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The Effect of COVID-19 on Smoking and Vaping Rates

To the Editor:

It was recently brought to light that a more abrupt reduction in smoking prevalence occurred in 2020 after the start of the coronavirus disease (COVID-19) pandemic when compared with prior trends (1). Although this is a perceived positive of the pandemic, there is more to this story than meets the eye. Starting in March 2020, estimated national e-cigarette sales trended upward fairly steadily, increasing in more than three-quarters of the subsequent months, until reaching an all-time high in August 2021 (2). The reason behind how these trends are related is at least twofold.

First, there were many missed opportunities to provide treatment to those with some interest in smoking cessation, likely leading many to seek "treatment" with e-cigarettes, a method that, at present, lacks proven efficacy (3). Outpatient appointments were frequently canceled or rescheduled at that time, and many patients did not seek to schedule follow-up or to reschedule. Outpatient visits were reduced by greater than 20% for the first 11 weeks of the pandemic in the United States and sustained a 50% reduction during 5 of those weeks. Visits did not stabilize to baseline numbers until October 2020. Pulmonology and cardiology, two specialties most inclined to provide treatment for nicotine dependence, had, respectively, 25% and 20% overall reductions in visits from March 2020 to the end of that year. Primary care visits were 10% lower overall (4). In addition, quit line utilization took a big hit, in part because of the lack of healthcare interaction, given that 26.8% of national quit line users in the calendar year before the pandemic were referred by health professionals (5). Nationally, quit line use rates reduced substantially, by nearly 40%, during the 3 months immediately after the start of the pandemic. This was a time when concerns for the interplay between smoking and COVID-19 were at their peak and receiving coverage in mainstream media. Overall, the quit line saw a 27% reduction in calls in 2020 (6).

There were vital opportunities to initiate appropriate treatment for tobacco and nicotine use, but many users were instead left empty handed or instead maybe with an e-cigarette in one hand. Although calls to focus on implementing tobacco treatment campaigns were made early in the pandemic (7), this chronic disease state was again left undertreated.

Smokers who generally used outdoors, especially those living in apartment buildings or complexes without easy outdoor access in urban environments, may have switched to e-cigarettes to allow indoor use while mitigating odor and potentially the effects on household members. Results support this hypothesis, as smoking rates in urban areas declined, while rural rates did not (1).

Although the COVID-19 pandemic may have hastened a reduction in smoking rates, e-cigarettes have been making substantial headway as the products of the future for some time now. Treatment of tobacco and nicotine dependence, regardless of the tobacco or nicotine product used, must have a more consistent and urgent presence in all healthcare settings, pandemic or not. ■

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Reply: Trends in Smoking Prevalence and the Continuing Imperative of Tobacco Control

From the Authors:

We appreciate Dr. Lang's thoughtful comments on our article (1). He notes, and we agree, that our finding of a steeper fall in cigarette smoking prevalence in 2020 relative to prior trends could be consistent with an increase in e-cigarette use, which we did not examine. Moreover, his concern that reductions in visits to physicians who commonly provide smoking cessation care may have led to reductions in quit efforts is well taken.

More recent analyses put our study's finding into fuller context. A study from the Centers for Disease Control and Prevention (CDC) (2), which used a different national survey (the National Health Interview Survey), supports our central finding: like us, they identified a modest reduction in adult smoking prevalence in 2020. Notably, the CDC also found a reduction in e-cigarette use and no increase in the quantity of cigarettes consumed by smokers. However, these trends should be interpreted cautiously: in contrast to our analysis, the CDC study did not adjust for previous trends (the 2019 change in the National Health Interview Survey design would have impeded such an analysis), and cigarette consumption was assessed only in broad categories in their study.

In contrast, another recent analysis identified a 14.1% increase in cigarette sales in the United States with the onset of the pandemic (3), a finding that suggests that current smokers may indeed have increased their consumption of cigarettes even if overall smoking prevalence slightly decreased. This could reflect the disproportionate psychosocial strain that the coronavirus disease (COVID-19) pandemic imposed on disadvantaged groups, who are also more likely to use tobacco.

Putting aside the question of pandemic-related impacts, the devastating and deadly reality is that about 30 million Americans still smoke cigarettes (2) and that the burden of tobacco—as we and many others have observed (4, 5)—increasingly falls on low-income, less-educated, and rural Americans. Our findings do provide some support for the notion that job loss need not necessarily increase smoking prevalence, as was seen to some extent in the Great Recession (6). However, they also underscore the imperative of tobacco control. Well-established evidence-based policies—including bans on promotion, smoking restrictions in public spaces, cigarette taxes, and universal accessibility of smoking cessation therapies—need to be far more widely deployed, although these steps will require confrontation with the tobacco industry. Moreover, in the United States, access to care for smokers must be improved for efficacious medical treatments to actually be delivered to those who need them. With more than 30 million Americans uninsured and 41 million underinsured (7), many who could benefit from pharmacotherapy and counseling are undoubtedly avoiding it because of cost.

Finally, widening social disparities in smoking underscore the fact that arduous, indeed oppressive, conditions help drive this unhealthy habit. Hence, although policies focused on behavioral change are important, broader reforms to address the underlying inequitable social conditions themselves will likely be needed to combat the scourge of the cigarette. ■

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