

# Friends: The Role of Peer Influence Across Adolescent Risk Behaviors

Kimberly A. Maxwell, PhD<sup>1</sup>

*Received March 22, 2001; accepted October 3, 2001*

This longitudinal project examined peer influence across five risk behaviors: cigarette smoking, alcohol consumption, marijuana use, tobacco chewing, and sexual debut. A total of 1,969 adolescents aged 12–18 years completed two waves of data collection. Each respondent matched behavior data for at least one friend. Results found that a random same sex peer predicts a teen's risk behavior initiation; there is influence only to initiate cigarette and marijuana use; and that there is influence to initiate and stop alcohol and chewing tobacco use. This finding suggests that friends may protect adolescents from risk activities. The study has implications for understanding how peer influence, expressed as social norms, may be used in public health campaigns that target teen behavior.

**KEY WORDS:** adolescence; friendship; peer relations; risk behaviors.

## INTRODUCTION

Adolescents encounter numerous risks in their daily lives. Publicly, peers are often blamed for the onset of risk behaviors ranging from substance use to teen pregnancy (Harris, 1998). Recent work has supported and extended this position, showing that friends play an important role in both harmful and positive activities (Berndt, 1999; Mounts and Steinberg, 1995; Urberg, 1999; Wentzel, 1999). This work implies that although teens acquire information regarding risk behaviors from parents, teachers, and the media, peers may also play a crucial role in a child's development by shaping her normative beliefs and interpretation of information regarding risk activities (Cox and Cox, 1998; Petraitis *et al.*, 1995; Sussman, 1989). In essence, peer norms help determine whether a behavior is "hip," safe, and desirable.

Longitudinal research has examined the effect of friends on risk behaviors. However, these projects have

not compared the influence process across more than two risk activities. This project addressed this research gap by conducting longitudinal network analyses of the National Longitudinal Study of Adolescent Health (AddHealth) data set to examine the role of peer influence on five risk behaviors: smoking cigarettes, drinking alcohol, using marijuana, chewing tobacco, and sexual debut.

## Social Influence

Theory indicates that social influence occurs when people continually compare themselves with others to ascertain whether or not their own behavior is appropriate (Deutsch and Gerard, 1955; Festinger, 1954; French and Raven, 1959; Sherif, 1936; Tedeschi and Bonoma, 1972; Turner, 1991). A similar influence pattern appears in children as they move toward adolescence and strive to create an integrated self-image apart from their parents (Erikson, 1963). To aid with this identity formation, peer groups, outgroups, and role models provide a child with significant social comparisons (Sherif and Sherif, 1964), supplying opportunities and experiences that can not be duplicated by other socializing agents (Hartup, 1979; Mueller, 1979). Adolescents are particularly vulnerable to peer influence because they share a stressful biological event over a relatively short period of time, and these physical changes are coupled with shifting personal

<sup>1</sup>The author received her PhD from the Annenberg School for Communication at the University of Pennsylvania. She currently conducts social marketing research at the Academy for Educational Development in Washington, DC. The author's research interests include social influence, health, and visual communications. To whom correspondence should be addressed at Academy for Educational Development 1825 Connecticut Avenue, NW Washington, DC 20009; e-mail: kmaxwell@aed.org.

expectations and new social demands (Petersen and Spiga, 1982).

Acknowledging that adolescents are particularly susceptible to peer influence, it is important to know how the process occurs. As a foundation for better understanding peer influence mechanisms, researchers should use three criteria to study adolescent friend selection: physical proximity, age, and lifestyle similarities (Epstein, 1989). Of these three characteristics, Epstein argues that the most salient guideline for adolescents choosing peers is whether potential friends have social traits that are congruent with the teen's own identity. This is important information, because as students form new friendships ties among adolescents with shared activities are strengthened while bonds with other individuals diminish. Thus, new friends are likely to have a large effect on a teen by anchoring preexisting similarities or changing the adolescent's discrepant behavior (Epstein, 1989). This last point leads to the essence of my question: How does a friendship alter a teen's risk behavior through dyadic peer influence?

