

# MANAGEMENT OF EARLY COLORECTAL CANCER

## Pocket summary

1. Preoperative assessments

2. Preparation for surgery

3. Elective surgery: Colon cancer

4. Elective surgery: Rectal cancer

5. Emergency surgery: Bowel obstruction

6. Adjuvant therapy

7. Information provision

8. Follow-up

Guideline available from:  
[www.nzgg.org.nz](http://www.nzgg.org.nz)

Also available:

- downloadable version of this resource
- presenter slide sets
- other related resources.

## Purpose

This resource is intended as a quick clinical reference to selected *Management of Early Colorectal Cancer* guideline content, primarily recommendations. For details of recommendation grading see the guideline.

## Acknowledgements

The New Zealand Guidelines Group would like to thank members of the advisory group who provided input during the development of this resource.

# Preoperative assessments

## Colon cancer

- ✓ Clinical examination
- ✓ Complete blood count
- ✓ Liver function tests
- ✓ Renal function tests
- ✓ CEA
- ✓ Chest x-ray
- ✓ Contrast-enhanced CT of abdomen/pelvis/liver

\* If complete colonoscopy examination not possible then CT colonography.  
If CT colonography not available, then barium enema.

PET-scanning **not** recommended as routine assessment for non-metastatic colon cancer.

- ✓ Colonoscopy of the entire large bowel\*
- ✓ Microsatellite instability/immunohistochemistry (selected cases only)

## Rectal cancer

- ✓ Clinical examination
- ✓ Complete blood count
- ✓ Liver function tests
- ✓ Renal function tests
- ✓ CEA
- ✓ Chest x-ray
- ✓ Contrast-enhanced CT of abdomen/pelvis/liver
- ✓ MRI of pelvis\* – to identify if CRM involvement and for local staging

\* For T1 rectal cancers, endorectal ultrasound (EUS) may be used for local staging as an alternative to MRI of pelvis.

EUS should **not** be used as sole assessment to predict CRM involvement in people with rectal cancer.

CRM circumferential resection margin

# Preparation for surgery

## Possible postoperative stoma

- All patients who have a reasonable chance of a stoma should be prepared for this possibility. This should include a visit, where possible, from a stomal therapy nurse.

## Indications for bowel preparation

- Mechanical bowel preparation is **not** routinely indicated prior to elective colorectal surgery. Exceptions are where faecal loading may create technical difficulties with the procedure eg. laparoscopic surgery, low rectal cancers.

## Thromboembolic prophylaxis

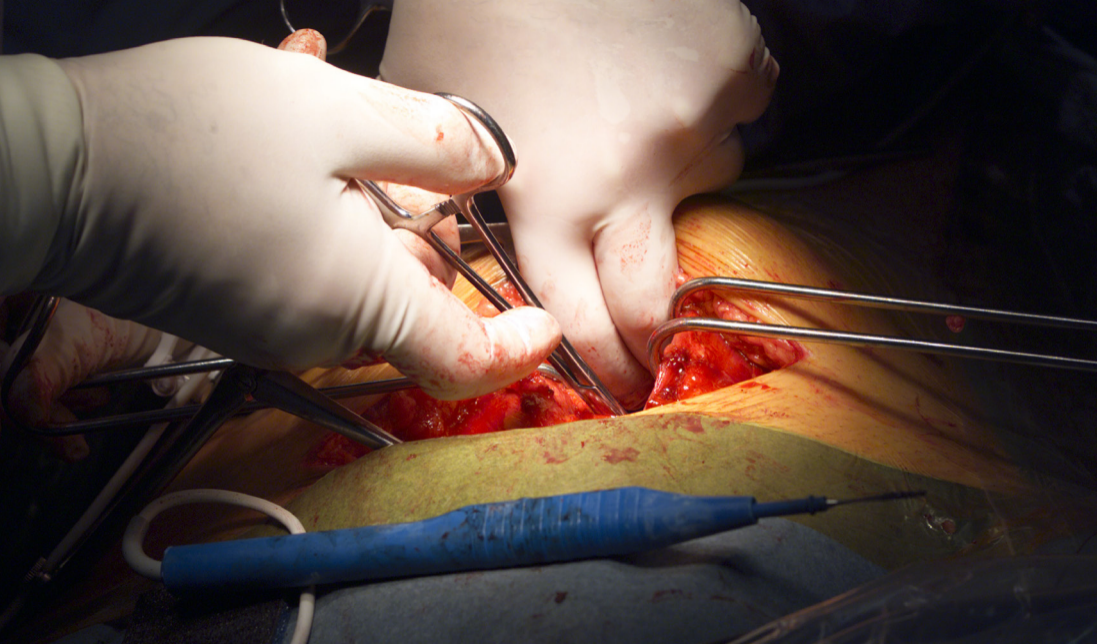
- All patients undergoing colorectal surgery should receive prophylaxis.
- Appropriate prophylaxis is TED stocking and unfractionated heparin **or** low molecular weight heparin **and** intermittent calf compression.

