

Virtual Colonoscopy

CT Colonography

Date of Origin: 02/2003 Last Review Date: 02/28/2024 Effective Date: 03/01/2024

Dates Reviewed: 05/2004, 04/2005, 03/2006, 03/2007, 12/2007, 01/2009, 02/2012, 02/2013, 02/2015,

02/2016, 03/2017, 02/2019, 02/2020, 02/2021, 02/2022, 02/2024

Developed By: Medical Necessity Criteria Committee

I. Description

Virtual colonoscopy, also known as computed tomographic (CT) colonography, is a non-invasive imaging technique of the colon. Multiple CT scans are taken of the patient's colon. The images are reconstructed with a computer to create a three-dimensional picture of the colon. Both virtual colonoscopy and conventional colonoscopy require a full bowel prep, however, virtual colonoscopy does not require sedation. Excellent bowel cleansing and bowel distention through insufflation of either atmospheric air or carbon dioxide via a small rectal tube are essential to completely evaluate the entire surface of the colon during a virtual colonoscopy. A drawback of virtual colonoscopy is that polyp removal and tissue biopsies in the colon must be performed using conventional colonoscopy.

II. Criteria: CWQI HCS-0152

- A. Moda Health will cover virtual colonoscopy to plan limitations for 1 or more of the following indications:
 - a. Conventional colonoscopy cannot be performed due to a known colonic lesion, obstructive tumor, spasm, or other structural abnormality; **or**
 - b. Patient is receiving chronic anticoagulation that cannot be interrupted; or
 - c. Patient has a contraindication to conventional colonoscopy; or
 - d. Patient has diverticulitis with increased risk of perforation; or
 - e. Patient has an increased risk with sedation (i.e. COPD or previous adverse reaction to anesthesia); **or**
 - f. Patient with complications from prior conventional colonoscopy
- B. Moda Health will cover virtual colonoscopy as an alternative to either conventional (optical) colonoscopy or double contrast barium enema for colorectal cancer screening, in individuals beginning at 45 years of age and at a frequency of every 5 years.
- C. Moda Health considers virtual colonoscopy experimental and investigational for the management of inflammatory bowel disease because its value for this indication has not been established.

III. Information Submitted with the Prior Authorization Request:

1. Provider chart notes with documentation of indications for virtual colonoscopy

IV. Applicable CPT or HCPC codes covered:

Codes	Description
74261	Computed tomographic (CT) colonography, diagnostic, including image postprocessing; without contrast material
74262	Computed tomographic (CT) colonography, diagnostic, including image post processing; with contrast material(s) including non-contrast images, if performed
74263	Computed tomographic (CT) colonography, screening, including image postprocessing

V. Annual Review History

Review Date	Revisions	Effective Date
02/2013	Annual Review: Added table with review date, revisions, and effective	03/1/2013
	date. Added CPT codes	
02/2014	Annual Review: No change	02/25/2014
02/2015	Annual Review: No change	02/25/2015
02/2016	Annual Review: Added Medicare coverage	02/24/2016
03/2017	Annual Review: Removed LCD reference, added indication	03/22/2017
02/2019	Annual Review: Removed reference to Medicare coverage	03/01/2019
02/2020	Annual Review: No content change	03/01/2020
02/2021	Annual Review: No change	03/01/2021
02/2022	Annual Review: No changes	03/01/2022
02/2024	Annual Review: updated the age requirement for colonoscopy from 50	03/01/2024
	to 45years of age. Coverage benefits are set at 45yo	

VI. References

- 1. Angtuaco TL, Banaad-Omiotek GD, Howden CW. Differing attitudes toward virtual and conventional colonoscopy for colorectal cancer screening: surveys among primary care physicians and potential patients. Am J Gastroenterol. 2001 Mar;96(3):887-93.
- Centers for Medicare & Medicaid Services (CMS). Decision memo for screening computed tomography colonography (CTC) for colorectal cancer (CAG-00396N). Medicare Coverage Database. Baltimore, MD: CMS; May 12, 2009. Accessed on March 13, 2017 at: https://www.cms.hhs.gov/mcd/viewdecisionmemo.asp?id=220.
- 3. Colorectal Cancer. American Cancer Society. 2002.
- 4. Cotton P, Durkalski V, Pineau B, et al. Computed tomography colonography (virtual colonoscopy) a multicenter comparison with standard colonoscopy for detection of colorectal neoplasia. JAMA. April 14, 2004;267(14):1713-1719.

