The Effect of Minimum Wages on Smoking Among Teens

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INTRODUCTION
Debate surrounding minimum wage increases often focuses on the impact on the economy and employment. However, there is an absence of research concentrating on what goods and services teens affected by minimum wage increases spend their money on. It is important to understand where adolescents are spending their extra income from minimum wage increases; there is a severe lack of research into the effect of minimum wage increases on smoking rates among teenagers. Although it is dependent on the amount of the price increase, cigarette demands are inelastic among those who already smoke, but this study examines whether teenagers will spend their increased disposable income on cigarettes. Increases in disposable income will make cigarettes relatively less expensive so demand for cigarettes may increase among those most affected by increases in minimum wage.

DATA

METHODOLOGY
A difference-in-difference model is used to detect any effect of the 1996 Federal increase in minimum wage on teen smoking rates. From 1991 to 1995, Federal minimum wage remained at $4.25 and increased to $4.75 in 1996; the CPS did not conduct a tobacco supplement to their survey in 1991 so that year is not included in this study. During this period, some states increased their own minimum wage to 1996 levels or higher, while other states remained at the Federal level. Four states, Alaska, Hawaii, New Jersey, and Oregon had a minimum wage of at least $4.75 throughout the 1992 to 1996 period. Five states are not included in the difference-in-difference regression because their minimum wage was higher than $4.25 but lower than $4.75, and therefore would not reflect the effect of a $0.50 increase in minimum wage on smoking rates. The treatment group includes states that did not increase their minimum wage above $4.25 from 1991 until the Federal increase.

RESULTS
The results from the difference-in-difference analysis are displayed in Table 3 and Figure 1. After the 1996 Federal minimum wage increase, there is a slight increase in smoking in the control states, but the treatment states continue to show a decline in smoking.

Table 2 presents the linear regression model. A linear regression analysis fails to find a significant effect as well. In low and high income households, the increase in minimum wage does not have a statistically significant effect on smoking among adolescents. However, age does have significant effects on smoking rates. Since the legal smoking age is 18 years old, it is reasonable to expect more people to smoke as the approach and pass age 18. This expectation is seen in the regression for all income levels. The regression shows in low-income and high-income houses, age has a .06 and .04 effect on smoking, respectively.

Race and gender also have a statistically significant effect on smoking at a 95 percent confidence interval. Controlling for gender, the regression finds males have a coefficient of .02 among low-income and high-income families. Blacks and other races are less likely to smoke than whites in low and high income households. Low-income households see a -0.15 effect among blacks and other races see a -0.04 effect on smoking rates. In high-income houses, there is a -0.09 effect among blacks and a -0.04 effect among other races.

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