



Antisocial Behaviors Associated with Gambling among Adolescents

Craig J. Forsyth¹, Jing Chen² and Tina H. Deshotels³

¹University of Louisiana, Lafayette. E-mail: craig.forsyth@louisiana.edu

²Athens State University. E-mail: jing.chen@athens.edu

³Jacksonville State University. E-mail: Tina.deshotels@jsu.edu

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Abstract: This paper examines several types of gambling behaviors in adolescence with a focus on its association with antisocial behaviors. The idea is that both gambling and antisocial acts are behaviors which involves risk. The highest association involved playing dice. In controlling for males and females, all correlations were higher for males. All associations were significant at the .001 level with low to medium associations.

Keywords: adolescent gambling, antisocial behavior, delinquency,

Gambling Among Adolescents

The environment of gambling throughout the United States continues to change, with more states having gambling opportunities. This has resulted not only in an increase in availability, but more variety in types of gambling opportunities, with easier accessibility for youth. What began with state-sponsored lotteries in the United States and a few casinos in Nevada and New Jersey has flourished. Gamblers can bet on a wide diversity of activities and games via the Internet on their computer or smartphone using gambling apps, online wagering, and state-supported games.

During the past decade, gambling has been one of the fastest changing and growing industries in the world. Gambling opportunities have become so widespread that it is difficult to find areas in which some form of gambling is not regulated, organized, or owned by the government. Even though gambling is forbidden to minors, in recent years there has been a marked increase in this behavior. Estimates are that over 60% of all adolescents have gambled at least once. The increasing number of underaged youth participating in games of chance for recreation and entertainment is attributable to

the legalization, normalization, and proliferation of gambling opportunities (Hurt et al., 2008). Several studies have shown that the percentage of young people who are problem gamblers is significant and even greater than the percentage of adult problem gamblers (Blinn-Pike et al., 2010). Researchers have shown that between 2 and 9 percent of adolescents are problem gamblers, while between 10 and 18% of adolescents are considered at-risk gamblers. [1] Consistently with the literature on the adult and adolescent population, the evidence presented thus far supports the idea that even in the preadolescent players tend to be predominantly males and males have higher associations with delinquency (Hurt et al., 2008; Villella et al., 2011).

Gambling has an inherent element of risk, and adolescence is a period of development characterized by high rates of risk-taking behavior in a variety of settings (Chambers, Taylor, & Potenza, 2003; Proimos et al., 1998; Wagner & Anthony, 2002). Currently, adolescents live in a time of increased gambling availability (Federal Trade Commission, 2006); with the general perception that gambling is acceptable and normal (Gupta & Derevensky, 1998, 2000).

There are varying reasons ascribed to adolescents' motivations to gamble. Contrary to the prevailing association of gambling for monetary gain in adults, for an adolescent, gambling is often reported as an opportunity to socialize. It is viewed as a social activity rather than an opportunity to win money (Lynch, Maciejewski, & Potenza, 2004). Gambling in adolescence does not appear to always have serious negative consequences; for example, groups of adolescents imitate poker tournaments by dressing the part, sunglasses, hats, and cigars with behaviors, copying the style of young gamblers; many of whom are stars in televised poker tournaments.

But adolescent gambling on the Internet, a developing issue, is emerging as a particular concern because of its solitary nature, lack of supervision, no face-to-face contact needed to verify age, accessibility, and potential for incurring losses over a relatively short period. Moreover, many youths are competent with computer technologies, raising additional concern that they might become more engaged in computerized gambling than their adult counterparts. There exist technical difficulties in regulating internet gambling (Griffiths & Woods, 2004). As some countries permit the activity and others restrict it and people can access sites internationally given the world-wide nature of the internet, countries have found it difficult to regulate internet gambling in general, and these difficulties extend to youth (Hardoon & Derevensky, 2002; Hardoon, Gupta, & Derevensky 2004).