- 5. Ho C, Heitman S, Membe SK, et al. Computed tomography colonography for colorectal cancer screening in an average risk screening population; Systematic review and economic evaluation. Technology Report No. 114. Ottawa, ON: Canadian Agency for Drugs and Technologies in Health (CADTH); December 2008. Accessed on February 4, 2020, https://www.cadth.ca/computed-tomographic-colonography-colorectal-cancer-screening-average-risk-screening-population-0
- 6. Hur C, Chung DC, Schoen RE, Gazelle GS. The management of small polyps found by virtual colonoscopy: results of a decision analysis. Clin Gastroenterol Hepatol. 2007 Feb;5(2):237-44
- 7. Nicholson FB, Barro JL, Bartram CI, et al. The role of CT colonography in colorectal cancer screening. Am J Gastroenterol. 2005 Oct;100(10):2315-23.
- 8. Pickhardt P, Choi R, Hwang I, et al. Computed tomographic virtual colonoscopy to screen for colorectal neoplasia in asymptomatic adults. JAMA. Dec 4, 2003;349(23):2191-2200.
- 9. Thornton E, Morrin MM, Yee J. Current status of MR colonography. Radiographics. 2010;30(1):201-218.
- 10. Van Dam J, Cotton P, Johnson CD, et al. AGA future trends report: CT-Colonography. Gastroenterology. 2004;127(3):970-984.
- 11. Walsh J. Computed tomographic colonography (virtual colonoscopy) for colorectal cancer screening in average risk individuals. Technology Assessment. San Francisco, CA: California Technology Assessment Forum (CTAF); March 11, 2009. Accessed on February 22, 2011 at: http://ctaf.org/content/assessment/detail/989. Accessed July 31, 2009.
- 12. White TJ, Avery GR, Kennan N, et al. Virtual colonoscopy vs. conventional colonoscopy in patients at high risk of colorectal cancer -- a prospective trial of 150 patients. Colorectal Dis. 2009;11(2):138-145
- 13. Yee J. Virtual colonoscopy (CT and MR colonography). Gastrointestinal Endoscopy. June 2005;55(7)
- Bernard Levin, MD, David A. Lieberman, MD, Beth McFarland, MD, Robert A. Smith, PhD, Durado Brooks, MD, MPH, Kimberly S. Andrews, Chiranjeev Dash, MD, MPH, Francis M. Giardiello, MD, Seth Glick, MD, Theodore R. Levin, MD, Perry Pickhardt, MD, Douglas K. Rex, MD, Alan Thorson, MD, Sidney J. Winawer, MD and the American Cancer Society Colorectal Cancer Advisory Group, the US Multi-Society Task Force, and the American College of Radiology Colon Cancer Committee. Screening and Surveillance for the Early Detection of Colorectal Cancer and Adenomatous Polyps, 2008: A Joint Guideline from the American Cancer Society, the US Multi-Society Task Force on Colorectal Cancer, and the American College of Radiology. CA Cancer J Clin 2008. Accessed through the internet at "caonline.amcancersoc.org", under ACS Guidelines for Cancer Prevention and Early Detection, Accessed March 28, 2012
- 15. U.S. Preventive Services Task Force. Screening for colorectal cancer: U.S. Preventive Services Task Force Recommendation Statement. *Annals of Internal Medicine*, 2008; 149: 627-637
- 16. Physician Advisors