

Tobacco Use and Policy: How Communities Affect Youth Smoking

Tobacco use is a major threat to health. While a smaller proportion of the population uses tobacco currently than in previous decades, about 18% of adults over 18 years of age smoke. Tobacco accounts for almost half a million deaths per year in the United States.

The Prevention Research Center (PRC) has carried out research on tobacco use among adolescents. Youth smoking is particularly important because, while the legal age to purchase tobacco products is 18, the vast majority of smokers begin smoking at earlier ages. Preventing young people from smoking can yield major public health benefits.

Recent PRC research has used a sample of 50 mid-sized cities in California to examine the effects of local laws and policies and community characteristics on adult and youth behavior. Telephone surveys were carried out with adults and youth in these communities to get information about attitudes and behavior related to tobacco. Some of the key findings thus far appear below. Information was also gathered about the number and location of places that sell tobacco and local tobacco related policies.

The Effects of Local Tobacco Policies on Youth Smoking

Policies limiting access to and availability of tobacco products are often recommended as strategies to prevent youth smoking. A recent study carried out by the Prevention Research Center of the Pacific Institute for Research and Evaluation in Berkeley, California, examined the effects of these policies. The study found that the number of tobacco outlets in a community was a key factor in whether and how much teens smoke. It also found that local clean air policy may moderate the relationship between outlet density and youth smoking, such that outlet density is less important in communities with strong clean air policy.

The purpose of tobacco access policies, such as enforcement of minimum purchase age laws, is to increase the effort and resources necessary for youth to obtain tobacco, thus increasing the full costs of smoking or tobacco use. These and other tobacco policies (e.g., clean air laws) may also reinforce community norms against tobacco use and against providing tobacco to youth. Research suggests that intensive enforcement of purchase age laws, for example, may be associated with significant reductions in smoking and in purchase attempts by youth. Another approach to reducing tobacco availability is to restrict the numbers or density of stores that sell tobacco in a community. The assumption underlying such restrictions is that higher density of tobacco outlets increases access by decreasing the inconvenience of finding tobacco for sale and increasing the likelihood of tobacco sales to minors.

The study investigates the relationships among local tobacco policy, tobacco outlet density, and youth smoking in 50 midsized California communities. This study is based on data from 1,491 13-16 year olds from these cities. Cities were scored for two types of policies: (1) sale of tobacco products including whether merchants are required to request a photo identification for people who appear to be 27 years of age or younger and strong local tobacco licensing laws and (2) clean air laws including smoke-free workplaces, smoke-free outdoor places and smoke-free multi-unit housing. The study also determined the number of licensed tobacco retail

establishments in each city. Outlet density in each city was calculated as the number of retail outlets per 10,000 persons.

The youth reported whether they ever smoked a whole cigarette and the frequency of cigarette smoking in the past 12 months and past 30 days.

Findings indicated that in cities with higher tobacco outlet density, more youth smoked and smoked more than in cities where tobacco outlets were less dense. The results also indicated that local clean air policy and local sale of tobacco policy did *not* directly affect youth smoking. However, in communities with stronger local clean air policies, outlet density was less important. Thus, when tobacco outlets are dense and availability to tobacco is high in a particular community, clean air policy may be an important tool in reducing youth smoking. A possible explanation is that stronger clean air policies reinforce community norms against youth tobacco use and against providing tobacco to youth, thus countering the effects of greater density.

Local Tobacco Policy and Tobacco Outlet Density: Associations With Youth Smoking, by Sharon Lipperman-Kreda, Joel Grube, and Karen Friend, *Journal of Adolescent Health Online*, October 2011

The Effects of Outlet Densities near Homes and Schools and Youth Smoking

One study investigated the associations of youth cigarette smoking with tobacco outlet densities and proximity of tobacco outlets to youth homes and schools in 45 communities. It also investigated the relations of density of tobacco outlets within 0.75- and 1-mile buffers from youth homes and schools. Greater tobacco outlet density within 0.75- and 1-mile buffers from youth homes was associated with greater smoking frequency. Greater outlet density may be related to youths smoking through increased access to cigarettes from commercial sources. In particular, the likelihood that young people will be able to locate an outlet that will sell tobacco to them increases as the number outlets in their environment increases. Alternatively, it is possible that competition for tobacco sales is greater when density is higher. Retailers may be less likely to request an ID or implement effective policies to curb sales to minors when there are more outlets competing for a market share. Increased competition may also lead to lower prices and thus to increased smoking.

Lipperman-Kreda, S.; Mair, C.; Grube, J.W.; Friend, K.B.; Jackson, P.; and Watson, D. "Density and proximity of tobacco outlets to homes and schools: Relations with youth cigarette smoking," *Prevention Science*, 11/2013.

The Effects of Adult Smoking in the Community on Youth Smoking

Another study showed that youth are more likely to smoke when the proportion of adults who smoke in the community is high and when the youth perceive that their friend smoke and approve of smoking. The results suggest that adult community norms that are more supportive of smoking may enhance the influence of friends' smoking behavior. Therefore, interventions designed to prevent or reduce youths' smoking should also focus on reducing smoking by adults.

Johannes Thrul, Sharon Lipperman-Kreda, Joel W Grube, Karen B Friend, *Journal of Youth and Adolescence*, 11/2013.