elucidated. Therapeutic local lymph node dissection (LND) is advised in proven lymph node metastasis.[7,9]

The presence of invasive EMPPD along with lymph node metastases have proved to determine prognosis of EMPDD.[2] Overall 5-years survival range 59.7–71.7%,[6,7,9] being both overall survival and disease-specific survival significantly shorter in patients with invasive disease.[9] LR remains the main concern as rates for noninvasive EMPPD reach 30%, although in patients with invasive EMPPD LR these accrue up to 56–60%.[2,9]

In conclusion, these cases underline the importance of an early diagnosis of EMPPD. Understanding the pathophysiology and histological key features is crucial to offer patients and early and individualized treatment.

## REFERENCES


1. Dawson H, Serra S. Tumours and inflammatory lesions of the anal canal and perianal skin revisited: an update and practical approach. J Clin Pathol. 2015;68:971–81. http://dx.doi.org/10.1136/jclinpath-2015-203056.
2. Simonds RM, Segal RJ, Sharma A. Extramammary Paget's disease: a review of the literature. Int J Dermatol. 2019;58:871–9. http://dx.doi.org/10.1111/ijd.14328.
3. Abbass MA, Valente MA. Premalignant and malignant perianal lesions. Clin Colon Rectal Surg. 2019;32:386–93. http://dx.doi.org/10.1055/s-0039-1687835.
4. Lee GC, Kunitake H, Stafford C, Bordeianou LG, Francone TD, Ricciardi R. High risk of proximal and local neoplasms in 2206 patients with anogenital extramammary Paget's disease. Dis Colon Rectum. 2019;62:1283–93. http://dx.doi.org/10.1097/DCR.0000000000001487.
5. Hutchings D, Windon A, Assarzadegan N, Salimian KJ, Voltaggio L, Montgomery EA. Perianal Paget's disease as spread from non-invasive colorectal adenomas. Histopathology. 2020;78:276–80. http://dx.doi.org/10.1111/his.14218.
6. Herrel LA, Weiss AD, Goodman M, Johnson TV, Osunkoya AO, Delman KA, et al. Extramammary Paget's disease in males: survival outcomes in 495 patients. Ann Surg Oncol. 2015;22:1625–30. http://dx.doi.org/10.1245/s10434-014-4139-y.
7. Isik O, Aytac E, Branlnard J, Valente MA, Abbas MA, Gorgun E. Perianal Paget's disease: three decades experience of a single institution. Int J Colorectal Dis. 2016;31:29–34. http://dx.doi.org/10.1007/s00384-015-2342-3.
8. Beck DE, Fazio VW. Perianal Paget's disease. Dis Colon Rectum. 1987;30:263–6. http://dx.doi.org/10.1007/BF02556169.
9. Perez DR, Trakarnsanga A, Shia J, Nash GM, Temple LK, Paty PB, et al. Management and outcome of perianal paget's disease: a 6-decade institutional experience. Dis Colon Rectum. 2014;57:747–51. http://dx.doi.org/10.1097/DCR.0000000000000100.
10. Tsutsumida A, Yamamoto Y, Minakawa H, Yoshida T, Kokubu I, Sugihara T. Indications for lymph node dissection in the treatment of extramammary Paget's disease. Dermatol Surg. 2003;29:21–4. http://dx.doi.org/10.1046/j.1524-4725.2003.29001.x.



Ignacio Aguirre-Allende*, Yolanda Saralegui-Ansorena, Iñigo Arana-Iñiguez, Carlos Placer-Galan, Jose María Enriquez-Navascués

*General and Digestive Surgery Department, Colorectal Surgery Unit, Donostia University Hospital, Biodonostia Research Institute, Beguiristain Doktorea Pasealekua s/n, 20014 Donostia-San Sebastián, Spain*

*Corresponding author.
E-mail address: ignacioaguirreallende@gmail.com
(I. Aguirre-Allende).


https://doi.org/10.1016/j.ciresp.2021.02.003


# Resection of the aortic bifurcation in the treatment of locally recurrent colorectal cancer☆


## Resección de la bifurcación aórtica en el tratamiento de la recidiva locorregional del cáncer colorrectal

Between 35% and 55% of patients with colorectal cancer (CRC) may have recurrences of the disease. In cases of locoregional recurrence that receive medical treatment alone (chemotherapy and monoclonal antibodies), the average survival is 8 months, while the 5-year survival rate is less than 5%. In addition, these patients present a low quality of life and experience pain that is often difficult to control, depending on the location of the lesion.

The analysis of necropsies in patients with locoregional recurrence of CRC has demonstrated the absence of distant metastasis in 50% of cases[1], so this group of patients could benefit from radical surgery[2]. The objective of the surgery is to obtain free surgical margins, or R0 resection. For oncologically correct margins, aggressive and sometimes multivisceral procedures may be necessary.