## Body temperature

- Normal body temperature should be maintained.
- This is best achieved by using heated air blankets and fluid warming.

## Prophylactic antibiotics

- All patients undergoing colorectal surgery should receive prophylactic antibiotics.
- A single preoperative IV dose of cephalosporin and metronidazole **or** gentamicin and metronidazole is effective.



# Elective surgery: Colon cancer

Elective surgery for colon cancer should be performed by a surgeon with specific training and experience in colorectal surgery and with sufficient caseload to maintain surgical skills.

## Laparoscopic surgery

- In experienced hands, laparoscopic surgery for colon cancer has equivalent outcomes to conventional surgery.

## Resection

- Segmental resection is equivalent to extended resection in outcome.
- Resection where feasible should extend to the origin of segmental vessels.

## Anastomosis

- Stapled functional end-to-end ileocolic anastomosis is recommended for right hemicolectomies.

## Surgical techniques: Other evidence

- High ligation of the lymphovascular pedicle does not confer any oncological benefit.
- The no-touch isolation technique has no oncological benefit.
- Omental wrapping of the anastomosis has no benefit.

# Elective surgery: Rectal cancer

Elective surgery for rectal cancer should be carried out by a surgeon who has undergone a period of specialist exposure to this form of surgery during surgical training and who has maintained satisfactory experience in the surgical management of rectal cancer.

## Local excision

- Local excision of T1 rectal cancer may be used in selected patients according to the following guidance:
  - mobile tumour <3 cm in diameter
  - T1 on endorectal ultrasound
  - not poorly differentiated on histology (biopsy).

## Adequate distal clearance of resection

- A distal distance of 2 cm (fresh) is recommended in most instances, or 1 cm fixed.

## Sphincter preservation

- Sphincter-saving operations are preferred to abdominoperineal resection **except** in the presence of:
  - tumours where adequate distal clearance ( $>2$  cm) cannot be achieved
  - sphincter mechanism not adequate for continence
  - access to pelvis makes restoration technically impossible (rare).

## Total mesorectal excision

- For mid-to-low rectal tumours, the principles of extra fascial dissection and total mesorectal excision are recommended.

## Colonic reservoir

- Where technically feasible, the colonic reservoir is recommended for anastomosis within 2 cm from the ano-rectal junction.

## Pelvic drainage after resection

- Routine drainage should only be considered for rectal cancers.

# Emergency surgery: Bowel obstruction

Primary resection of obstructing carcinoma is recommended unless the patient is moribund.

## Primary anastomosis

- Should be considered as a colectomy, with an ileocolic or ileorectal anastomosis.
- Could be considered for left-sided obstruction and may need to be preceded by on-table colonic lavage.

## Colonic stenting

- Colonic stenting for palliation of left-sided bowel obstruction is recommended if endoscopic expertise can be readily accessed.
- Colonic stenting as a bridge to surgery for left-sided bowel obstruction may be considered for an individual, if endoscopic expertise can be readily accessed.



# Adjuvant therapy

## Colon cancer

People with resected colon cancer should be considered for adjuvant therapy.

- People with resected node positive colon cancer (Stage III) should be offered postoperative chemotherapy unless there is a particular contraindication, such as significant comorbidity or poor performance status.
- People with resected node negative colon cancer (Stage II) may be offered postoperative chemotherapy. Discussion of risk and benefits of treatment should include the potential but uncertain benefits of treatment and the potential side effects.

