Unrealistic Optimism among Adolescent Smokers and Nonsmokers

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Two studies were conducted to investigate unrealistic optimism among adolescent cigarette smokers. In the first study, 54 smokers and 304 nonsmokers agreed that there was a strong relationship between smoking and lung cancer. Nonsmokers accurately perceived their chances of contracting lung cancer as below average. However, smokers perceived themselves as having only an average chance of contracting lung cancer. The second study replicated the first in both procedure and results regarding lung cancer, but also added perceptions of the relationship between smoking and two other smoking-related health problems, emphysema and heart attacks. The results were similar: 33 smokers rated their chances of developing emphysema and having heart attacks as higher than 299 nonsmokers, but still viewed their chances as only about average. Finally, perceptions of stress were examined. Smokers perceived themselves to be under more stress than nonsmokers. It was concluded that self-deception as indicated by unrealistic optimism regarding the chances of getting smoking-related diseases characterized adolescent smokers.

KEY WORDS: Adolescent smokers; health.

Health educators often base campaigns to increase preventive health behaviors on two assumptions: (1) that individuals frequently underestimate their own susceptibility, and (2) that perception of susceptibility leads to preventive

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actions (Weinstein, 1984). A series of studies by Weinstein (1980, 1982, 1983, 1984) using college students has suggested that people tend to exhibit "unrealistic optimism" in regard to perceptions of risk, i.e., their own chances of experiencing health and safety problems are viewed as less likely than the chances of their peers. If this is the case, then prevention professionals should take this phenomenon into account when they develop their campaigns.

An issue of grave concern to the health of Americans is smoking behavior. Cigarette smoking accounts for more than 100,000 deaths per year (Bloom, 1987). It is the major single cause of cancer death in the United States and is a causal factor in heart disease, emphysema and several other illnesses. Approximately 85% of deaths due to lung cancer could have been avoided if the people involved had not chosen to smoke. The risk of death from lung cancer is ten times greater for smokers than nonsmokers; in the case of excessive smokers (more than one pack of cigarettes per day), the risk of death is 15 to 25 times greater than nonsmokers.

Because of these facts, campaigns to prevent smoking behaviors from ever developing in our young people have been a mainstay in our society for the last two decades. Yet many people continue to smoke. Although both smokers and nonsmokers believe that smoking is harmful (Revenson & Neufeld, 1987), unrealistic optimism may be one factor that influences smokers to believe that cancer and other health problems associated with smoking won't happen to them. In an effort to determine whether differences in an optimistic bias exist between smokers and nonsmokers, Revenson and Neufeld (1987) had a sample of 86 college students (26 self-identified as smokers) rate their own and another average student's risk for smoking-related disease. Although their results indicated that smokers' rating were less optimistic about their own likelihood of contracting the diseases than nonsmokers were, smokers still perceived themselves to be at less or equal risk than "the average student" for developing smoking-related health problems. Thus, while smokers demonstrated knowledge of the increased risk of various illnesses due to smoking and did take it into account when rating the health risks of other smokers, they did not apply this knowledge as strictly to themselves.

The goal of the present research was to examine unrealistic optimism among high school students, a frequent target of prevention campaigns and a population often considered to be at extremely high risk for various health and safety problems because of their perceptions of personal invulnerability and lack of knowledge. Two studies were conducted. Study 1 examined differences in perceptions of the relation between smoking and lung cancer and unrealistic optimism among smokers and nonsmokers. Study 2 replicated Study 1, expanded its scope to other smoking related illnesses, and examined differences between perceived stress among smokers and nonsmokers.