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Commentary: Re-evaluating minimal volume standards for high-risk cancer resections: Adding socioeconomic determinants of health care delivery to the equation

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An overarching ideal of health care policy is to optimize health care value, defined as quality divided by cost.¹ However, the definition of health care quality is complex, multifaceted, and lacks uniform agreement. Consequently, health services researchers have used surrogates of quality, such as hospital² and surgeon procedure volume,³ leading both patient advocacy and quality-improvement groups⁴ and major academic hospitals⁵ to advocate for restricting complex operations to hospitals and surgeons who meet certain minimal volume thresholds, such as the “Volume Pledge” endorsed by the Leapfrog Group.⁴ However, many of these thresholds were not established through robust statistical methods, and the volume–outcome relationship for many high-risk cancer operations, including lung cancer resection⁶ and esophagectomy,⁷ are unclear. Nonetheless, these volume standards have significant health care policy implications, as hospitals are increasingly merging into larger health systems and many seek to centralize care.

In this context, Farjah and colleagues⁶ used the Society of Thoracic Surgeons General Thoracic Surgery Database and found no association between perioperative morbidity, mortality, or failure to rescue with hospitals and/or surgeons

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CENTRAL MESSAGE

Rather than hospital and surgeon volume per se, socioeconomic determinants of access to quality health care must be included in discussions on lung cancer treatment centralization.

who meet the Volume Pledge threshold for lung cancer resections. The authors suggest that “health system leaders should not centralize lung cancer care on the basis of thresholds specified by the Volume Pledge.”⁶ In this issue of the *Journal*, Sonner and Wakeam⁸ used that study as a launching pad for a broader discussion on the potential impact of social determinants of health care delivery on volume–outcome relationships and to contextualize the potential value of centralization for certain populations.

Numerous studies have demonstrated disparities in lung cancer care based on race, insurance status, education, place of residence, and income. However, as Sonner and Wakeam point out, the impact of race on lung cancer treatment disparities is less clear when analyses adjust for income, education, insurance status, and neighborhood characteristics, highlighting the importance of controlling for these often-ignored socioeconomic variables when studying health care quality and when assessing the value of health care policy measures such as centralization. While taking into consideration socioeconomic determinants of access to care, further studies are needed to establish volume thresholds through more robust statistical methods and to incorporate more global aspects of cancer care (eg, receipt of adjuvant chemotherapy for node-positive disease, guideline-directed molecular testing, timely surveillance imaging, and 5-year survival rates) into quality assessments, rather than simply perioperative outcomes, which have been the focus in most volume–outcome studies.

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The health care system in the United States does not provide safe, effective, patient-centered, timely, efficient, and equitable care for all its citizens.⁹ If we wish to narrow this health care quality chasm, we need to better understand the complex associations between socioeconomic factors and health care disparities, identify and understand the barriers that impede access to high-quality health care for some, and use that information to prioritize interventions aimed at improving access to and delivery of high-quality care for disadvantaged populations.

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