

CT Colonography activity and Covid-19: British Society of Gastrointestinal and Abdominal Radiology guidance

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UPDATE

As the current Covid-19 pandemic evolves, we are updating guidance with regard to investigation of suspected colorectal cancer. NHS England have issued guidance on the organisation of radiological services during the pandemic which includes setting up standard operating procedures for all classes of patients, including urgent outpatient groups (<https://www.england.nhs.uk/coronavirus/wp-content/uploads/sites/52/2020/03/specialty-guide-radiology-and-coronavirus-v1-20-march-2020.pdf>).

Whilst many hospitals have seen a significant reduction in two-week referral activity, such deferral is creating a rapidly growing backlog.

Current guidance documents by the British Society of Gastroenterology (BSG), Joint Advisory Group on GI endoscopy (JAG), British Society of Gastrointestinal and Abdominal Radiology and the Association of Coloproctology of Great Britain and Ireland (ACPGBI), recommend careful triage of urgent lower GI cancer referrals to prioritise those requiring urgent investigation and recommend cessation of non-essential endoscopy (<https://www.bsg.org.uk/covid-19-advice/endoscopy-activity-and-covid-19-bsg-and-jag-guidance/>) (<https://www.acpgbi.org.uk/news/joint-acpgbi-bsg-and-bsgar-considerations-for-adapting-the-rapid-access-colorectal-cancer-pathway-during-covid-19-pandemic/>).

Standard CT abdomen and pelvis has been prioritised over CT colonography (CTC), the rationale for which is detailed in our previous guidance (<https://www.bsgar.org/society/covid-19-and-bsgar-updates-1/covid-19-and-bsgar-update-archive/>).

Whilst the principles of the prior guidance still hold, it is clear careful planning is required to pre-empt an insurmountable backlog in suspected lower GI cancer referrals from building up.

The greater sensitivity of CT colonography than unprepared CT for colorectal cancer is well established (approximately 95% vs 75-80%), and under current guidance, deferred luminal investigation is recommended in the case of a negative standard CT in such patients.

Current guidance also states **that a reduced CTC service may continue with local stakeholder agreement**; even so, it is clear CTC activity has reduced considerably in the NHS.

The impact of the current pandemic on radiological capacity will differ between hospitals but it is apparent that CT capacity does exist in many (both scanner and staffing). This has been bolstered by commissioning of additional capacity from the private sector. In recent days, several sectors have started re-introducing a reduced CTC service for patients at high risk of colorectal cancer based on careful clinical triage, usually including FIT testing and symptom review.

Given the superiority of CTC over standard CT for detecting colorectal neoplasia and the need to address the backlog of referral activity, it is therefore recommended radiological services thoroughly review their current capacity, aiming to re-introduce a reduced CTC service if this is deemed practicable and safe. Such a review should include:

- **Full dialogue with all relevant specialties** including primary care providers, infectious diseases, radiologists, gastroenterologists, endoscopists and lower GI surgeons. In particular full consideration of CTC capacity must be made so as not to overwhelm the service
- **Clinical triage of patient colorectal cancer risk.** The low prevalence of colorectal cancer in the 2 week wait pathway and risks of Covid-19 in older age groups and those with co-morbidity is described in our previous guidance (<https://www.bsgar.org/society/covid-19-and-bsgar-updates-1/covid-19-and-bsgar-update-archive/>). The risks of Covid-19 transmission must be considered in all clinical decision-making regarding CTC, and agreed clinical triaging of cancer risk must be in place. In many cases this will include consideration of FIT levels, when available. It is anticipated that only those at high risk of underlying colorectal cancer should currently be considered for CTC.
- **Review of CT service capacity** (both scanner and staffing), including current access to private sector facilities. Although it may not be practicable, consideration should be given to designating a “clean scanner” for patients without known or suspected Covid-19, particularly in a non-acute hospital facility. Such an approach may have the additional benefit of increasing attendance of patients who are understandably reluctant to attend acute hospitals at the current time.
- **Set up of radiological reporting pathways.** It is likely that many regions will centralise their CTC service at designated sites, including accessing the additional capacity from the private sector. Radiological reporting pathways must be carefully considered to ensure sufficient reporting capacity is available with robust mechanisms in place for timely availability of reports to referring teams, including critical result notification. BSGAR recommends a minimum average reporting time of 20 minutes per CTC report (<https://www.bsgar.org/education/ct-colonography/ctc-guidancestandards/>). Use of the Image Exchange Portal or alternative mechanisms for secure image transfer should be considered.
- **Agreed personal protective equipment (PPE) protocols.** Covid-19 RNA is excreted in faeces at the time of infection and may persist for at least 2 weeks after respiratory samples become negative. CT colonography should not be performed in known or suspected Covid-19 patients, nor in those recently (within 21 days) recovered from the infection. Currently all endoscopic procedures are considered aerosol-generating procedures (AGP). It is unknown if CTC is an AGP, but any risk is likely substantially reduced compared to that of lower GI endoscopy. Venting of CO2 from automated insufflators is potentially aerosol-generating, but most automated insufflators include anti-bacterial and anti-viral filters, with some manufactures claiming viral protection of > 99.99%. Manufacturer supplied filter properties of two commonly used insufflation devices is given <https://www.bsgar.org/society/covid-19-and-bsgar-updates-1/covid-19-reference-docs/> . Users of other insufflation devices should consider contacting the manufacturers to detail the anti-viral properties of filters in their equipment, which can be disseminated amongst the radiological community. PPE requirements should be discussed with the local infectious disease / virology service, but many radiological departments performing CTC s are implementing mask protection for patients, and droplet PPE protection (including eye protection) for staff performing the CTC procedure (https://assets.publishing.service.gov.uk/government/uploads/system/uploads/attachment_data/file/879107/T1_poster_Recommended_PPE_for_healthcare_workers_by_secondary_care_clinical_context.pdf). Given the need for PPE and scanner cleaning, it is likely each CTC examination will take longer than usual to perform which should be considered when planning bookings.