Guidance on managing gastro-intestinal consequences of colorectal cancer and its treatments

1. Background

The number of people living with and beyond cancer continues to increase on a yearly basis in the UK and as a result, many more people experience consequences of their cancer and its treatment. Gastrointestinal (GI) consequences are common in patients who have received treatment for colorectal cancers. These GI consequences may include chronic diarrhoea, faecal incontinence, urgency, pain, bleeding and excessive flatulence, particularly following pelvic radiotherapy, chemotherapy and surgery.

GI consequences may be experienced during treatment, immediately post-treatment, or many years later and have a negative impact on people's quality of life. Chronic physical problems with consequent impairment in quality of life are reported in approximately 25% of people following radical treatment of pelvic cancers (1, 2). 19% of people who were between 1 & 5 years post treatment for colorectal cancer, reported difficulty controlling their bowels (3). Individuals experiencing any difficulty controlling their bowels were more than twice as likely to report lower quality of life scores (3). Chronic GI symptoms have been estimated to affect up to 66% of those who have been treated with pelvic radiotherapy for colorectal cancers (4). Less than 20% of patients experiencing GI symptoms following pelvic radiation are referred to a gastrointestinal specialist for evaluation and management (5).

The National Cancer Survivorship Initiative identified four key needs of cancer survivors:

- a personalised 'survivorship' care plan formulated for each patient on completion of treatment
- support to self-manage their condition if appropriate
- provision of information on long-term effects of living with and beyond cancer
- access to specialist medical care for complications that occur after cancer

The Manchester Cancer Colorectal CNS group and Pathway Board recognised that the management options and referral pathways for those experiencing GI consequences following colorectal cancer treatment needed to be specified and made easily accessible to support timely referral for necessary investigations and interventions. Furthermore, identification and information for those people experiencing GI late effects needed to be improved. Other late effects may occur and this has been acknowledged within sections 2 and 3, however this guidance is primarily focused on GI consequences and implementing the National Guidance already available.

National Picture and Evidence base

The evidence base and systematic approach to the management of acute and chronic gastrointestinal problems arising as a result of treatment for cancer has been addressed by BSG guidelines (4). Since then, much work has been done nationally to support implementation of "Guidance: The Practical Management of the Gastrointestinal Symptoms of Pelvic Radiation Disease", and defines "best practice" for the 22 most commonly seen GI symptoms following pelvic radiation (6).

In 2015, Macmillan Cancer Support published a document entitled "Managing lower gastrointestinal problems after cancer treatment. A quick guide for health professionals" (7). It lays out a clear pathway for investigation, management and when to consider, or make, onward referral to relevant specialists. The steps can be initiated in primary or secondary care as appropriate.

2. Manchester Cancer Colorectal Pathway Board GI Consequences Working Group Recommendations

A working group consisting of the Manchester Cancer CNS group, Pathway Clinical Director, Patient representatives, interested Gastroenterologists and other specialists in this area reviewed the existing guidelines and made recommendations about optimising local clinical pathways for gastrointestinal cconsequences.