GAMBLING AND ANTI-SOCIAL BEHAVIORS AMONG ADOLESCENTS

Among youth, problem gambling has been shown to result in increased delinquency and criminal behavior, poor academic performance, higher rates of school truancy

and dropout, and disrupted familial and peer relationships (Hardoon & Derevensky, 2002). Goldstein et al. (2013) found violent behaviors among gambling delinquents; including assault, arson, gang fights, carrying a weapon, and carrying a handgun. The higher the amount of gambling; the greater and more serious the delinquency. This included theft, burglary, car theft, and selling drugs. Potenza et al. (2011) found an association between gambling, fighting, and carrying a weapon among both internet and non-internet gamblers. Other researchers (Wanner et al., 2009; Vitaro et al., 2001, Volberg et al. 2004, 2010) found strong correlations between violent and non-violent delinquency and gambling problems among adolescents. Magoon et al. (2007) found similar relationships between all forms of delinquency and gambling.

Magoon et al. (2007) also reported that a high percentage of delinquency were to support gambling activity and debts. But the literature documented a relationship between both non-violent and violent behaviors and problem gambling among adolescents. Magoon et al. (2005) found that the more adolescents gambled the more likely they reported higher involvement in theft and other illegal acts, to support their gambling activities. The association between gambling and violent acts opens the debate to other possible explanations for the association between these two social problems. Findings from several studies suggest that non-violent and violent delinquent behaviors share common risk factors with problem gambling among adolescents, such as low parental supervision and deviant peers ((Blaszczynski & Silove, 1996; Dickerson, Derevensky, & Gupta, 2002, 2008; Vitaro et al., 2001). More recently, investigators have examined the relationship between gambling and delinquent behaviors among adolescents in a systematic way, shifting the understanding beyond the explanation that delinquency associated with problem gambling is merely financially motivated by gambling losses (Kryszajtys et al., 2018). This suggests that young players may have more general problems of conduct than theft.

Focusing on type of gambling researchers have found how teenagers tend to prefer social and intimate games, such as card games and sports betting, while only a small percentage of teenagers are involved in illegal age gambling activities (Volberg et al., 2010). The more the adolescent gambled the more likely they were more involved in machine gambling (such as slot machines and poker machines), non-strategy games (such as bingo and lottery or super jackpot), and online games (Rahman et al., 2012; Yip et al., 2015).

It has been seen that online gambling is particularly attractive for young people due to its extreme accessibility, the large number of events dedicated to gambling, and the multisensory experience (Brezing et al., 2010; King et al., 2010). It is evident that gambling in adulthood is linked to a series of risk factors already present in adolescence. At the same time, the progressive lowering of the age of onset, which has been seen to

be one of the main risk factors in serious forms of delinquency, makes it necessary to analyze the presence of the phenomenon of gambling in children; applying a life course perspective to the study of gambling (Farrington, Piquero, & Jennings, 2013; Dick, et al., 2019; Chen, et al., 2018; Forsyth et al., 2011, 2018).

In fact, the lowering of the age of onset of problematic behaviors, may be related to the exposure to the use of the Internet, smartphones, and tablets. A series of studies (Shaffer and Hall, 2001; Vitaro et al., 2004; Winters et al., 2005) have highlighted how adult gamblers started playing in early adolescence. Others have found that within the population of those who start playing before the age of 15, only 25% maintain the same frequency of play even in adulthood (Vitaro et al., 2004; Delfabbro, Winefield, & Anderson, 2009; Goldstein et al., 2013; Vitaro et al. 2001; Kryszajts, et al., 2018).

Some researchers find it necessary to distinguish between what is considered a game and what is considered gambling. According to some researchers gaming is defined by its skill-based play, interactivity, and contextual indicators of success. In contrast, gambling is defined by wagering mechanics, predominantly chance-determined outcomes, and monetization features that involve risk and payout to the player (King et al., 2010, 2015). Obviously, using this definition would further complicate the research with terms such as risk, indicators of success, skill, real money with already mentioned inconsistencies.

Methods

This paper uses data from the 2018 Louisiana Communities that Care Youth Survey (CCYS). [2] This paper uses data on antisocial and gambling behaviors from this survey to examine these behaviors and their associations. This biennial survey is administered on even years, to sixth, eighth, tenth, and twelfth grade private and public-school students. The survey is designed to assess students' involvement in a specific set of indicators, as well as their exposure to a scientifically valid risk and protective factors identified in the Risk and Protective Factor Model of adolescent problem behaviors. The self-reported attitudes/behaviors of students used in this study are also a good fit for examining the illegal behaviors of adolescents. Each of the 80,000 plus students completed the survey online during a designated class period/time. Students are given approximately 60 minutes to complete 131 questions. Passive consent was used to secure parental permission for participation. Teachers were provided with a short script to read to students just prior to administration. The script served as informed assent and included references to the voluntary nature of the survey and privacy. No identifiable data is collected from the survey. The results are disseminated at various aggregated levels, including State, region, parish, and by individual schools. All school level reports are password protected and require consent to access.

