CRC screening uptake no better with use of fecal immunochemical testing in at-risk individuals

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For first-degree relatives of patients with nonsyndromic colorectal cancer (CRC), fecal immunochemical testing (FIT) screening does not improve screening uptake compared with colonoscopy screening, according to a study published online Oct. 24 in *PLOS Medicine*.

Natalia González-López, from the Hospital Universitario de Canarias in Tenerife, Spain, and colleagues examined whether uptake of FIT screening is superior to uptake of colonoscopy screening in a population of FDRs of patients with CRC.

The open-label, parallel-group trial was conducted in 12 centers between February 2016 and December 2021. Eligible participants were FDRs of index cases younger than 60 years or having two or more index cases or a sibling with CRC, regardless of age at diagnosis; 1,760 FDRs of 460 index cases were assessed for inclusion: 870 were assigned to undergo one-time colonoscopy or FIT (431 and 439, respectively).

The researchers found that of those assigned to undergo colonoscopy or FIT, 44.0% attended the appointment and signed informed consent: 34.1 and 35.9% underwent colonoscopy-based screening and FIT-based screening, respectively (odds ratio, 1.08; 95% confidence interval, 0.82 to 1.44; P = 0.564).

Compared with the FIT group, the colonoscopy group had a significantly higher detection rate of advanced colorectal neoplasia (odds ratio, 3.64; 95% confidence interval, 1.55 to 8.53; P = 0.003). Throughout follow-up, there was no change noted in study outcomes.

"In the setting of an opportunistic screening, annual FIT does not increase the screening uptake compared to colonoscopy screening in FDR at high risk of developing CRC, resulting in a significantly lower detection rate of advanced colorectal neoplasia," the authors write.

More information: Natalia González-López et al, Screening uptake of colonoscopy versus fecal immunochemical testing in first-degree relatives of patients with non-syndromic colorectal cancer: A multicenter, open-label, parallel-group, randomized trial (ParCoFit study), *PLOS Medicine* (2023). DOI: 10.1371/journal.pmed.1004298