☆ Please cite this article as: Vitiello G, Soto Carricas B, Martínez Sánchez MC, Targarona Soler E. Resección de la bifurcación aórtica en el tratamiento de la recidiva locorregional del cáncer colorrectal. Cir Esp. 2021. https://doi.org/10.1016/j.ciresp.2020.12.009

The R0 rate achieved with this type of procedure is considered higher than 50%, with a mortality rate lower than 2%, morbidity 55%, and 5-year survival between 25% and 46%[3]; therefore, surgical treatment could be considered the treatment of choice in this clinical situation.

We present a case of locoregional recurrence of CRC with aortoiliac involvement. This 70-year-old male patient, who had no history of interest, had been treated with laparoscopic sigmoidectomy in 2017. The pathological analysis identified low-grade infiltrating adenocarcinoma, which was moderately differentiated (G2) and present in the adipose tissue and serosa, with perineural and angiolymphatic vascular invasion, high-grade tumor budding, and lymph node involvement (4/15) (stage pT4aN2a). The resection margins were free of tumor involvement. The patient was administered 8 cycles of XELOX adjuvant chemotherapy (capecitabine and oxaliplatin). During the 2-year follow-up, a CT scan detected a retroperitoneal lesion adjacent to the surgical clips of the inferior mesenteric artery, in contact with the anterior side of the infrarenal aorta, which we suspected to be local recurrence (Fig. 1). A PET/CT study showed hypermetabolic activity of the lesion suggestive of malignant disease, but no evidence of other lesions.

Given the diagnosis of a single lesion, the patient was considered a candidate for surgery with curative intent. Through a midline laparotomy, we accessed the infrarenal aorta and iliac arteries. A closely adhered tumor mass was observed, which affected more than 180° of the aorta surface, so we therefore decided to perform *en bloc* excision of the aorto-iliac segment next to the tumor. Subsequently, we conducted an end-to-end aorto-iliac bypass with a Dacron® stent (Fig. 1).

The anatomopathological analysis confirmed the diagnosis of recurrent adenocarcinoma of colorectal origin with invasion of the aortic wall (Fig. 2) and tumor-free resection margins.

There are few publications in the literature about the treatment of locoregional CRC recurrences with involvement of large vessels. We have only found isolated cases[4–8] and a few short series. Abdelsattar et al.[9] presented a series of 12 cases with different types of vascular involvement (7 internal iliac artery, 5 common iliac artery, 3 external iliac artery, 3 aorta, 2 internal iliac vein, 1 external iliac vein). In more than 50% of the cases, the authors achieved R0 resection, and 30-day mortality was 0. Four-year global survival and disease-free survival rates were 55% and 45%, respectively. Recently, Peacock et al.[10] published a series of 11 patients with resections of the common iliac artery (4 cases), external and internal iliac arteries (3 cases), external iliac artery (2 cases), aorta and common iliac artery (one case). Eight cases had associated iliac vein resections. In one case, only venous resection was performed. The R0 resection rate was 82%, with a low rate of postoperative complications.

From the limited existing data, we can conclude that the involvement of large vessels in local CRC recurrences should

**Fig. 2 – Panoramic photo of the aorta wall with invasion by adenocarcinoma.**

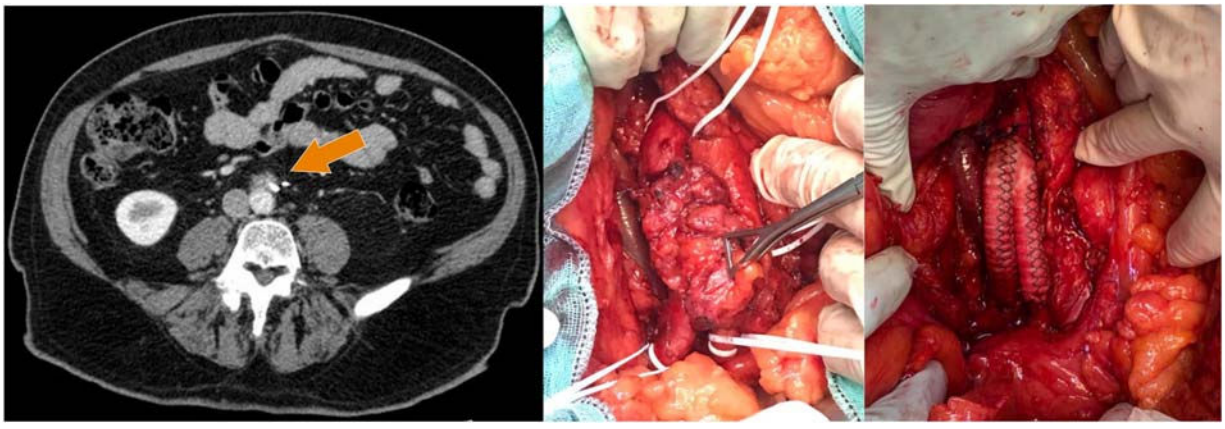

**Fig. 1 – Left: CT scan showing the retroperitoneal lesion suspected of neoplastic recurrence. Right: intraoperative images showing the aorta, inferior vena cava, iliac arteries, left ureter and the aortoiliac bypass with Dacron® stent.**

not be a contraindication for surgery with curative intent, as R0 resection is possible in selected patients. Likewise, the overall survival and disease-free survival rates are comparable to those observed in cases of locoregional recurrence of CRC without vascular involvement.

