinal tract. As they usually follow a silent clinical course, they are often incidentally detected at colonoscopy, surgery or autopsy.[1-3] In some cases, especially when lipomas are larger than 2cm, they may be related with a broad clinical spectrum which ranges from non-specific abdominal pain and changes in bowel habits to more urgent situations such as rectal bleeding, intussuseption, prolapse or obstruction.[4-6] It has been previously reported that sometimes colon lipomas can also be the source of massive lower gastrointestinal bleeding, although this is an extremely rare condition according to the published literature.[7] When a colonic lipoma is detected, especially if symptomatic and of large dimensions, the current recommendations for therapeutic intervention are controversial with the majority of authors preferring the relative safety of surgical resection. We herein report a case of a giant lipoma of the ascending colon (max diameter 4.2 cm) presented with massive gastrointestinal bleeding, treated successfully endoscopically.

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CASE REPORT

A 82-year-old man was admitted in June 2008 because of massive rectal bleeding. He referred sudden onset of the symptoms and in total four large bloody evacuations, accompanied by urgency and dizziness. He did not complain for any other symptoms such as abdominal pain or distension, fever, anorexia or previous changes in bowel habits. The patient was on anti-coagulants because of chronic atrial fibrillation. Clinical examination revealed blood pressure 90-60 mmHg and tachycardia (120 bpm). No meaningful findings were obtained in abdominal examination. Detailed laboratory studies revealed anemia (Hct: 28.4%, Hb: 9.1 mg/dl), prolonged INR (INR: 2.4) and increased urea levels (Ur: 75 IU/ml, n.v. 15-45). After appropriate resuscitation the patient was stabilized, hemorrhagic evacuations stopped and INR returned within normal limits. Colonoscopy revealed multiple large diverticuli in the sigmoid colon without signs of inflammation or active/recent bleeding. In the ascending colon a large, smooth, spherical, penduculated, polypoid mass was found and recognized as the possible bleeding source

Figure 1. Endoscopic image of the colonic lipoma

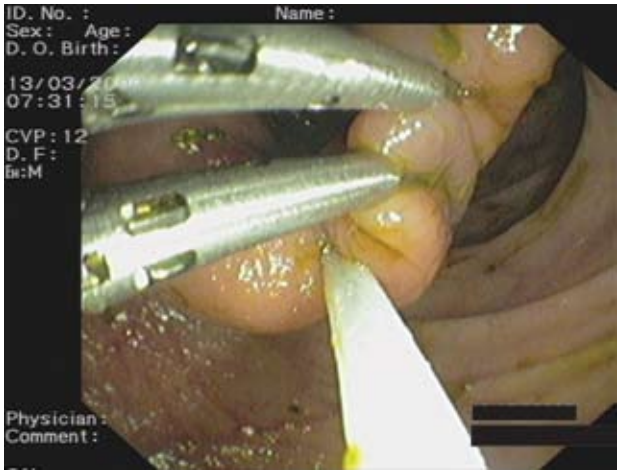

Figure 2. Endoscopic snare resection of the colonic lipoma after endoclipping the pedicle.

(Figure 1). The characteristics of the polyp and the fact that the mass presented the "cushion sign" and the "tenting effect" promoted diagnosis of colonic lipoma as the most probable. We decided to remove the lesion endoscopically in a repeat colonoscopy after an informed consent was obtained. A complete team of surgeons, anesthesiologists and cardiologists was standing-by in case of complication. In the repeat colonoscopy we placed three endoscopic clips (resolution clip Boston Scientific 235 cm) in the pedicle (figure 2) and then proceeded to snare (SnareMaster SD210U-25 Olympus) polypectomy (Figure 2). No immediate or delayed complications, such as bleeding or perforation, followed. The patient was discharged two days after the resection. The pathological examination reported a colonic lipoma (Figure 3). Five months after the endoscopic resection the patient remains in excellent condition.

Figure 3. The specimen for pathological examination.

DISCUSSION

Although colonic lipomas are considered uncommon benign tumors of the colon, with a reported incidence between 0.2-4.4%, they are the second most common benign colonic tumors following adenomatous polyps.[5,8] Colonic lipomas are more frequent in the elderly and in the ascending colon .[8] They are usually solitary with varying size and may be sessile or pedunculated.[9,10] When of small dimensions (< 2cm) are usually asymptomatic and incidentally detected. It is widely accepted that lipomas larger than 2cm in diameter, are likely to be symptomatic and that those with diameter greater than 3.5 cm are unusually asymptomatic.[10] Clinical manifestations of colonic lipomas, when present, may range from non-specific abdominal pain and changes in bowel habits to more urgent situations such as bleeding, intussuseption, prolapse or obstruction.[4-6] Herein, a giant lipoma in the ascending colon caused massive lower gastrointestinal bleeding, an extremely rare manifestation according to the published literature.[7]