For details of recommended regimens see the guideline at:  
**[www.nzgg.org.nz](http://www.nzgg.org.nz)**

## Rectal cancer

Preoperative or postoperative adjuvant therapy should be considered by a multidisciplinary team for all people with rectal cancer.

Preoperative radiotherapy may lower the incidence of late morbidity compared to postoperative radiotherapy.

For details of recommended regimens see the guideline at:

**[www.nzgg.org.nz](http://www.nzgg.org.nz)**

# Communication and information provision

People with colorectal cancer should be acknowledged as key partners in the decision-making about their cancer management.

- ✓ Encourage note taking and recording of consultations.
- ✓ Have a support person present in consultations.
- ✓ Maintain a patient hand-held record where available.

Practitioners should provide information about:

- ✓ diagnosis
- ✓ treatment options (including risks and benefits)
- ✓ support services
- ✓ managing bowel function, particularly diet, after surgery.

Outcomes of Tumour Board and multidisciplinary team meetings should be communicated to the individual and their GP.



# Follow-up

## Overview

Follow-up should be under the direction of the multidisciplinary team and may involve follow-up in primary care.

People with colorectal cancer should be given written information outlining planned follow-up (eg. discharge report) at discharge from treatment including what they should expect regarding the components and timing of follow-up assessments.

Use of faecal occult blood testing as part of colorectal cancer follow-up is **not** recommended.

## Follow-up: When to review

**All** people who have undergone colorectal cancer resection

- Should undergo clinical assessment if they develop relevant symptoms.
- Should receive intensive follow-up.

People with **colon cancer**

- High risk of recurrence (Stages IIb and III): clinical assessment at least every 6 months for first 3 years after initial surgery, then annually for 2 further years.
- Lower risk of recurrence (Stages I and IIa) or comorbidities restricting future surgery: annual review for 5 years after initial surgery.

People with **rectal cancer**

- Review at 3 months, 6 months, 1 year and 2 years after initial surgery, then annually for a further 3 years.

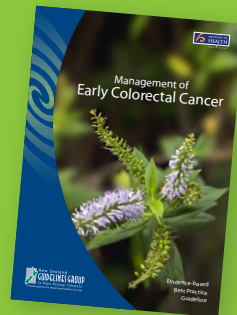
## Follow-up: Specific components

People with colon cancer Stages I to III	People with rectal cancer Stages I to III
<p data-bbox="135 273 760 363">Colonoscopy before surgery or within 12 months following initial surgery.</p> <p data-bbox="135 401 586 439"><b>Follow-up should include:</b></p> <ul data-bbox="135 459 708 664" style="list-style-type: none"><li data-bbox="135 459 708 497">• physical examination and CEA</li><li data-bbox="135 518 708 607">• liver imaging at least once between years 1 and 3</li><li data-bbox="135 627 708 664">• colonoscopy every 3 to 5 years.</li></ul>	<p data-bbox="881 273 1506 363">Colonoscopy before surgery or within 12 months following initial surgery.</p> <p data-bbox="881 401 1333 439"><b>Follow-up should include:</b></p> <ul data-bbox="881 459 1454 912" style="list-style-type: none"><li data-bbox="881 459 1454 497">• physical examination and CEA</li><li data-bbox="881 518 1454 607">• liver imaging at least once between years 1 and 3</li><li data-bbox="881 627 1454 809">• digital rectal examination <b>and</b> sigmoidoscopy at 3 months, 6 months, 1 year and 2 years after initial surgery</li><li data-bbox="881 829 1454 912">• colonoscopy thereafter at 3 to 5-yearly intervals.</li></ul>



## FREE DOWNLOAD

The guideline and other resources  
are available free online at  
[www.nzgg.org.nz](http://www.nzgg.org.nz)



The information in this summary is derived from the evidence-based guideline  
*Management of early colorectal cancer (2011)*, published by the New Zealand Guidelines Group.

ISBN: 978-1-877509-42-1

HP: 5331

© 2011 Ministry of Health