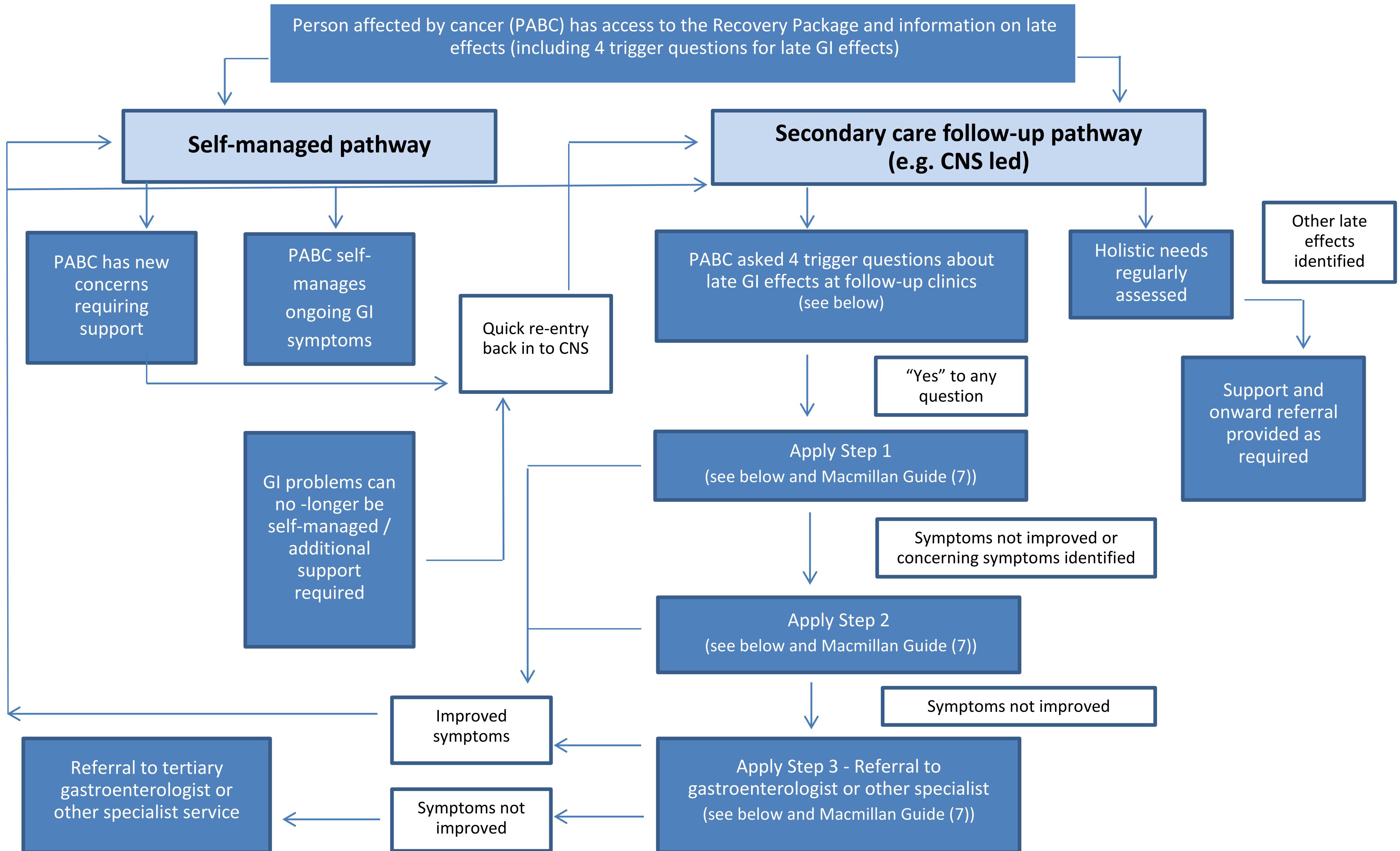
This was reviewed, discussed and agreed to by the Manchester Cancer Colorectal Pathway Board on 13 September 2016.

Manchester Cancer Colorectal Pathway Board recommends that the 2 national practical guidance documents (6, 7) be adopted as standard practice within the follow-up pathway for colorectal cancer patients, within Manchester Cancer.

The following pathway and recommendations for identifying and managing people with late effects (Section 3) provide an outline for doing this and should be used in conjunction with the Macmillan guide for Health professionals in the first instance (7).

Manchester Cancer
Colorectal Pathway Board

Pathway for the management of late effects in colorectal cancer follow-up



3. Identifying and managing patients with late GI consequences

As part of the recovery package, all people affected by cancer should be offered a Holistic Needs Assessment (HNA) and personalised cancer care plan, a treatment summary and be provided with information and advice on late effects (including GI consequences), and where appropriate access to an education event (Health and Wellbeing clinic) where further details will be provided. The HNA should be used to identify if a patient has unmet needs and/or late effects, which may include, but are not limited to: GI issues, sexual issues, fatigue, psychological issues, urological issues, endocrine, lymphoedema. The care plan should detail how these will be addressed and highlight if onward referral is required.

In order to further identify people with GI consequences of colorectal cancer treatments, the following 4 trigger questions about GI late effects will be asked at each CNS follow-up contact. If appropriate, the trigger questions should be included for patient and GP information on the Treatment Summary.

Note: If the patient is currently undergoing cancer treatment refer to the treating centre to exclude recurrent or new disease.

Acute GI symptoms due to infection, perforation, haemorrhage or bowel obstruction are emergencies and require immediate action. This is outside the scope of this document.

The guidance documents emphasise the importance of history taking and precise details of symptoms; these trigger questions from part of the history.

Ask the following four trigger questions:

1. Are you woken up at night to have a bowel movement?
2. Do you need to rush to the toilet to have a bowel movement?
3. Do you ever have bowel leakage, soiling or a loss of control over your bowels?
4. Do you have any bowel symptoms preventing you from living a full life?

