

# Shared Decision-Making for Lung Cancer Screening: More Straw for the Camel's Back

Jonas B. Green, MD, MPH, MSHS

**E**arly diagnosis of lung cancer carries clinical and public health significance that has been well recognized for more than a century.<sup>1</sup> By the 1960s, radiography had become the standard for lung cancer screening (LCS) despite awareness at the time that earlier diagnosis did not confer better prognosis.<sup>2</sup>

Another half-century of matrixed innovations—low-dose CT, radiation techniques, and novel drugs (chemotherapeutics, immunotherapies, and targeted therapies)—have begun changing the landscape. These joint considerations persuaded the US Preventive Services Task Force (USPSTF) to issue its much-debated 2013 recommendation to perform annual low-dose CT on those at highest risk.<sup>3</sup>

A decade later, although lung cancer causes twice as many US deaths as any other cancer, there remains a yawning gap between LCS rates and screening rates for other cancers.<sup>4</sup> In this issue, Morgan et al present primary care physician (PCP) recommendations on how to design decision aids that could help narrow this gap.<sup>5</sup> Yet in the conversations regarding who to screen and how to make shared decision-making (SDM) easier, a critical question risks being overlooked: Where does LCS fit in?

PCPs already have more tasks than they can reasonably handle. A conscientious PCP would need to work 26.5 hours per day to fulfill all guideline-recommended services for a standard panel of 2500 patients.<sup>6</sup> Even accounting for practice-specific factors that mitigate and distribute the burden—variation in panel sizes, team-based care, etc—PCPs do not have the capacity to take on additional responsibilities. Few PCPs currently discuss LCS with patients, so adding LCS would require reprioritizing the way time is spent.

But should they? The current guideline system doesn't say. The USPSTF, like many guideline-issuing bodies, grades recommendations based on the net benefit of a specific service compared with not performing that service.<sup>7</sup> In their crammed appointments, PCPs are seldom choosing "yes" or "no" with respect to a given service, but rather which guideline-recommended services—the USPSTF alone has 14 grade A and 40 grade B recommendations—to accord the highest priority.<sup>8</sup>

Compared with other guideline-recommended screenings, LCS is not an especially easy box to check. There are harms associated

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with LCS, perhaps more so than with other screening tests. These include high rates of false positives that give rise to unnecessary worry, cascading clinical services that include invasive biopsies, and added cost. Negative results for active smokers may conversely have the unintended consequence of providing false reassurance. These features increase the importance of SDM in LCS (as compared with other cancers) and increase the time required per patient. Poor-quality LCS conversations observed in practice take up to 2 minutes, without adequately explaining harms or using decision aids.<sup>9</sup> High-quality SDM for lung cancer takes closer to 10 minutes, leaving little room for much else during a standard primary care appointment.<sup>10</sup>

Some institutions have therefore implemented programs that take LCS out of PCP hands via dedicated staff who perform SDM, follow test results, and manage all subsequent steps. Although increasingly successful at some centers, like my own, such programs are unlikely to be scalable on a national level.

PCPs do need tools that facilitate SDM for guideline-recommended services, but they also need a system that helps prioritize them. To this end, national primary care organizations and guideline-issuing entities should jointly develop guidance for PCPs regarding prioritization of preventive care. The individualized rankings would, ideally, incorporate demographics, family history, preference

sensitivity, time required, and comparative net benefit of each service.<sup>11</sup> A smaller step in the right direction of categorizing recommendations into “essential,” “strongly recommended,” “recommended,” and “supported” would help PCPs tailor their time. In both cases, quality measures would likely need to be adjusted to reflect this tiering.

Caverly et al have proposed “everyday SDM” as a personalized approach to rationalizing and abbreviating SDM discussions.<sup>11</sup> This idea deserves more attention and—taken together with an individualized prioritization scheme—could maximize the yield of PCPs’ and patients’ limited time spent together.

Absent a robust prioritization scheme, PCPs will continue to prioritize services based on their own experience, familiarity with and interpretation of the evidence, signals from payers, and an element of chance. If PCPs don’t believe LCS is important enough or easy enough, no decision tool will be able to overcome the primary obstacle to LCS: time. PCPs already carry a heavy burden. Can they handle more? ■

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**Address Correspondence to:** Jonas B. Green, MD, MPH, MSHS, Cedars-Sinai Medical Care Foundation, 6500 Wilshire Blvd, Los Angeles, CA 90048. Email: jonas.green@cshs.org.

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