### Friendship Selection and Influence

To explain how peer influence and friendship selection affect adolescent behavior, theory posits that peer pressure exists as the mutual effect of close friends and that the type of friendship determines the degree of influence (Cohen, 1983). If the relationship is homophilic with regard to a particular attitude or behavior, friendship selection anchors the individual's preexisting attitude or behavior pattern. However, if the new friend has a different attitude or behavior, so that the friendship is heterophilic, there may be attitude or behavior change via influence from one person to another.

Heterophilic selection occurs for several reasons. First, because people possess a variety of attitudes, behaviors, interests, and demographics it is nearly impossible to ensure that a friendship selection is perfectly matched. Second, even if a homophilic relationship is desired, it is not always guaranteed because of incomplete disclosure of interpersonal information during friendship selection. Third, individuals may simply form heterogeneous relationships (Cohen, 1983). For instance, rather than looking for similar people, friendships may be based on physical proximity, mutual affinity, and status differentiation when a person is attracted to a higher ranked individual (Hallinan, 1978/79). The high likelihood of friends having different behaviors and attitudes when they initially meet gives us a unique opportunity to study the influence process.

### Peer Influence Research

Cross-sectional studies show correlations between adolescent perceptions of their friends' activities and their own cigarette smoking (Eiser and Stroebe, 1972; Evans *et al.*, 1988; Hirschman *et al.*, 1984), alcohol consumption (Thorlindsson and Vihjalmsson, 1991), illegal drug use (Huba and Bentler, 1980; Jenkins, 1996), and sexual behavior (Benda and DiBlasio, 1994; Reinecke *et al.*, 1997; Romer *et al.*, 1994). Longitudinal surveys have also found support for perceived subjective norms predicting children's intentions to smoke cigarettes (Brook *et al.*, 1989; Chassin *et al.*, 1986; DeVries *et al.*, 1995; Mittlemark *et al.*, 1987; Norman and Tedeschi, 1989; Rose *et al.*, 1999) and drink alcohol (Ennett and Bauman, 1991).

While these peer perception studies show associations between teen behaviors and their friends' perceived activities, a methodological issue plagues them. Correlations between a person's self-reported behavior and her perception of her friend's behavior are artificially inflated when the person projects her own actions onto the friend. For instance, correlations between normative expectations for smoking and a teen's own smoking are reduced when reports of a friend's real behavior are considered (Bauman *et al.*, 1992). This diminished association is explained by the false consensus effect (Ross *et al.*, 1977) and projection (Bauman and Ennett, 1994) that lead subjects to overestimate the prevalence of their own behaviors in others. In light of this methodological limitation, measures that obtain real friend behavior are considered more accurate estimators of social influence (Bauman and Ennett, 1996). This study used such data.

Research using cross-sectional analyses of a real friend's behavior has shown that smokers are more likely to list other smokers as members of their friendship groups (Eiser and Van Der Plight, 1984; Hill, 1971), smokers and nonsmokers display intraclique homogeneity and interclique heterogeneity (Ennett *et al.*, 1994), and share normative smoking beliefs, including opinions concerning parental approval (Eiser *et al.*, 1991). Cross-behavior analyses show that boys who smoke cigarettes and drink alcohol are significantly more likely to have friends with similar behaviors compared to boys who dip snuff and chew tobacco (Hunter *et al.*, 1991). Although these cross-sectional studies controlled for inflated associations by using real friend measures, they could not identify influence patterns. Therefore, we must look for evidence of peer influence from longitudinal studies.

Studying selection, longitudinal research on friendship dyads reports that behavior among stable adolescent friendship pairs grows more similar for sexual intercourse (Billy and Udry, 1985) and substance use (Kandel, 1978).