If a person answers **"yes"** to any of the questions proceed through the following three-tier level of intervention (in consultation with the 2 practical guidance documents (6, 7)).

Management of late GI consequences:

Step one

- Provide basic assessment, advice and treatment, including drug history, bowel and/or food diary, general advice on diet and physical activity, provision of information

leaflets to encourage self-management, bowel training and pelvic floor training advice (8).

- Undertake detailed assessment. Possible responses include adjustment of dietary fibre intake, use of liquid loperamide (e.g. in cases of chronic diarrhoea after all reasonable measures have been taken to address the underlying cause) or a trial of a stool bulking agent.
- In the presence of concerning symptoms proceed directly to step two.
- If any rectal bleeding is present go immediately to step 2. It should always be investigated.

Step two

- If there is no improvement after trialing the advice and basic interventions in step one (trial for approximately 3 months), or in the presence of concerning symptoms, begin diagnostic investigations as indicated in the national guidance for specific symptoms (rectal bleeding, faecal incontinence including leakage and urgency(without diarrhoea), diarrhoea, constipation, abdominal pain, painful bowel movements

- Escalate treatment and consider onward referral to appropriate experts, as indicated by results of tests.

- If unable to offer tests as detailed above and in national guidance then consider direct referral to gastroenterologist or other appropriate expert(s) (step three).

Step three

- If still no improvement with initiation of treatments from step two, or concerning symptoms, refer to gastroenterologist or other specialist departments.

- Include the following in the referral:

  - Previous tumour type/location
  - Oncology treatment (type, duration and date when ended)
  - Copy of most recent Treatment Summary
  - Details of GI symptoms leading to referral
  - Previous treatments trialled
  - Reports and results for interventions and tests carried out as part of Step one and Step two

4. GI consequences of colorectal cancer treatment services within Manchester Cancer

Gastroenterologists across Manchester Cancer have been identified who have an interest in late effects and applying "the bowel algorithm" (6). A list of these gastroenterologists and their referral details are provided in Table 1. Details of other specialists supporting the management of late GI effects of colorectal cancer treatments and offering a tertiary referral service are detailed in Table 2.

Table 1: Details of local gastroenterologists for referral onto regarding late GI effects of colorectal cancer and its treatments

Consultant Gastroenterologist and Trust	Referral Details
Dr Richard Hammonds Richard.Hammonds@cmft.nhs.uk Central Manchester	Manchester Centre for Gastroenterology and Hepatology, Manchester Royal Infirmary, Oxford Road, Manchester, M13 9WL Tel:0161 276 5423 Fax: 0161 276 8779 PA: Lorraine Jenkins
Dr Caroline Henson Caroline.Henson@uhsm.nhs.uk University Hospitals of South Manchester	Department of Gastroenterology, University Hospital South Manchester NHS Foundation Trust, Southmoor Road, Manchester, M23 9LT **(email referrals via post or fax)** Fax: 0161 291 2635
Dr Wisam Jafar Wisam.Jafar@stockport.nhs.uk Stockport	Gastroenterology Department, 33 Cedar House, Stepping Hill Hospital, Poplar Grove, Hazel Grove, Stockport, SK2 7JE Tel: 0161 419 5641 Fax: 0161 419 5944 PA:Kerry.Hardy@stockport.nhs.uk **(email referrals to Kerry Hardy or send via fax)**
Dr Jimmy K. Limdi Jimmy.Limdi@nhs.net Pennine Acute Hospitals	Room 241, Fairfield House, Fairfield General Hospital, Rochdale Old Road, Bury, BL9 7TD (**post is the preferred method for receiving referral letters)** Tel: 0161 778 2642 PA: Lisa.nightingale@pat.nhs.uk

