Colorectal Cancer in Young Adults: Considerations for Oncology Nurses

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The incidence of colorectal cancer (CRC) in the young adult population has increased during the past several decades, which is concerning to healthcare professionals. Awareness of CRC needs to be at the forefront for healthcare professionals, including nurses, because this patient population presents with unique challenges. A specialty center focusing on the care of young adult patients with CRC can meet the needs of this patient population. Oncology nurses can be knowledgeable about this incidence trend and facilitate the delivery of care that is appropriate to meet the needs of young adult patients with CRC.

AT A GLANCE

- CRC is increasing in young adults, who present with unique needs during cancer treatment and into survivorship.
- Young adult patients with CRC need customized management of care.
- Greater awareness of young-onset CRC is needed among nurses because the incidence is expected to continue to rise.

KEYWORDS

young-onset colorectal cancer; adolescent and young adult cancer; risk factors

DIGITAL OBJECT IDENTIFIER 10.1188/24.CJON.10-14 olorectal cancer (CRC) is the third most common cancer and the second leading cause of cancer-related death worldwide (International Agency for Research on Cancer, n.d.). In the United States, the incidence and mortality of CRC has been declining during the past three decades in individuals aged 55 years or older. This decline has been attributed to the adoption of population-based screening in individuals aged 50 years or older, which can identify polyps before they develop into cancer, leading to diagnosis at an earlier stage (Siegel et al., 2022). In addition, novel and improved treatments for CRC have decreased mortality.

However, there is a worrisome trend of young-onset CRC (YO-CRC) in otherwise healthy individuals aged younger than 40 years, with incidence in this age group having increased 2% per year during the past four decades (Siegel et al., 2019). Alarming trends are projected to continue during the next 10 years, with an increase in incidence of colon cancers and a larger prevalence of rectal cancers among individuals aged 20–34 years (Jacobs et al., 2018). This phenomenon is not unique to the United States and has been observed worldwide, particularly in low- and middle-income countries (Siegel et al., 2019).

CRC in Young Adults

The exact etiology, risk factors, and biology of this increase in CRC among younger patients is unknown. Implicated risk factors, such as obesity, dietary habits, and the impact of dysbiosis (i.e., changes in gut health), may play a role (Danial et al., 2022). Researchers are evaluating whether high-fat diets as individuals mature from adolescents to adults are related to the development of CRC (Carroll et al., 2022). In one study, 16% of patients with YO-CRC were found to have a gene variant (Pearlman et al., 2017). Lynch syndrome, a common hereditary CRC syndrome arising from a germline variant that causes dysfunction of the DNA repair mechanism, accounts for as many as 20% of cases in young patients with CRC, as compared to as many as 5% of cases in older patients with CRC (Mork et al., 2015).

It is unclear whether YO-CRC has a unique biology compared to CRC developing at the average age of onset (50 years or older). CRC develops predominantly in the left side of the colon and rectum (Cercek et al., 2021), and patients with YO-CRC are frequently diagnosed with more aggressive disease (Yarden & Newcomer, 2019). Tumor histology is often poorly differentiated and, therefore, is characterized as high grade. As compared to late-onset CRC, disease tumors in YO-CRC are more frequently mucinous. Signet ring