Self-report studies

A self-report study is a type of survey, questionnaire, or poll in which respondents read the question and select a response by themselves without researcher interference. Self-report surveys enable researchers to explore the attitudes, beliefs, motivations, and personality characteristics of offenders. Self-report measures have been considered valid data sources for general demographic data, delinquency, and domains of behavior (Hindelang, Hirschi, & Weis, 1979).

Self-report surveys are one of three major ways of measuring involvement in delinquent and criminal behavior. The basic approach of the self-report method is to ask individuals if they have engaged in delinquent or criminal behavior, and if so, how often they have done so. The growth and refinement of the self-report method has grown, since its initial use in the 1950's in criminological research, especially longitudinal research on the etiology of delinquent and criminal behavior. Although there is much room for continued improvement, ***self-report data appear acceptably valid and reliable for most research purposes.***

Some of the limitations of FBI crime data are overcome by self-report studies. Several researchers rather than relying on official reports of arrests, have drawn upon samples of various populations and have directly inquired through survey questionnaires regarding the respondents' past delinquent behavior. This method aimed at adolescents not identified by law enforcement agencies as juvenile delinquents is designed to reveal and measure under-identified and unreported instances of juvenile delinquency. Self-report studies clearly show that delinquent behavior is far more common and widespread than is indicated by official statistics. Findings from these studies over time have led researchers to conclude that enormous numbers of young people appear to be involved in delinquent acts. The conclusion does not deny that crime may be more concentrated in some groups, but that it is also unlikely to be absent in other groups. Such studies clearly support the contention that official statistics fail to completely measure the volume of delinquency and the incidence of many specific delinquent acts. Hirschi's (1969) support for self-report as an ideal methodology is that official records are a weaker measure of the commission of delinquent acts than honest self-reports. His rationale is basically that every delinquent act is witnessed and motivated by that young person; only they can explain it, not the police (Hindelang, Hirschi, & Weis, 1979; Hirschi, 1969).

Every delinquent act committed by a person is witnessed by him; he cannot commit delinquency acts without knowing it (otherwise, there is nothing to explain). Obviously, the police do not have such omnipresence...In short, the records of the police are, on a priori grounds, a weaker measure of the commission of delinquent acts than presumably honest self-reports (Hirschi, 1969, p.64).

Table 1 contains the characteristics of the students from the State of Louisiana who completed the survey in (2018).

Table 1: Characteristics of responders

<i>Grade</i>	<i>Number</i>	<i>Percent</i>
6	24,763	29.0
8	25,872	30.3
10	19,485	22.9
12	15,143	17.8
Gender		
Male	41,100	49.0
Female	42,708	51.0
Ethnicity		
African American	34,966	35.5
Asian	2,331	2.4
Hispanic	6,662	6.8
Native American	4,195	4.3
Pacific Islander	719	0.7
White	43,954	44.6
Other	5,732	5.8

Measures for Antisocial behavior (ASB)

Antisocial behavior (ASB) is a measure of involvement with the eight antisocial behaviors listed below during the past year. These 8 measures of ASB are presented are:

carrying a handgun

carrying a handgun to school

attacked someone with the idea of hurting them

been arrested

stolen or tried to steal a motor vehicle

sold illegal drugs

been drunk or high at school

been suspended from school

The question asked was: How many times in the past year (12 months) have you? The responses were: Never (1), 1 or 2 times (2), 3 to 9 times (3), 10 to 19 times (4), 20 + times (5). Scores were total for individuals with a range of 8 to 40.

