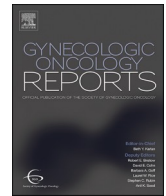


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# Gynecologic Oncology Reports

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## Missed opportunities for young women with endometrial cancer: A call to action

The prevalence of endometrial cancer is increasing and is associated with the obesity epidemic; this increase is most pronounced in premenopausal women (Smrz et al., 2021; Lu and Broaddus, 2020). Further, young non-Hispanic Black and Hispanic women are disproportionately affected by the increase in endometrial cancer (Somasegar et al., 2023). Though the association between obesity, anovulatory bleeding, excess estrogen, and the development of endometrial cancer is well established, Grubman and colleagues additionally identified incomplete workup of abnormal uterine bleeding (AUB) as a risk factor for delayed diagnosis and worse oncologic outcomes for premenopausal women with endometrial cancer (Grubman et al., 2023; Dolly et al., 2016).

The American College of Obstetricians and Gynecologists (ACOG) recommends tissue sampling as a first line test for women over age 45 with AUB due to the increased probability of endometrial cancer (American College of Obstetricians and Gynecologists Committee on Practice Bulletins – Gynecology, 2012). In fact, women with AUB over age 45 in Grubman's study experienced a reduced time to endometrial sampling (Grubman et al., 2023). Because ACOG recommends several other diagnostic steps or the presence of additional risk factors, including obesity, history of polycystic ovarian syndrome (PCOS), persistent AUB, or failure of medical management, prior to tissue sampling for women under age 45, these younger women are especially at risk for delayed diagnosis of endometrial cancer. Historically, postmenopausal bleeding has been the hallmark of endometrial cancer and healthcare providers have relied on the 4 mm endometrial stripe thickness threshold to triage the need for endometrial sampling (Karls-son et al., 1995). Though there is no clearly defined threshold for abnormal endometrial thickness in the premenopausal population, endometrial abnormalities are associated with the diagnosis of endometrial hyperplasia or cancer (Kim et al., 2016). Furthermore, research by Doll and colleagues has demonstrated the reliance on the 4 mm endometrial thickness threshold may contribute to healthcare disparities by delaying endometrial cancer diagnosis for Black women and having a five-fold increased chance of missing a cancer diagnosis based on this threshold (Doll et al., 2021). In Grubman's study, most patients experienced an incomplete workup for AUB, and ultrasound was frequently the only intervention received (Grubman et al., 2023). Clearly, there is a need for earlier and more frequent tissue sampling. Office endometrial biopsies are effective (Dijkhuizen et al., 2000) and cost-effective (Feldman et al., 1993) for diagnosing endometrial cancer. Hysteroscopy and dilation and curettage (D&C) are short procedures and can often diagnose and treat other structural causes of AUB in this population.

Though the etiologies of AUB are vast, and the majority are not

related to malignancy, there is a need for additional public education regarding the association between AUB and uterine malignancy. Many women often associate irregular menses with other gynecologic issues, including endometriosis, fibroids, or PCOS and are unaware that bleeding may be a sign of malignancy. Furthermore, stigma and poor healthcare literacy contribute to barriers accessing care for AUB (Henry et al., 2020). Several ongoing initiatives are aimed at increasing public awareness about symptoms of endometrial cancer, including the International Gynecologic Cancer Society's recent declaration of June as Uterine Cancer Awareness Month (International Gynecologic Cancer Society, 2023), and the Foundation for Women's Cancer's recent partnership with actress Meagan Good for the Spot Her campaign (Foundation for Women's Cancer, 2023; Spot Her, 2023). Increased public education can empower women to prioritize their symptoms and seek treatment for abnormal bleeding. Unfortunately, the rising incidence and mortality of endometrial cancer demonstrates our current approaches remain insufficient.

In addition to the need for better public education regarding AUB, healthcare providers can improve adherence to guidelines for patients at risk for endometrial cancer. Though ACOG recommends first-line endometrial biopsy for patients at increased risk of hyperplasia or cancer, fewer than half (43.6 %) of patients meeting these criteria underwent prompt endometrial sampling in Grubman's study (Grubman et al., 2023). Obese patients at the highest risk (class III obesity, BMI  $\geq 40$  kg/m<sup>2</sup>) of endometrial cancer were among the least likely (only 10.9 %) to receive a complete work-up and experienced a prolonged time to sampling. Given the association between obesity and endometrial cancer, we must advocate for early tissue diagnosis in obese patients. We also must collaborate with healthcare professionals in other specialties to improve rates of tissue sampling. Over 90 % of the patients in this study were established in the healthcare system prior to their cancer diagnosis, often having recent visits with primary care and emergency medicine providers. Institutional multidisciplinary quality improvement initiatives may be necessary to improve AUB care for women at risk of endometrial cancer. Consideration of institutional protocols for gynecology referral for endometrial sampling for obese women may help decrease delays in diagnosis.

In the setting of rising incidence and mortality of endometrial cancer (Lu and Broaddus, 2020; Somasegar et al., 2023), research identifying opportunities to improve access to care and early diagnosis of the disease are critical. The authors should be congratulated on identifying missed opportunities for young women with endometrial cancer. Hopefully this research will serve as a call to action for healthcare providers, hospital systems, and medical societies. Collaboration between ACOG, the Society of Gynecologic Oncology, the American

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College of Emergency Physicians, and the American Academy of Family Practice may help facilitate the development of guidelines to improve the care for young women at risk for endometrial cancer.

### Declaration of competing interest

The authors declare that they have no known competing financial interests or personal relationships that could have appeared to influence the work reported in this paper.

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Megan L. Hutchcraft\*

*Division of Gynecologic Oncology, Carle Cancer Institute, Carle Illinois College of Medicine and University of Illinois at Urbana-Champaign, Urbana, IL, United States*

J. Michael Straughn Jr

*Division of Gynecologic Oncology, Department of Obstetrics & Gynecology, University of Alabama at Birmingham, Birmingham, AL, United States*

\* Corresponding author at: Carle Cancer Institute, 509 West University Avenue, Urbana, IL 61801, United States.  
E-mail address: [megan.hutchcraft@carle.com](mailto:megan.hutchcraft@carle.com) (M.L. Hutchcraft).