Current recommendations on the type of the therapeutic approach depend on the characteristics of the tumor and its clinical presentation. Small, asymptomatic, lipomas (<2cm) are recommended to be regularly followed-up without any additional treatment (10). Elective endoscopic removal of small lipomas has also been proven to be a safe and appropriate therapeutic choice.[1-3] Large lipomas (>2cm), are more likely to cause symptoms and re-

section should be considered.[11] Data regarding the type of approach are controversial. Most authors believe that in cases of large lipomas surgical approach is more preferable as some studies have demonstrated that endoscopic removal is associated with a greater risk of perforation or hemorrhage, especially if the lesion is sessile or broadly based.[10,12] In addition, the fact that the fatty tissue is an inefficient conductor of the electrical current is in favor of the surgical approach.[3,13] In contrast, some authors have reported that large pedunculated or sessile lipomas can be safely endoscopically removed. Colonic lipomas as large as 5 cm in diameter have been endoscopically resected without complications.[1,14-16] Those in favor of the endoscopic treatment also suggest that surgical approaches such as hemicolectomy, segmental resection or even local excision are more invasive techniques, which increase the risk of complications and prolong hospitalization.

Some authors suggest that when a colonic lipoma presents with severe symptoms, such as obstruction or hemorrhage, surgical approach is preferable.[3,5,7] In our case endoscopic resection was done safely. It is quite sure that following this type of approach the number of surgical interventions for colonic lipomas will decrease. We believe that the advances in the field of interventional endoscopy and the increasing accumulation of experience by endoscopists, will widen the spectrum of application of endoscopic treatment for colonic lipomas in the near future. New studies on the current incidence of complications following endoscopic resection of large colonic lipomas are needed.

In conclusion, our case showed that the endoclipping of pedunculated large colonic lipomas is a safe technique, which avoids the risk of perforation or bleeding of the snare cautery, even in cases presenting with massive bleeding. A further evaluation of this technique is warranted to assess both efficacy and complications.

REFERENCES

1. Kim CY, Bandres D, Tio TL, Benjamin SB, Al-Kawas FH. Endoscopic removal of large colonic lipomas. Gastrointest Endosc 2002; 55: 929-931.
2. Liessi G, Pavanello M, Cesari S, Dell'Antonio C, Avventi P. Large lipomas of the colon: CT and MR findings in three symptomatic cases. Abdom Imaging 1996; 21: 150-152.
3. Pfeil SA, Weaver MG, Abdul-Karim FW, Yang P. Colonic lipomas: outcome of endoscopic removal. Gastrointest Endosc 1990; 36: 435-438.
4. Fernandez MJ, Davis RP, Nora PF. Gastrointestinal lipomas. Arch Surg 1983; 118:1081–1083.
5. Vecchio R, Ferrara M, Mosca F, Ignoto A, Latteri F. Lipomas of the large bowel. Eur J Surg 1996; 162:915–919.
6. Kaushik R, Yadav TD, Dabra A. A case of sigmoid lipoma presenting with intussusception. Trop Gastroenterol 2001; 22:97-98.
7. Rodriguez DI, Drehner DM, Beck DE, McCauley CE. Colonic lipoma as a source of massive hemorrhage. Report of a case. Dis Colon Rectum 1990; 33: 977-979.
8. Rogy MA, Mirza D, Berlakovich G, Winkelbauer F, Rauhs R. Submucous large-bowel lipomas--presentation and management. An 18-year study. Eur J Surg 1991; 157: 51–55.
9. Jiang L, Jiang L-S, Li F-Y, et al. Giant submucosal lipoma located in the discending colon: case report and review of the literature. World J Gastroenterol 2007; 13:5664-5667.
10. Zhang H, Cong J-C, Chen C-S, Qiao L, Liu E-Q. Submucous colon lipoma: A case report and review of the literature. World J Gastroenterol 2005; 11:3167-3169.
11. Tamura S, Yokoyama Y, Morita T, Tadokoro T, Higashidani Y, Onishi S. "Giant" colon lipoma: What kind of findings are necessary for the indication of endoscopic resection? Am J Gastroenterol 2001; 96:1944-1946.
12. Chase MP, Yarze JC. "Giant" colon lipoma-to attempt endoscopic resection or not? Am J Gastroenterol 2000; 95: 2143-2144.
13. Chung YF, Ho YH, Nyam DC, Leong AF, Seow-Choen F. Management of colonic lipomas. Aust NZJ Surg 1998; 68:133–135.
14. Creasy TS, Baker AR, Talbot IC, Veitch PS. Symptomatic submucosal lipoma of the large bowel. Br J Surg 1987; 74:984-986.
15. Bar-Meir S, Halla A, Baratz M. Endoscopic removal of colonic lipoma. Endoscopy 1981; 13: 135-136.
16. Raju GS, Gomez G. Endoloop ligation of a large colonic lipoma: a novel technique. Gastrointest Endosc 2005; 62: 988-990.