Consultant Gastroenterologist and Trust	**Referral Details**
Dr George Lipscomb George.lipscomb@boltonft.nhs.uk Bolton	Royal Bolton NHS Foundation Trust, Minerva Road Bolton, Lancs BL4 0JR (**post is the preferred method for receiving referral letters)** Tel: 01204 390173 Fax: 01204 390151 PA: Jackie.kellett@boltonft.nhs
Professor John McLaughlin John.McLaughlin@srft.nhs.uk Salford	Department of Gastroenterology, Level 2 Brooke Building, Salford Royal NHS Foundation Trust, Stott Lane, Salford, M6 8HD Tel: 0161 206 5147 PA:Kath.rayson@srft.nhs.uk **(email referrals to Kath Rayson)**
Dr Ramasamy Saravanan Ramasamy.saravanan@nhs.net East Cheshire Hospitals	Gastroenterology Department, Macclesfield District General Hospital, Victoria Road, Macclesfield, Cheshire, SK10 3BL Tel:01625 661902 Fax: 01625 661904
Dr Kevin Yoong Kevin.Yoong@mcht.nhs.uk Mid Cheshire Hospitals	Gastroenterology Department, Leighton Hospital, Middlewich Road, Crewe, Cheshire, CW1 4QJ Tel: 01270 612460 Fax: 01270 612335 **(fax is preferred method for receiving referral letters)** PA:Margaret.Taylor@mcht.nhs.uk

Table 2: Details of tertiary services for referral onto regarding late GI effects of colorectal cancer and its treatments

Consultant and Specialist Service	**Referral Details**
Dr Caroline Henson Caroline.Henson@uhsm.nhs.uk Specialist gastroenterologist offering a tertiary service for referrals from CNS', gastroenetrologists, and any other members of the colorectal team	Department of Gastroenterology, University Hospital South Manchester NHS Foundation Trust, Southmoor Road, Manchester, M23 9LT **(post or fax is preferred method for receiving referral letters)** Fax: 0161 291 2635
Mr Finlay Curran A local and tertiary service for all pelvic floor related referrals	Manchester Royal Infirmary Oxford Road Manchester M13 9WL Tel: 0161 2764170 PA: Rachael McKay
Mr Sajal Rai Consultant Colorectal and Laparoscopic Surgeon A local and tertiary service for all pelvic floor related referrals	Stepping Hill Hospital, Stockport, SK2 7JE Email: Sajal.Rai@stockport.nhs.uk **(email to consultant is preferred method for receiving referrals, follow-up via telephone if required)** Tel: 0161 419 4267 PA: Susan.cummings@stockport.nhs.uk
Miss Karen Telford A local and tertiary service for all pelvic floor related referrals	University Hospital of South Manchester NHS Foundation Trust, Southmoor Road, Wythenshawe, Manchester, M23 9LT (**post or fax is preferred method for receiving referral letters)** Tel: 0161 291 6654 Fax: 0161 291 6658 PA: Julie.Adger@UHSM.nhs.uk

5. Acknowledgements

WE ARE MACMILLAN. CANCER SUPPORT

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6. References

1. **Gelber R, Goldhirsch A, Cole B, et al.** A quality-adjusted time without symptoms or toxicity (Q-TWiST) analysis of adjuvant radiation therapy and chemotherapy for resectable rectal cancer. J Natl Cancer Inst 1996;88:1039e45.

2. **Andreyev HJ.** Gastrointestinal problems following pelvic radiotherapy: the past, the present and the future. Clin Oncol (R Coll Radiol) 2007;19:790e9.

3. **Glaser AW, Fraser LK, Corner J, et al.** Patient-reported outcomes of cancer survivors in England 1–5 years after diagnosis: a cross-sectional survey. BMJ Open 2013;3:e002317.

4. **Andreyev HJN, Davidson SE, Gillespie C, et al.** Practice guidance on the management of acute and chronic gastrointestinal problems arising as a result of treatment for cancer. Gut (2012) Feb;61(2):179-92. doi: 10.1136/gutjnl-2011-300563. Epub 2011 Nov 4 http://gut.bmj.com/content/early/2011/11/04/gutjnl-2011-300563.full.pdf+html

5. **Andreyev HJ, Amin Z, Blake P, et al.** GI symptoms developing after pelvic radiotherapy require gastroenterological review but is that happening in the UK? (Abstract) Clin Oncol 2003;15:S12.

6. **Macmillan Cancer Support.** Guidance: The practical management of the gastrointestinal symptoms of pelvic radiation disease: http://www.macmillan.org.uk/Documents/AboutUs/Health_professionals/P215TRMGIBooklet_AW.pdf

7. **Macmillan Cancer Support.** Quick guide for Health Professionals – Managing Lower Gastrointestinal problems after cancer treatment : http://be.macmillan.org.uk/Downloads/CancerInformation/ResourcesForHSCP/COT/MAC15384GIquickguide.pdf

8. **Macmillan Cancer Support.** Quick GI guide – 5 simple ways to manage bowel problems after cancer treatments: http://www.macmillan.org.uk/Documents/AboutUs/Health_professionals/Consequencesoftreatment/GIgui dequicktips.pdf