Measures for Gambling

Gambling was measured using nine types of activities.

played the lottery

bet on sporting events

played cards for money

bet money on horse races

played bingo for money or prizes

gambled on the internet

bet on dice games such as craps

bet on games of personal skill such as pool, darts, or bowling

bet on video poker or other gambling machines

The question asked was: How often have you done the following for money, possessions, or anything of value? The responses were Never (1), Before but not in past year (2), A few times in past year (3), Once a month (4), Once a week or more /almost every day (5). Scores were totaled for individuals with a range of 9-45.

Findings

As can be seen in Tables 2, 3, 4, and 5, findings suggest that antisocial behaviors are associated with gambling. In table 2 are the total anti-social scale score associations with each type of gambling. Correlations ranged from played bingo $r=.111$; played the lottery $r=.129$; bet money on horse races $r=.198$; bet money on sporting events $r=.211$; bet on games of personal skill such as pool, darts, or bowling $r=.211$; gambled on the internet $r=.239$; bet on video poker or other gambling machines $r=.249$; played cards for money $r=.255$ and the highest bet on dice games such as craps $r=.364$. All associations were significant at the .001 level. It is easy to see why playing dice has the highest association with antisocial behavior as it is a street game which exposes one to conflicts within a group of individuals who are all winners or losers based on a group member's roll of the dice. Tables 3 and 4 controls for males and females supports the literature as males had higher associations with antisocial behaviors. But associations were in the relatively same order as in table 2 with bingo the lowest association (females $r=.106$; males $r=.134$) and dice/craps the highest association (females $r=.307$; males $r=.377$) with total antisocial behaviors for both males and females.

Table 5 shows associations with individual gambling behaviors with individual anti-social behaviors (rather than the scale total used in tables 2,3,4). The gambling activity

with the highest overall associations with antisocial behaviors was *again* bet on dice games, which had the highest associations with 7 of the 8 types of antisocial behaviors. Only bet on video poker or other gambling machines had a higher association (carrying a handgun to school $r=.210$).

Among the antisocial behaviors sold illegal drugs had the highest association $r=.257$. In addition, stolen or tried to steal a motor vehicle had an association of $r=.225$. Both variables suggest that needing money to gamble is perhaps a product of gambling. Whether adolescents become involved in delinquent behaviors specifically to support gambling behavior is not clear from our findings because many of the behaviors on the surface, appear devoid of financial benefit and indeed because only the above two variables on the antisocial scale were concerning obtaining money illegally.

Other associations above $r=.2$ were nearly all with bet on dice games: been arrested $r=.249$; carrying a handgun $r=.241$; been drunk or high at school $r=.240$; and attacked someone with the idea of hurting them $r=.203$. Bet on video poker or other gambling machines also had an association above $r=.2$; carrying a handgun to school $r=.210$. Very low associations in this research suggest that some gambling maybe normal deviance and therefore nonproblematic.

Discussion

It is clear from the findings of this research that adolescents engage in a range of delinquent behaviors, as well as gambling. Some of these gambling behaviors may involve solitary delinquency which is considered to be more serious than most delinquency which is group behavior. These data are of relevance considering that some studies in the literature have shown that adult pathological players have shown in younger ages a strong preference for these types of games. Although it is necessary to investigate with further studies the other associations underlying gambling by preadolescents, this fact suggests that the phenomenon of adolescent gambling has several aspects and characteristics common to those identified by the literature in the analysis of the precursors of adult gambling. Notwithstanding the limitations of this research, the present study makes some noteworthy contributions to the understanding of the phenomenon of adolescent gambling, which is still not very explored in the literature. Gambling is associated with both violent and non-violent behaviors and these associations are high enough to merit further research. This finding shifts the focus beyond the explanation that delinquency associated with gambling is merely financially motivated by monetary losses. Gambling and delinquency may have shared risk and protective factors that reflect a pattern of risky behavior. Future research should consider an examination of other behaviors, including substance misuse and violent behaviors, in relation to adolescent gambling.

Notes

1. Descriptive measures of gambling were inconsistent across the literature. Distinguishing between gambling, problem gambling, pathological gambling was grossly inconsistent to the point that the terms are of little utility. Descriptive measures of delinquent behavior were more consistent. The inconsistency in measurement makes it difficult to fully understand and/or compare the literature or relative nature of the relationship between gambling and delinquency.
2. The authors decided to use the 2018 survey because the 2020 survey had a lower response rate due to covid and the 2022 survey is presently being done.

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