## Funding

The authors have received no funding for this study.

REFERENCES

1. Welch JP, Donaldson GA. The clinical correlation of an autopsy study of recurrent colorectal cancer. Ann Surg. 1979;189:496–502.
2. Cohen AM, Minsky BD. Aggressive surgical management of locally advanced primary and recurrent rectal cancer. Current status and future directions. Dis Colon Rectum. 1990;33:432–8.
3. Brown KGM, Koh CE. Surgical management of recurrent colon cancer. J Gastrointest Oncol. 2020;11:513–25.
4. Michiwa Y, Nishimura M, Funaki H, Fujita H, Miwa K, Urayama H. Extended resection for metastatic paraaortic lymph nodes together with abdominal aorta of recurrent sigmoid colon carcinoma, in which a prosthetic graft was used to replace the artery. Report of a case. Shujyutsu (Operation). 1998;52:2053–6.
5. Nakagawa H, Yoshikawa N, Yagyu T, Mishima H, Kobayashi K, Ueda A, et al. Extended lymphadenectomy for metastatic paraaortic lymph nodes together with abdominal aorta, in which a prosthetic graft was used to replace the artery. Report of a case. Shujyutsu (Operation). 1996;50:731–4.
6. Ueda K, Nagayama H, Narita K, Kusano M, Aiba M. Extended surgery with en bloc resection of the right common iliac vessels for lymph node metastasis of mucinous colon carcinoma: report of a case. Surg Today. 2001;31:238–41.
7. Tsarkov PV, Belov YV, Skipenko OG, Zavenyan ZS, Makeev YN, Troitskiy AA, et al. En bloc resection of abdominal aorta and paraaortic lymph node. Tech Coloproctol. 2007;11:346–9.
8. Wilson K, Waters PS, Peacock O, Heriot AG, Wagner T, Warrier SK. Multivisceral, vascular and nodal resection for recurrent rectal cancer involving the left renal tract, left pelvic side wall and abdominal aorta. ANZ J Surg. 2020;90:632–4.
9. Abdelsattar ZM, Mathis KL, Colibaseanu DT, Merchea A, Bower TC, Larson DW, et al. Surgery for locally advanced recurrent colorectal cancer involving the aortoiliac axis: can we achieve R0 resection and long-term survival? Dis Colon Rectum. 2013;56:711–6.
10. Peacock O, Smith N, Waters PS, Cheung F, McCormick JJ, Warrier SK. Outcomes of extended radical resections for locally advanced and recurrent pelvic malignancy involving the aortoiliac axis. Colorectal Dis. 2020;22:818–23.

Giulia Vitiello[a,*], Begoña Soto Carricas[b], M. Carmen Martínez Sánchez[a], Eduardo Targarona Soler[a]

[a]*Servicio de Cirugía General y Digestiva, Hospital de la Santa Creu i Sant Pau, Barcelona, Spain*
[b]*Servicio de Angiología y Cirugía Vascular, Hospital de la Santa Creu i Sant Pau, Barcelona, Spain*

*Corresponding author: giuliavit4@gmail.com (G. Vitiello).

https://doi.org/10.1016/j.cireng.2022.02.006


# Sigmoid colon adenocarcinoma local relapse on abdominal wall. Oncological resection and complex abdominal wall reconstruction☆

## Recidiva local de adenocarcinoma de sigma sobre pared abdominal. Resección oncológica y reconstrucción de pared compleja

Abdominal wall involvement in colon cancer is a surgical challenge requiring extensive *en bloc* resection of all elements affected by the tumor. It is a rare complication of these tumors that requires proper planning and multidisciplinary assessment.

We present the case of a 76-year-old male with a history of stenosing sigmoid adenocarcinoma who presented an abdominal wall fistula on imaging tests (T4). An endoluminal stent was inserted as a bridge to surgery in order to facilitate the possibility of anastomosis. Subsequently, complete cytoreduction was performed with complete peritonectomy of the left iliac fossa and flank, dissection of the left gonadal vessels and vas deferens due to tumor involvement, appendectomy, cholecystectomy and complete omentectomy, as well as mitomycin C-based HIPEC as part of a trial for advanced colon tumors[1].

☆ Please cite this article as: Gil-Catalán A, Segura-Sampedro JJ, Jerí-McFarlane S, Estrada-Cuxart J, Morales-Soriano R. Recidiva local de adenocarcinoma de sigma sobre pared abdominal. Resección oncológica y reconstrucción de pared compleja. Cir Esp. 2022. https://doi.org/10.1016/j.ciresp.2020.11.019